

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

B242959777

FACILITY: FAURECIA INTERIOR SYSTEMS		SRN / ID: B2429
LOCATION: 17801 EAST FOURTEEN MILE RD, FRASER		DISTRICT: Warren
CITY: FRASER		COUNTY: MACOMB
CONTACT: Ebone Maxwell , HSE Manager		ACTIVITY DATE: 09/07/2021
STAFF: Sebastian Kallumkal	COMPLIANCE STATUS: Compliance	SOURCE CLASS: SM OPT OUT
SUBJECT: Annual scheduled inspection		
RESOLVED COMPLAINTS:		

On May 24, 2021, I, Michigan Department of Environment, Great Lakes & Energy – Air Quality Division (EGLE-AQD) staff, Sebastian Kallumkal, requested information and records pursuant to PTI No. 15-12A from Faurecia Interior Systems, Inc. (B2429) located at 17801 East Fourteen Mile Road, Fraser, Michigan. Due to the Covid 19 pandemic protocols, the records were requested and reviewed prior to conducting inspections to limit the time spent at the site. The records were requested to be submitted by June 11th, Faurecia contact person for AQD, Ms. Ebone Maxwell, HSE&S Manager, requested an extension for a couple of weeks because she is new to the facility and also that they were going through an audit by another agency. I reminded her about the records on July 8th, but it was told that the records were submitted a month ago. However, AQD did not receive the email possibly because the attachments were too large to be transferred. Advised her to breakdown the attachments and send separately. On July 9th, received 3 emails with SDSs, material usage and emissions calculations.

PTI No. 15-12A is an opt-out permit for hazardous air pollutant (HAP) emissions and has limits for individual HAPs and aggregate HAPs. The PTI includes 3 glue lines and 3 coating lines. FGCOATLINES includes these 3 automotive plastic parts adhesive coating lines and the three automotive plastic paint coating lines. FGCOATLINES has emission limits for volatile organic compounds (VOC), acetone, tert-butyl acetate, ethylene oxide, and tripropylene glycol. “Fraser Faurecia Monthly Workbook” includes emission summary, 12-month Emission Summary, FG-Coatlines paint usage, Glue usage, Hardener consumption and Glue Hardener consumption, EU-BOILER gas usage, Rule 290 equipment usage, Fire pump hours and emission calculations. I discussed the emission calculations and material usage with Derek Dennis (734 249 3245), Consultant, Tetra Tech on Monday, July 26th. The facility uses mainly three types of paint coatings with similar VOC content. Glue does not contain VOCs. Facility has information about this from the manufacturer. The facility submitted emissions calculations and usages for May 2020 through April 2021. May to July 2021 records were received on 9/7/2021.

Records Review

FGCOATLINES

SC I.1: VOC emission limit of 45.0 tons per year based on 12-month rolling time period. The submitted calculations show that from May 2020 through April 2021, VOC emissions were about 1.08 TPY (1.17 TPY as of July 2021). Derek told me that previously the facility over-calculated the emissions using the VOC content less exempt solvent data. Currently they use the VOC content with exempt solvent data to calculate the VOC emissions.

SC I.2 Acetone emissions limited to 1.0 ton per year based on a 12-month rolling time period. FGCOATLINES does not utilize acetone.

SC I.3 Tert-butyl acetate (exempt solvent) emissions limited to 17.5 tons per year based on a 12-month rolling time period. The calculations show that T-butyl acetate emissions were about 5.42 tons from FGCOATLINES, as of April 2021 (5.87 TPY as of July 2021).

SC I.4 Ethylene oxide emissions limited to 0.35 pounds per year. FGCOATINGLINES does not utilize ethylene oxide.

SC I.5 Tripropylene glycol monomethyl ether emissions limited to 8.2 tons per year. FGCOATLINES does not use Tripropylene glycol monomethyl ether containing materials.

SC II.1 VOC content of the coatings used in each coating line in FGCOATINLINES is limited to 4.2 lb/gal (minus water) as applied. The SDS show that the VOC content of the coatings are less than this limit. The facility was granted approval to use manufacturer's formulation data to show compliance with this condition. The facility provided formulation direct from the supplier for the coating material used in FGCOATLINES showed that the coating contains 0.68 pounds VOC per gallon minus exempt solvents. The hardener has VOC content of 0.94 lb/gal (-exempt solvents).

SC III.1 The permittee only uses tert-butyl acetate in EUCOATLINE4. Based on the facility inspection, it only has on paint coating booth.

SC III.2 The permittee captures all waste material and stores them in closed containers. The waste is disposed of using a waste disposal company (U.S. Industrial Technologies). A copy of the manifest for waste disposal was provided.

SC III.3 The permittee replaces spent filters daily and disposes of them using a waste disposal company.

SC III.4 All VOC and HAP containing materials and stored with covers affixed except when being actively used for operation requirements.

SC IV.1 All coatings and glue lines appeared to have filters properly installed. Facility is keeping records (Filter Planning) of the filter replacements for the booths, ovens, air conditioner unit, water treatment, etc.

SC IV.2 The water wall for EUCOATINGLINE4 appeared to be operating properly at the time of inspection.

SC IV.3 The facility has only one paint coating line (EUCOATINGLINE4). This booth has one robotically operated paint spray. It appears to be using High Volume Low Pressure or equivalent applicator.

SC V.1 Previous years' AQD inspection reports stated that the facility received approval from the AQD to use manufacturer formulation instead of EPA Method 24 analysis to determine VOC content of the coating materials used in FGCOATLINES. The facility did not appear to have a copy readily available. Ebone Maxwell being new to the facility was not aware of such a letter. Having limited access to the facility file (kept at AQD office) while working from home due to Covid Pandemic restrictions, this information was not verified.

SC VI.1 All records were submitted timely. All records for FGCOATLINES appear to have been provided.

VI.2 The permittee appears to be maintaining current listing of manufacturer's formulation data/SDS for all materials used in FGCOATLINES. Received SDS of materials used via emails.

SC VI.3 a-f. The facility is keeping necessary records, on a monthly basis, regarding the usage of VOC containing materials in gallons. VOC content (with water and less water) of each material, as applied, VOC mass emission calculations in ton/month and 12-month rolling period for FGCOATLINES. The facility does not reclaim any VOC containing material.

SC VI.4 a-l-requires facility to keep records of the amount, in gallons, of acetone, ethylene oxide, and tripropylene glycol monomethyl ether used in FGCOATLINES. Facility stated that chemicals used in FGCOATLINES does not contain these components.

SC VI.5. a-e requires the facility to keep records, on a monthly basis, for EUCOATLINE4, regarding tert-butyl acetate (TBA) containing materials used, in gallons and in pounds, gallons of TBA containing materials reclaimed, TBA emission calculations in tons per month and per 12-month rolling period. Facility stated that the paints used in coatings does not contain TBA. The facility does not reclaim any tert-butyl acetate containing materials. Only Hardener contains TBA. TBA content of each material used and monthly and 12-month rolling time period calculations were provided.

SC VIII. All exhaust stacks appeared to be unobstructed. The dimensions were not verified during inspection.

FGFACILITY

SC I.1-limits the individual HAP emission to less than 9.0 TPY based on a 12-month rolling period. The individual HAP emissions are very low. Highest individual HAP is methanol and 12-month methanol emissions as of July 2021 was 350 pounds (0.175 TPY).

SC I.2- limits aggregate HAPs emissions to less than 22.5 tons per year based on a 12-month rolling period. For May 2020 through April 2021, the aggregate HAP emissions were 639 pounds (0.320 TPY) and 672 pounds (0.336 TPY) as of July 2021.

SC V.1 The facility is using formulation data to determine HAP content of the paint coatings, adhesives and other solvents. AQD has not requested to verify HAP content using EPA Method 311 analysis.

SC VI.1- Facility submitted the records timely. All records for FGFACILITY appear to have been provided.

SC VI.2. Facility is keeping records of the gallons of each HAP containing material used., HAP content, in pounds per gallon or pounds per pound, of each HAP containing material used, and monthly and 12-month rolling Individual and aggregate HAP emissions. Facility does not reclaim materials.

Onsite Inspection:

On Tuesday, September 7th, 2021, EGLE-AQD staff, Sebastian Kallumkal, Environmental Quality Specialist, conducted an onsite inspection of Faurecia Interior Systems (Faurecia; SRN B2429), located at 17801 East 14 Mile Road in Fraser, Michigan. The purpose of this inspection was to determine the facility's compliance with the federal Clean Air Act, Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended, and the conditions of Permit to Install (PTI) No. 15-12A.

Faurecia manufactures vehicle interior instrument panels. Door panels and center consoles are made through reaction injection molding. These parts can be colored during in the molding, coated in a coating booth, or sprayed with an adhesive so a thin vinyl sheet can be applied to the part. The company typically operates 3 shifts 24 hours for mostly Monday-Friday, with occasional Saturdays and Sundays. Faurecia has approximately 650 employees at the facility.

I arrived at the facility at about 1:00 PM. Due to the Covid 19 pandemic restrictions, the inspection was announced. I followed by facility's pandemic protocol. I met Ms. Ebone Maxwell, HSE Manager. During the pre-inspection meeting, I also met Hristina Zdravkeska, HSE intern, Anthony Tocco, HSE Intern, Bob Kresevich, Maintenance Manager, Chris Newby, Engineering Director, and Jeffrey T. Sedgwick, Director, Health, Environmental & Medical.

During the pre-inspection meeting, we discussed the permit requirements, additional records needed, changes to the facility since the last inspection, etc. The permit lists three adhesive glue lines and three coating lines. They are not familiar with the naming convention in the permit as opposed to what they use at the facility. The facility has two adhesive (glue) booths: one robotic assisted and one manually sprayed.

The facility only has one coating booth (EUCOATLINE4) which also has flame cell (Rule 290 exempt) to heat the parts for the coatings to adhere. After coatings, the parts are cured in a natural gas fired oven. The coating booth has a water wall to capture the overspray. The captured sludge is hauled out as hazardous waste. Chris told me that they only use water-based coatings. The coatings are used as received.

The Rule 290 exempt process include two Jenopstik LASER guns to make groove (to weaken the seam to aid in the rupture in an emergency) on plastic parts which hold the airbags. This causes particulate emissions; one pad printer which stamps the brand name on the speaker shells. This process may emit VOCs; one flame cell which heats the parts before being coated. May cause VOC emissions. Facility also has REIS LASER guns to make a dash (straight groove) in the airbag. The smoke is collected in a dust collector and the exhaust is vented to the atmosphere through a common duct. The dust collectors are shaken occasionally, and the dusts are collected in hoppers.

They did not have any process changes other than receiving a new contact for the Dodge RAM vehicles.

The facility has one fire pump. It has no emergency generator or parts washer. It has a natural gas fired boiler (40 CFR 60, Subpart Dc subject) to heat the building. The waste coatings and solvents are collected and hauled away.

There are approximately 27 plastic injection molding machines at the facility. Plastic pellets of many types (mostly PC ABS) are heated and pushed into the molds. Often, a small amount of a colored pellets is added to bring color to the molded parts. The machines are enclosed and appear to emit to the general in-plant environment. The plastic injection machines appear to be exempt from permitting requirements per R 286(2)(b). Stoner Rocket Release (Rocket Release) is the mold release agent (MRA). It is applied via 8 oz aerosol cans. I was informed that the MRA is not applied routinely. It is applied based on the moldings. Some molds may be continuously operated to make the same parts. In some molds MRA may be applied once daily, once weekly or once monthly. The MSDS is available in the manila file folder. According to the SDS, there are no hazardous air pollutants (HAPs) in Rocket Release. Per the SDS, MRA contains 60-80% VOCs. This mold release application appears to be exempt from permitting requirements via R 33.6290(2). (Review PTI exemption booklet at https://www.michigan.gov/documents/deq/deq-ess-caap-pti-exemptionbooklet_253795_7.pdf). Faurecia is not keeping records of the MRA usage. AQD

has requested Faurecia to keep track of the usage of the MRA. If the usage is deemed substantial enough, the process needs to be permitted.

After the pre-inspection meeting, Ebone, Hristina and Tony accompanied me for an inspection of the facility. I was informed that the first shift just ended, and second shift started. We inspected the coating booth. The parts enter the booth in a conveyer. Some of the parts are heated (Flame Cell, Rule 290 exempt) prior to being coated. Nick Rock, Paint Booth Manager, told me that they replace the intake air filter as needed. The sludge in the water wall is collected and manifested out. The booth has no other particulate matter filter.

Next, we visited the injection molding presses. The parts are inspected and conveyed to the adhesive or coating booths. Next, we inspected that Jenopsik LASER (Rule 290 exempt) process area. I was shown the grooves that are made on the parts. Next, we visited the automatic (robotic) adhesive application booth. The booth was operating at this time. I did not verify the condition of the filters in this booth. Next, we visited the manual adhesive application booth. The booth was being used. The filters were in good condition, in place and not excessively soiled. Filters appear to be replaced recently.

The adhesive and paint coating booth spray lines are cleaned using SURF A LUBE fluid. The technical data sheet shows that this fluid does not contain any VOCs. SDS and TDS included.

Next, we inspected the pad printer (Rule 290 exempt) which stamps brand name on the speaker covers. We also inspected REIS LASER (Rule 290 exempt) which makes straight dash inside the airbags. This area is self-contained. The exhaust is vented to overhead dust collectors and the exhaust gas is vented to the atmosphere through a common duct.

40 CFR 63, Subpart ZZZZ

Faurecia is an area source of hazardous air pollutants (HAP) and has synthetic minor limits for HAPs. The facility has an existing (installed in 2005) diesel fired reciprocating internal combustion engine (RICE) which runs the fire pump. This unit is subject to 40 CFR 63, Subpart ZZZZ-National emissions Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines. **Facility needs to verify compliance with this standard.** Compliance was not verified during inspection because EGLE-AQD does not have the delegated authority for area sources subject to this standard.

NSPS Dc Boiler

The facility has a natural gas fired boiler on site for space heating. The unit is located in a separate building outside the main building. The boiler heat input capacity is 20.9 MMBtu and its date of start-up was July of 2006 according to the Initial Notification and Information form received from Faurecia on February 9, 2009. The boiler appears to be subject to 40 CFR Part 60 Subpart Dc. Because the boiler does not burn coal or oil, the main requirement is “to record and maintain records of the total amount of each steam generating unit fuel delivered to that property during each calendar month” per §60.48c(g)(3). Facility monitors the fuel consumption on a daily basis, when operated. Fuel consumption and emission records were provided.

Rule 290 exempt processes:

Facility submitted VOC, methanol, HAPs, PM, NOx and SO2 emission calculations for Rule 290 exempt processes.

During the post-inspection meeting, we discussed again facility’s process and equipment information which was provided during the pre-inspection meeting. I Reminded them keep

track of mold release agent (MRA) usage and include its VOC emissions in the calculations. On September 16, 2021, I informed Ebone to submit MRA usage and VOC emission calculations records, via email, to EGLE-AQD Warren office for the next six months.

Conclusion

Based on the records provided and the onsite inspection, Faurecia Interior Systems Inc. appears to be in compliance with the federal Clean Air Act, Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended, and the conditions of Permit to Install (PTI) No. 15-12A.

NAME Sebastianykallemkal DATE 09/16/2021 SUPERVISOR Joyce