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

P134572614		
FACILITY: GEORGE P JOHNSON		SRN / ID: P1345
LOCATION: 1914 TAYLOR POINT, AUBURN HILLS		DISTRICT: Warren
CITY: AUBURN HILLS		COUNTY: OAKLAND
CONTACT: Mike Vermeesch , General Foreman		ACTIVITY DATE: 07/12/2024
STAFF: Sebastian Kallumkal	COMPLIANCE STATUS: Compliance	SOURCE CLASS: MINOR
SUBJECT: Annual scheduled inspection		
RESOLVED COMPLAINTS:		

On Friday, July 12th, 2024, I, Michigan Department of Environment, Great Lakes & Energy – Air Quality Division (EGLE-AQD) staff, Sebastian Kallumkal conducted a scheduled onsite inspection at George P Johnson Co., (SRN P1345), owned by Project, located at 1914 Taylor Point, Auburn Hills, Michigan. The purpose of the inspection was to determine the facility's compliance with the requirements of the federal Clean Air Act; Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended (Act 451); and Michigan Department of Environment, Great Lakes, and Energy-Air Quality Division (MEGLE-AQD) Administrative Rules. This facility was relocated from 3600 Giddings Road, Auburn Hills, MI.

I arrived at the facility about 10:35 AM. I met Mr. Mike Vermeesch, General Foreman (mike.vermeesch@gpj.com; Cell: 248 614.9256). I identified and introduced myself and stated the purpose of the visit.

During the pre-inspection meeting, Mike explained to me about the facility's operations. G. P. Johnson fabricates and paints industrial display units for trade and auto show exhibitions. The display units are primarily made of wood (MDF). Some are built with plastics or metals (Aluminum & Steel). The units are built-in modular form to facilitate shipping and assembly. They have not installed any new processes since the last inspection (in February 2023). They installed the filtration system for the LASER cutting process as required in Rule 285(2)(I)(vi)(C). The facility has two paint booths: Finished Paint Booth and Prep Booth. They are located in a large area near the woodworking area. He also told me they have a solvent based cold cleaner in the paint room area. I gave him the operational procedure to be posted near the cold cleaner to comply with Rule 611(6) and 707(4).

Next, he accompanied for an inspection of the facility. We visited the LASER cutting room. He showed me the two filtration systems: one for each exhaust. The LASER cutting process is performed occasionally. The LASER cutting process is exempt from Rule 201-Permit to Install requirements pursuant to Rule 285(2)(I)(vi)(C). He also showed me the 3D printing room located nearby.

Next, we visited the paint room where the finished booth and prep booth are located. They use water-based coatings currently. The paint area and both booths are a fully enclosed. The finished booth is a down draft unit with exhaust through side filters. The booth is equipped with a separate make up air and exhaust system. The particulates from the painting operations are controlled by two stage filters. The filters appear to be clean and in-place. The filters are replaced when necessary. Mike told me that the filters are replaced when each filter weighs about 7pounds. The exhaust air is vented to the atmosphere through a stack.

We inspected the prep-booth where they sand the parts to remove coatings or seam fillers. Preparation activities primarily involve filling seams, and surface blemishes with wood fillers, sanding, and application of primer coating (water based). Sometimes large parts are top coated in this booth. The coatings are manually applied with HVLP applicators. This booth is a fully enclosed, down draft unit and side exhaust through two stage filters. It is equipped with a separate make up air and exhaust system. The particulates from the painting operations are controlled by filters. The exhaust air is vented to the atmosphere through a stack. The filters appear to be clean and in-place.

The two coating booths appear to be exempt from R336.1201-Permit to Install requirements pursuant to R336.1287(2)(c) which in part states:

R 336.1287 Permit to install exemptions; surface coating equipment.

(1) This rule does not apply if prohibited by R 336.1278 and unless the requirements of R 336.1278a have been met.

(2) The requirement of R 336.1201(1) to obtain a permit to install does not apply to any of the following:

(c) A surface coating line if all of the following conditions are met:

(i) The coating use rate is not more than 200 gallons, as applied, minus water, per month.

(ii) Any exhaust system that serves only coating spray equipment is supplied with a dry filter control or water wash control which is installed, maintained, and operated in accordance with the manufacturer's specifications, or the owner or operator develops a plan which provides to the extent practicable for the maintenance and operation of the equipment in a manner consistent with good air pollution control practices for minimizing emissions.

(iii) Monthly coating use records are maintained on file for the most recent 2- year period and are made available to the department upon request.

On July 26th, 2024, Mike emailed me the July 2023 through June 2024 coating usage for both booths and SDS for the materials used. In booth 1, GPJ used 425 pints (53.13 gallons) and in booth 2 the usage was 1375 pints (171.88 gallons). The current combined usage for both booths is less than 20 gallons per month based on the July 2023 through June 2024 usage.

Based on the current usages, the facility is a true minor for VOCs (emitting less than the Title V major source threshold for VOC = 100 tpy) and an area source for HAPs (emitting less than 10 tpy of single HAP and 25 tpy of aggregate HAPs). The potential to emit for HAP emissions were demonstrated in the 2023 inspection report.Should the coatings usage (amount or type), or the number of booths change, the facility should re-evaluate its potential to emit for VOCs and HAPs and compliance with R336.1201-Permit to Install Requirements.

If the facility-wide annual potential to emit for the HAP emissions are at or above the major source threshold (10 tons per year for single HAP; 25 tons pe year for aggregate HAPs), the source could be subject to National Ambient Emissions Standards for Hazardous Air Pollutants (NESHAP) and Title V (Renewable Operating Permit) requirements.

We also inspected the solvent cold cleaner located near the finished booth. The cold cleaner air/vapor surface area appears to be less than 10 square feet. Solvent based cold cleaners are exempt from R336.1201-Permit to Install requirements pursuant to Rule 281(2)(h) which states in part:

R 336.1281 Permit to install exemptions; cleaning, washing, and drying equipment.

(1) This rule does not apply if prohibited by R 336.1278 and unless the requirements of R 336.1278a have been met.

(2) The requirement of R 336.1201(1) to obtain a permit to install does not apply to any of the following:

(h) Cold cleaners that have an air/vapor interface of not more than 10 square feet.

The cold cleaners are subject to the requirements of R336.1611 (existing-installed before July 1, 1970) or R336.1707 (New, Installed on or after July 1, 1979). I provided Mike the operational

procedure to be posted near the cold cleaner to comply with Rule 611(6) and 707(4). He agreed to post it near the cold cleaner.

Woodworking operations occur in the main floor. Exhaust from each process is connected to main exhaust line. The particulate emissions (dust) from the woodworking operations are vented to dust collector baghouse located outside and the exhaust is vented back into the general inplant area to save heat. Wood cutting processes that are controlled by an appropriately designed and operated fabric filter collector or equipment that has emissions that released only to general in-plant area are exempt from permit to install pursuant to Rule 285(2)(I)(vi)(B) or (C).

R 336.1285 Permit to install exemptions; miscellaneous.

(1) This rule does not apply if prohibited by R 336.1278 and unless the requirements of R 336.1278a have been met.

(2) The requirement of R 336.1201(1) to obtain a permit to install does not apply to any of the following:

(I) The following equipment and any exhaust system or collector exclusively serving the equipment:

(vi) Equipment for carving, cutting, routing, turning, drilling, machining, sawing, surface grinding, sanding, planing, buffing, sand blast cleaning, shot blasting, shot peening, or polishing ceramic artwork, leather, metals, graphite, plastics, concrete, rubber, paper board, wood, wood products, stone, glass, fiberglass, or fabric which meets any of the following:

(A) Equipment used on a nonproduction basis.

(B) Equipment that has emissions that are released only into the general in-plant environment.

(C) Equipment that has externally vented emissions controlled by an appropriately designed and operated fabric filter collector that, for all specified operations with metal, is preceded by a mechanical precleaner.

We also inspected the dust collector located outside the building. Mike told me the exhaust has an exhaust bypass if they don't want the exhaust air to be recirculated into the in-plant area. They have never used it. The dust collector area looked clean. I did not see any dust fall out in the area.

Conclusion: Based on the inspection and the records review, the facility appears to be in compliance with the applicable air quality regulations.

NAME Subartionykallemkal DATE 07/26/2024 SUPERVISOR Joya H