

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

FY 2014 Sched. Insp.

N577124974

| | | |
|---|--------------------|------------------------------|
| FACILITY: GEORGE P. JOHNSON | | SRN / ID: N5771 |
| LOCATION: 3600 GIDDINGS RD, AUBURN HILLS | | DISTRICT: Southeast Michigan |
| CITY: AUBURN HILLS | | COUNTY: OAKLAND |
| CONTACT: | | ACTIVITY DATE: 04/08/2014 |
| STAFF: Iranna Konanahalli | COMPLIANCE STATUS: | SOURCE CLASS: SM OPT OUT |
| SUBJECT: FY 2014 scheduled annual inspection of George P. Johnson Company | | |
| RESOLVED COMPLAINTS: | | |

E-file: N5771 - SAR 2014 04 08

George P. Johnson Company (N5771)
3600 Giddings Road
Auburn Hills, Michigan 48326-1515

SIC = 3999 & NAICS = 33999

ROP & MACT Synthetic Minor PTI # 81-96D dated January 24, 2010 (ROP Opt-out)

Rule 331.1702 BACT.

PTI Voids: PTI # 81-96 (3/8/04), PTI # 81-96A (10/14/05) PTI # 81-96B (9/26/07) and PTI # 81-96C (1/24/11)

PTI Mod: PTI No. 81-96C → PTI No. 81-96D to remove two ink-jet printers (FG-Ink-Jet) and TAC emission limits.

VNs: August 14, 2002, Violation Notice for exceeding VOC limits (PTI No. 81-96 SC 13 & 23) based upon MAERS-2001. November 14, 2002, Violation Notice for exceeding VOC limits (PTI No. 81-96 SC 15).

On April 08, 2014, I conducted a level 2 scheduled annual inspection of George P. Johnson Company ("G. P. Johnson") located at 3600 Giddings Road, Auburn Hills, Michigan 48326-1515. The inspection was conducted to determine compliance with the Federal Clean Air Act; Article II, Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451; Michigan Department of Environmental Quality, Air Quality Division (MDEQ-AQD) administrative rules; and ROP Opt-Out PTI No. # 81-96D.

During the inspection, Ms. Mary B. Manzella (Ph: 248-475-8834; Fax: 248-475-2325; Cell: NA; E-mail: marybeth.manzella@gpj.com), CPM, Purchasing Agent, and Mr. Kevin Krauzowicz (Ph: 248-475-8880; Fax: 248-475-2325; Cell: 586-382-0152; E-mail: kkrauzow@gpj.com), Paint Shop Foreman, assisted me.

Mr. Bernie Clincke (Ph: 248-475-8864; Fax: 248-475-2325; Cell: 246-613-7410; E-mail: Bernie.Clincke@gpj.com), Executive Director, Production, transferred to Nashville, Tennessee, about 2011. Mr. Michael Cherubin (Ph: 248-475-8861; Fax: 248-475-2325; Cell: 246-219-0928; E-mail: michael.cherubin@gpj.com), Vice President, was in China, on a business trip, during my April 08, 2014, visit.

G. P. Johnson builds display units and exhibits for trade and auto shows. The substrates are plastic (5%), metal (15%) and wood (85%). Varieties of paints are used: both water and solvent based. Recently, mostly water based paints are used. There are three US facilities: California, Tennessee and Michigan. Michigan auto show business has substantially reduced. G. P. Johnson has Chrysler, Toyota, Honda accounts but not GM and Ford.

The production is accomplished using 100,000 sq. ft. carpenter shop and 5 paint spray booths. IPA alcohol is used to wipe clean the substrates, if needed. The Auburn Hills facility consists of 390,160 sq. ft. manufacturing area and 50,130 sq. ft. office space.

There are errors in the permit (PTI # 81-96D) regarding the paint spray booths. While there are six booths in the permit, only five booths are present; Booth No. 2 does not exist. Besides, booth numbers are different in the permit from actual booth numbers. The following table summarizes the errors.

| Emission Unit ID | Actual booth | PTI booth | Remark |
|---|----------------|--------------------|---|
| EU-PROCESS101 | Booth No. 1 | Booth No. 1 | 15 ft * 25 ft finish booth |
| EU-PROCESS102 | Does not exist | Booth No. 2 | Does not exist |
| EU-PROCESS103 | Booth No. 3 | Booth No. 3 | 25 ft * 40 ft prep booth. Primarily sanding and preparation. Painting may also be done. |
| EU-PROCESS104 | Booth No. 4 | Booth No. 1 | 15 ft * 25 ft finish booth. |
| EU-PROCESS105 | Booth No. 5 | Booth No. Zolatone | 50 ft * 100 ft Zolatone booth |
| EU-PROCESS111 | Booth No. 11 | Booth No. 6 | 15 ft * 25 ft finish booth |
| FG-DisplayCoat: All booths are equipped with intake air filters to obtain high quality products and exhaust filters to control overspray particulate matter. | | | |

Via May 04, 2011, e-mail, Michael Cherubin stated that the PTI No. 81-96D would be revised to make corrections but as of April 2014 no such corrections were made.

During CY 2013, 1.68 (1.4 according to MAERS-2013) tons per year of VOC are emitted (PTI No. 81-96D, FG-DisplayCoat, SC I.1 limit: 30 tpy, SC I.2 limit: 10 tpy per booth, SC I.3 limit: 1 ton per month per coating line). All VOC limits of PTI No. 81-96D, FG-DisplayCoat include acetone. 25 pounds per day (max on 9/18/2013) of xylene are emitted (PTI No. 81-96D, FG-DisplayCoat, SC I.5 limit:62.6 lbs/day). 24.47 pounds per day (max on 12/27/2013) of Methylene Chloride are emitted (PTI No. 81-96D, FG-DisplayCoat, SC I.7 limit:0.2 tpy).

1. Booth 1: 1,191.6 pounds of VOC per year
2. Booth 2: does NOT exist
3. Booth 3: 979.6 pounds of VOC per year
4. Booth 4: 206.6 pounds of VOC per year
5. Booth 5 (Zolatone): 775.9 pounds of VOC per year
6. Booth 11: 212.3 pounds of VOC per year

Total: 3,366.04 pounds (1.683 tons) per year.

The waste products and spent filters are disposed of according to RCRA using The Environmental Quality Company and RCRA manifests are present (PTI No. 81-96D, FG-DisplayCoat, SC III.1 & 2).

The southwest corner fence was built in 2007 (PTI No. 81-96D, FG-DisplayCoat, SC III.3).

The booth filters are installed and operating properly and HVLP guns are used (PTI No. 81-96D, FG-DisplayCoat, SC IV.1 & 2).

US EPA Reference Method 24 alternative must still be approved. G. P. Johnson now uses Environmental Data Sheets and MSDS for the material (VOC, HAP, etc.) content (PTI No. 81-96D, FG-DisplayCoat, SC V.1).

The required calculations are done, VOC & HAP contents are kept, monthly and daily coating usage records are kept (PTI No. 81-96D, FG-DisplayCoat, SC VI.1, 2, 3 & 4).

Approximately 46 ft stack is present (PTI No. 81-96D, FG-DisplayCoat, SC VIII: 45 ft)

Less than 1.68 tons of HAP per year are emitted (PTI No. 81-96D, FG-Facility, SC I.1 & 2: 9 tpy single HAP and 22.5 tpy aggregate HAPs) based upon 1.68 tons of VOC per year.

I asked Mr. Kevin Krauzowicz to install and inspect the filters such that they fit, at all times, snugly without gaps and holes.

Carpenter shop wood cutting and grinding machines

There are twenty wood cutting (2 sanders, 18 table saw, beam saw, CNC routers, etc.) machines.

Each machine is equipped with a capture device and a ventilation system. Each ductwork from a machine is connected to a common manifold. The manifold is ducted outside to a baghouse consisting of 12 bags with pulse-jet air bag cleaning. After filtration of particulate matter, clean air is recycled into the plant in heating season (winter) and discharged to outside air in cooling season (summer).

The machines are exempt from Rule 336.1201 (Permit-to-Install) pursuant to Rule 336.1285(l). I asked Mr. Clincke to empty the hoppers promptly so that damage to bags was not caused and spill does not occur.

CONCLUSION

There are errors in the permit (PTI # 81-96D) regarding paint spray booths. G. P. Johnson did not correct the permit. Ms. Manzella, during the FY 2014 inspection, stated that she would apply for a permit modification.

NAME

J. Stevanak

DATE

04/22/2014

SUPERVISOR

CJE