



CABINETWORKS
GROUP

November 26, 2024

Amy DeVita-McBride
Cleaner Air Oregon Project Engineer
Oregon Department of Environmental Quality
700 NE Multnomah St., Suite 600
Portland, OR 97232-4100

Re: CAO Emission Inventory Form and Supplemental Data Submittal

Dear Ms. DeVita-McBride,

As stated in the August 29, 2024 Cleaner Air Oregon (CAO) program call in letter issued by the Oregon Department of Environmental Quality (ODEQ), acpi Wood Products, LLC (acpi) is required to perform a Risk Assessment in accordance with CAO program rules. The first step of the Risk Assessment requires the submittal of air toxics emission inventory data for the acpi Independence facility by November 27, 2024.

In accordance with CAO Risk Assessment guidance, the emission inventory submittal includes the following:

- AQ520 Cleaner Air Oregon Emission Inventory form
- AQ523 Categorically Exempt Toxics Emission Units form
- Process Flow Diagram
- Documentation of Toxic Air Contaminants, Control Devices, Emission Factors and Calculation Procedures
- Documentation of Exempt Activities
- Material Safety Data Sheets/Environmental Data Sheets Supporting Mass Balance Calculations

The information listed above is provided via e-mail along with this transmittal letter. The process flow diagram and additional emission calculation documentation is included in the excel spreadsheet: Independence Product Calculations.xlsx.

The following discussion has been provided to address the air toxics calculation methodology and exempt activities.

[Calculation Methodology](#)

Actual emissions for the coating booths, TEU 1 – TEU 16, are based on one year of recorded material usage data for the period from September 1, 2023 through August 31, 2024. This period was chosen because it reflects a recent coating product vendor change to Sherwin Williams products and is more representative of current/future operations than calendar 2023 data.

Coating usage values are based on recorded material usage types and cabinet production rates. Production records provide a monthly value for each coating type (i.e., stain, enamel, topcoat, etc.) in units of gallons of coating per cabinet produced. The monthly average values for each coating type were compiled and the maximum value for each coating type was used to provide a conservative emission estimate. The production details are included on the “Production” tab of the attached excel spreadsheet.

There are three coating lines at the facility that each utilize five coating booths. Each coating line uses the same coating materials because each line processes a different part of the overall cabinet assembly and must apply the same coating to each part. All lines are staffed with the same number of spray guns and coating staff, therefore, production usage between the lines is nearly equivalent.

Potential emissions were calculated based on the maximum number of cabinets that could be produced by the facility. The current operating permit for the facility lists the maximum cabinet production rate at 100 cabinets per hour (876,000 cabinets per year). These maximum cabinet production rates were used in conjunction with the cabinet coating usage values (gal/cabinet) to calculate the maximum potential emissions. At this time, the requested PTE and Capacity are assumed to be equal. If the risk calculations require a reduced emission rate to demonstrate acceptable levels of risk, a requested PTE will be proposed.

Maximum potential emissions for each coating booth TEU are also based on the assumption that the worst-case (highest emitting) coating product for each individual air toxic is used continuously in each booth. This results in the potential emissions representing a hybrid mixture that is unlikely to occur under normal operating conditions but provides a worst case scenario to assess risk and potential operating limitations. This is represented on Form AQ520 by providing a separate material identified as “All Materials Potential Emissions” on the Pollutant Emissions Tab.

Non-Production Activities

As indicated on form AQ523, acpi has tail pipe emissions from on-site motor vehicle operation. One diesel yard truck is used to move trailers on-site that are associated with cabinet shipping. Operation of the diesel yard truck is limited and it uses approximately 250 gallons of fuel per year. The facility also utilizes four small propane fired forklifts that operate indoors. Approximately 1,000 gallons of propane is used per year.

The acpi facility has eleven natural gas-fired infrared space heaters, each rated at 125,000 Btu per hour. Based on natural gas emission calculations, emissions of individual air toxics are well below the Appendix A-1: Reporting Thresholds for Volatiles and Gases included on the Cleaner Air Oregon Exempt TEU Reporting guidance.

A small amount of nonproduction welding is performed for maintenance activities at the acpi facility. Based on a review of purchase records approximately 35 pounds per year of E70S GMAW welding electrode is used. This amount is well below the Appendix B: Reporting Thresholds for Welding Activities included on the Cleaner Air Oregon Exempt TEU Reporting guidance.

Miscellaneous office activities, janitorial activities, grounds keeping, and fire suppression systems are minimal and assumed insignificant. Each piece of air conditioning equipment at acpi has a capacity of less than 50 pounds of charge.

We look forward to working with ODEQ on the completion of the risk assessment process. If you have any questions regarding the submitted information or need additional information. Please do not hesitate to contact me, or our consultant, Greg Raetz, HDR Engineering, Inc. at graetz@hdrinc.com.

Sincerely,

Cabinetworks Group

A handwritten signature in black ink, appearing to read "John Hamlin", with a small dot at the end of the line.

John Hamlin
Plant Manager

c. Greg Raetz, HDR Engineering, Inc.