



March 6, 2023

**E-mail**

Doug Maples  
Vice President of Plywood Manufacturing  
Emerald Forest Products, Plant #1  
P.O. Box 2746  
Eugene, OR 97402

Re: Cleaner Air Oregon Emissions Inventory Submittal Updated December 2, 2022

Dear Doug Maples:

LRAPA has completed a review of the Cleaner Air Oregon Emissions Inventory (AQ520 Form) submitted by the facility on December 2, 2022 for Emerald Forest Products – Plant #1 (EFP1- Source Number 200528). The December 2, 2022 submittal from EFP1 was in response to LRAPA's request for updates to the Cleaner Air Oregon Emissions Inventory (CAO EI - AQ520 Form) submitted on April 15, 2022.

In general, LRAPA agrees with the emissions estimation approaches for the variety of toxic emissions units at the facility. During our review of the updated information received, we cataloged the following list of concerns that will need clarification, or additional information:

Emission Unit (EU)	Comments
EU-VDRY1-NG and EU-Boiler-NG	Natural gas combustion does not need to be limited. CAO rules require the risk from natural gas combustion be estimated, but the risk is excluded from any risk limitations.
EU-Boiler-Diesel	<p>The Max Daily Requested PTE and Capacity values for EU-Boiler-Diesel were reduced from 6,301 gallons/day to 3,780 gallons/day in the December 2, 2022 submittal. Similar to our overall comments in the September 13, 2022 letter to the facility, LRAPA remains concerned that the facility-identified boiler diesel fuel values may not represent true capacity of the equipment.</p> <p>Capacity is the maximum throughput that a piece of equipment can physically handle, running full time for the whole day or year.</p> <p>Requested PTE is the throughput that is used to set limits based on modeled health risk.</p> <p>LRAPA does not believe that the correct capacity of the boiler operating on fuel oil was included in the form. We believe the true capacity to be</p>



Emission Unit (EU) and/or Process	Comments
	<p>Xylene (mixture), including m-, o-, and p-xylene), 0.0033 lb/Msf-3/8"</p> <p><b>Plywood Press, PF Resin, Softwood, Uncontrolled</b></p> <p>Acetone 0.0065 lb/Msf-3/8"</p> <p>Methyl ethyl ketone 0.00087 lb/Msf-3/8"</p> <p>Methyl isobutyl ketone 0.00071 lb/Msf-3/8"</p>
EU-PLYPRS	Propionaldehyde may be removed as a TAC from the plywood press portion of the CAO EI. It is listed as below detection limit (BDL) in AP-42.
EU-PLYMISC	<ul style="list-style-type: none"> <li>EPA's AP-42 has an acetone emission factor for "Softwood plywood saws (includes 3 saws, hog, and sander)" that LRAPA believes should be included under EU-PLYMISC. The emission factor for acetone is 0.0041 lb/MSF from AP-42 Chapter 10.5.</li> <li>The calculated cells in columns J-L for annual emissions of TACs from EU-PLYMISC erroneously use production values from EU-PLYPRS.</li> </ul>
EU-Fugitive	During a site visit in late 2022, LRAPA determined that EFP uses sodium hydroxide in a glue mixture (at 50% solution) and in the boiler water chemicals. Therefore, LRAPA believes sodium hydroxide is not reportable as a "material balance" activity, or otherwise reportable.
EU-BOILER-Diesel	<p>Based on the available information, LRAPA believes the maximum hourly fuel oil usage at capacity would be 310.65 gallons per hour using the DEQ default Air Toxics Emission Inventory (ATEI) fuel oil heat input:</p> <p>42.87 MMBtu/hr boiler rating * gal/0.138 MMBtu = 310.65 gallons per hour or a 24-hour maximum of 7,456 gallons.</p>

For convenience and to assist the facility in responding to these items, LRAPA has attached an edited AQ520 with most of these items included.

Please let me know if you need any further information or assistance, or if you would like to meet to discuss.

Sincerely,



Max Hueftle, P.E.  
Operations Manager

cc: DJ Burrows, PBS Environmental