

Lane Regional Air Protection Agency
 Simple Air Contaminant Discharge Permit (Simple-ACDP)

REVIEW REPORT

Whittier Wood Products Company

3787 West First Avenue
 Eugene, Oregon 97402
<http://www.whittierwood.com/>

Permit No. 208894

Source Information:

SIC	2511
NAICS	337122

Source Categories LRAPA Title 37, Table 1	Part B: 69. Surface coating operations > 250 gals/mon
Public Notice	II

Compliance and Emissions Monitoring Requirements:

Unassigned emissions	N
Emissions credits	N
Compliance schedule	N
Source test [date(s)]	N

COMS	N
CEMS	N
Ambient monitoring	N

Reporting Requirements

Annual report (due date)	Feb 15
Emission fee report (due date)	N
SACC (due date)	N
Quarterly report (due date)	N

Monthly report (due dates)	N
Excess emissions report	Y
Other report	N

Air Programs

NSPS (list subparts)	N
NESHAP (list subparts)	N
CAM	N
Regional Haze (RH)	N
Synthetic Minor (SM)	N
Part 68 Risk Management	N
Title V	N
ACDP (SIP)	N

Major HAP Source	N
Federal Major Source	N
New Source Review (NSR)	N
Prevention of Significant Deterioration (PSD)	N
Acid Rain	N
Clean Air Mercury Rule (CAMR)	N
TACT	N

1. General Background Information

Lane Regional Air Protection Agency (LRAPA) has reviewed the permit application received on April 20, 2016. The contents of the application and subsequent correspondence with the facility were the basis for the contents within this review report.

Whittier Wood Product Company (Whittier or “facility”) has operated a wood furniture manufacturing facility at 3787 West First Avenue in Eugene, Oregon 97402 since 1975. The facility operates four (4) spray booths and a wood shop area where bookcases are manufactured, and repair work is performed on damaged furniture components shipped from Whittier’s main manufacturing operation in Vietnam. In 2006/2007, 95% of Whittier’s operation were moved to Vietnam leaving only manufacturing bookcases at the facility. All six (6) of the baghouses have been removed and the sawdust created in the wood shop area is collected in portable collection bag systems throughout the main building. The sawdust is collected in 55-gallon drums and when full, dumped into a 30-yard wood container outside.

In July 1981, Whittier was issued an ACDP. The facility was previously considered a “Synthetic Minor” because the facility emissions had the potential to be above the major source thresholds for HAPs. In October 2008, the Whittier ACDP was changed to a Simple “High” due to rule changes that eliminated Synthetic Minor permits. At that time, the facility was not required to obtain a Standard ACDP since 95% of their manufacturing was sent to a different location outside of LRAPA jurisdiction and all the emissions from the facility were reduced.

2. Reasons for Permit Issuance

This is a renewal to Whittier’s current Simple Air Contaminant Discharge Permit (ACDP) issued on December 5, 2011. Whittier operates a facility that does wood furniture manufacturing of under 25,000 board feet/maximum 8-hour input, and a surface coating operation of over 250 gallons per month.

At the time of this renewal, the facility no longer has production over 25,000 bd. ft./maximum 8-hour input and will now be listed under LRAPA Title 37, Table 1, Part B: 69. Surface coating operations: coating operations whose actual or expected usage of coating materials is greater than 250 gallons per month, excluding sources that exclusively use non-VOC and non-HAP containing coatings). The facility is still required to maintain a Simple ACDP.

3. Attainment Status

The facility is located in a maintenance area for PM₁₀ and CO and in an attainment for all other pollutants.

4. Emission Units Description

Emission Unit	Emission Units ID	Pollution Control Device
Furniture Coating Operations: 4 Paint Booths	Booths	Spray Booth Filters
Aggregate Insignificant Activities: Furniture Millwork – Sawdust Handling	IEU	Indoor portable dust collection systems

5. Emission Limitations

The facility must follow operational and work practice to reduce emissions from the booths, such as, high volume, low pressure (HVLP) spray gun technology, filters must achieve at least 98% capture of paint overspray, spray gun cleaning must be done to minimize emissions, the permittee must ensure that personnel are trained properly for spray application, and that all storage containers are kept closed at all times except when adding or removing materials.

The facility must update their Inspection & Maintenance (I&M) Plan, as needed, and submit to LRAPA within 30 days of update for approval.

The facility must keep fugitive emissions from leaving the property boundary.

6. Typically Achievable Control Technology (TACT)

LRAPA 32-008 requires an existing emission unit at a source to meet TACT if the emissions unit has emissions of criteria pollutants greater than ten (10) tons per year of any gaseous pollutant or five (5) tons per year of particulate, the emissions unit is not subject to the emissions standards under LRAPA Title 30, Title 32, Title 33, Title 38, Title 39, or Title 46 for the pollutants emitted, and the source is required to have a permit. While a formal TACT evaluation has not been conducted, LRAPA has determined that gaseous control devices for this type of facility are not typically used.

7. Enforcement Actions

There have been no enforcement actions against the facility since the last permit renewal.

8. Source Test

No source testing has been performed at this facility. Safety Data Sheets (SDS) or equivalent documentation and material usage are used to determine the facility's VOC and HAP emissions. There are no baghouses remaining at the facility, so no source test is required on baghouse emissions.

9. Plant Site Emissions Limits (PSELs)

The following annual (rolling 12-month) PSELs are detailed in the permit:

Annual Plant Site Emission Limits (PSELs)
(tons per year)

Source	PM	PM ₁₀	PM _{2.5}	CO	NO _x	SO ₂	VOC	GHGs	Individual HAP	Aggregate HAP
Totals	NA	NA	NA	NA	NA	NA	39	NA	9	24

- The proposed PSELs for VOC and HAP emissions are over the de minimis level but below the SER level and are equal to the Generic PSELs in accordance with LRAPA 37-0064(3)(b).
- PSELs for PM, PM₁₀, PM_{2.5}, CO, NO_x, SO₂, and GHGs are not included in this permitting action because the facility does not have any emission units that produce these pollutants in the emission limits that require that a PSEL be set.

- The PSEL is a federally enforceable limit on the potential to emit.
- The facility is required to record monthly usage of all VOC and HAP-containing raw materials and conduct a mass balance of VOC and HAP-containing raw material usage to determine compliance with the 12-month rolling VOC and HAP PSELs.

10. The Baseline Emission Rate (BER) and Significant Emission Rate (SER)

Pollutant	Baseline Emission Rate (tons/yr)	Netting Basis		Plant Site Emission Limits (PSEL)			SER (tons/yr)
		Previous (tons/yr)	Proposed (tons/yr)	Previous PSEL (tons/yr)	Proposed PSEL (tons/yr)	PSEL Increase (tons/yr)	
PM	13	0	0	24	NA	--	25
PM ₁₀	13	0	0	14	NA	--	15
PM _{2.5}	NA	0	0	9	NA	--	10
SO ₂	0	0	0	NA	NA	--	40
NO _x	0	0	0	NA	NA	--	40
CO	0	0	0	NA	NA	--	100
VOC	9.6	0	0	39	39	0	40
GHG (CO ₂ e)	0	0	0	NA	NA	--	75,000
Individual HAP	NA	NA	NA	9	9	--	NA
Aggregate HAP	NA	NA	NA	24	24	--	NA

- The baseline emission rate was established in the previous permit actions and was based on actual production totals from 1978, except for GHG as specified in LRAPA 42-0048. The facility did not operate any emission units that emit GHGs during the GHG baseline period of 2000-2010.
- For Simple ACDPs, the proposed PSELs are equal to the Generic PSEL for all pollutants that are emitted at more than the de minimis level as defined in LRAPA Title 12.
- The netting basis is zero for Simple ACDPs per LRAPA 42-0040.
- The PSEL increase over the baseline is less than the significant emission rate, as defined in LRAPA Title 12 for all criteria pollutants, thus no further air quality analysis is required at this time.

11. Hazardous Air Pollutants (HAPs)/Toxic Air Contaminants

Prior to 2010, Whittier HAP actual emissions were over 50% of the “major source thresholds” for both a single HAP and combined HAPs and the facility was classified as a synthetic minor source and operated under a Synthetic Minor ACDP. Due to permanent changes at the facility, prior to the 2011 renewal, the HAPs emissions were significantly reduced. The facility emissions were reevaluated, and it was determined that Whittier would emit less than 50% of the “major source thresholds” for HAPs and was issued a Simple “High” ACDP.

Currently the facility’s highest single HAP is Toluene at 0.02 tons per year and combined HAPs at 0.13 tons per year.

12. New Source Review (NSR) and prevention of Significant Deterioration (PSD)

Whittier is not subject to NSR or PSD for the affected criteria pollutants. Since the proposed PSEs for all regulated pollutants are below the Significant Emission Rates (SERs) established in LRAPA Title 12, the facility is not subject to LRAPA’s NSR requirements for PM₁₀ nor the PSD requirements for VOC.

13. National Standards for Hazardous Air Pollutants (NESHAP).

The facility is an “area source” for HAPs and it is not subject to any National Standards for Hazardous Air Pollutants (NESHAP) at this time.

14. New Source performance Standards (NSPSs)

There are no emission units at the facility that are subject to any New Source Performance Standards.

15. Recordkeeping

The facility is required to keep and maintain a record of the following information for a period of five (5) years:

Activity	Parameter	Units	Recording Frequency
VOC/HAP-containing Material Usage	Material Usage	Gallons or Pounds	Monthly
VOC/HAP-containing Material Usage	Density of Material	Pounds per Gallon	Maintain current information at all times
VOC-containing Material Usage	VOC Content	% By Weight	Maintain current information at all times
HAP-containing Material Usage	Individual HAP Content	% By Weight	Maintain current information at all times
Paint Booth Filter Particulate Matter Control Efficiency	Control Efficiency	%	Maintain documentation from each manufacturer
Spray Application Training	Training Logs / Certification	NA	Maintain documentation of program or training for spray coating personnel
Paint Booth Inspections	Occurrence	NA	Each Inspection
Paint Booth Filter Replacement	Occurrence	NA	Upon Replacement
Inspection and Maintenance Plan	Document	NA	Maintain the current version on-site

- VOC/HAP-containing materials include, but are not limited to, coatings, lacquers, thinners, stains, topcoats, solvents, adhesives, cleaning, and wash-off materials.
- The density and VOC/HAP content information must be supplied from Safety Data Sheets (SDS) or equivalent documentation provided by the manufacturer/supplier of the VOC/HAP containing material

16. Reporting Requirements

The facility is required to submit an annual report by February 15th each year to include the VOC/HAP emission data as required by Condition 15 to document compliance with the PSEs.

17. Public Notice

The draft permit was on public notice from June 26, 2019 to July 25, 2019. No written comments were submitted during the 30-day comment period.

BAE/cmw
7/29/2019

Emission Calculations for PM/PM₁₀/PM_{2.5} from Paint Booth Overspray (EU-Booths)

Booth Usage per Year (in gallons)	
Annual Reporting Years	Yearly Usage (gallons)*
2011	4,570
2012	4,832
2013	5,110
2014	5,058
2015	3,718
2016	2,594
2017	3,775
2018	4,388
*Based on annual reports for each year	

Products Used in 2013	Total Usage Annual	Product Density	Total Usage Weight
	Gallons/year	lb/gal	lb/year
Wood Stain (Solvent Base)	0	6.95	0.00
Relvette Sealer	1,631	7.32	11,938.92
Black Relvette	2	7.61	15.22
Relvette Topcoat	1,128	7.6	8,572.80
Lacquer Thinner	413	6.72	2,775.36
Raw Wood Sealer	1	7.46	7.46
SW Dull Rub Lacquer	0	7.64	0.00
Glazed Cherry NGR #506-D020-205	0	6.71	0.00
Glazed Cherry NGR #205	895	6.69	5,987.55
Glazed Cherry W/S	194	7.89	1,530.66
New Caffé NGR	537	6.79	3,646.23
New Caffé Shade/Toner	125	7.08	885.00
Caffé Glaze Stain	85	8.9	756.50
Spice Toner	50	7.52	376.00
Whittier Washcoat	44	7.06	310.64
Spic Glaze	5	7.06	35.30
Total	5,110		36,837.64

Potential PM Emission using highest recent historical calendar year usage of 2013		
Spray Booths Operations:		
PM PTE = Using 2013 annual reporting data (lb/gal x Max. yearly usage rate (gal/yr) x (60% Transfer Efficiency) x (98% Removal (Filter) Efficiency)/2000 (lb/ton)		
Transfer efficiency =	60	% (Estimate for HVLP application
Removal (Filter) efficiency =	98	% Based upon assumed 40 CFR 63, Subpart 6H % rate allowed
Total PM PTE =	0.15	tons/year
The particulate matter emission estimation method used does not include solids by weight information, but rather uses full amount used for the year of 2013, which conservatively overestimates the particulate matter from overspray.		