

ASSIGNMENT
to
GENERAL AIR CONTAMINANT DISCHARGE PERMIT

Lane Regional Air Protection Agency
1010 Main Street
Springfield, OR 97477
(541) 736-1056

Issued To:
Whitsell Manufacturing, Inc.
32910 East Saginaw Road
Cottage Grove, OR 97424

Information Relied Upon:
Application No.: 69241
Date Received: February 3, 2023

Plant Site Location:
32910 and 32941 East Saginaw Road
Cottage Grove, OR 97424

Land Use Compatibility Statement:
Approving Authority: Lane County
Approval Date: October 13, 2010 and
May 18, 2023

ASSIGNMENT: The permittee identified above is assigned by the Lane Regional Air Protection Agency to the General ACDP listed below in accordance with ORS 468A.040, LRAPA title 37 Section 37-0060 and based on the land use compatibility findings included in the permit record.



Susannah Sbragia, Interim Director

2-27-2024
Dated

General ACDP Issued in Accordance with LRAPA Section 37-0060:

General ACDP Number	Expiration Date	Source Category Description
AQGP-010	09/05/2028	Sawmills and/or Planing Mills, 25,000 or more bd.ft./maximum 8 hr. finished product
Rule Citation	LRAPA 37-8010, Table 1, Part B, 62	
SIC	2421	
NAICS	321113	

SUPPLEMENTAL INFORMATION:

Facility Contact:		
Name:	Bonnie Parmenter	
Title:	CFO	
Phone number:	541-726-6637	
e-mail address:	bonniewhitsellmfg@gmail.com	
Permit Summary:		
Source Test Requirement	No	N/A
NSPS (40 CFR Part 60)	No	N/A
NESHAP (40 CFR Part 63)	No	N/A
Reports Required:		
Annual	Yes	February 15th
NSPS	No	N/A
NESHAP	No	N/A
Other	No	N/A
Public Notice	Category I	
Application review report:		
LRAPA has reviewed the application for assignment to the General ACDP and determined that the application is complete and the subject facility qualifies for assignment to the General ACDP.		



GENERAL AIR CONTAMINANT DISCHARGE PERMIT

Lane Regional Air Protection Agency
1010 Main Street
Springfield, OR 97477
Telephone: (541) 736-1056

This permit is issued in accordance with the provisions of ORS 468A.040 and LRAPA 37-0060

ISSUED BY THE LANE REGIONAL AIR PROTECTION AGENCY

Merlyn Hough, Director

SEP 5 2018

Dated

Sawmill, planing mill, or millwork (including kitchen cabinets and structural members), 25,000 or more board feet per shift of finished product and plywood manufacturing and/or veneer drying. NAICS 221330, 321113, 321211, 321212, 321213, 321214, 321911, 321912, 321918, 321920, 321999, 337110, 337215. SIC 2421, 2426, 2431, 2434, 2435, 2436, 2439, or 4961.

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1.0 PERMIT ASSIGNMENT

1.1 Qualifications

The permittee must meet all of the following conditions in order to qualify for assignment to this General Air Contaminant Discharge Permit (ACDP):

- a. The permittee is performing activities listed on the cover page, including sawing, planing, sanding, chipping, kiln drying, plywood pressing and surface coating along with supporting activities such as material conveyors (mechanical and pneumatic), veneer dryers, and boilers.
- b. The permittee does not operate a wood-fired boiler with a maximum design heat input capacity of greater than or equal to 30 MMBtu/hr.
- c. A Simple or Standard ACDP is not required for the source.
- d. The source is not having ongoing, recurring or serious compliance problems.

1.2 Assignment

LRAPA will assign qualifying permittees to this permit that have and maintain a good record of compliance with LRAPA's regulations and that LRAPA determines would be appropriately regulated by a General ACDP. LRAPA may rescind assignment if the permittee no longer meets the requirements of LRAPA 37-0025(2), 37-0060 and the conditions of this permit.

1.3 Permitted Activities

The permittee is allowed to discharge air contaminants from processes and activities related to the air contaminant source(s) listed on the first page of this permit until this permit expires, is modified, revoked or rescinded as long as the permittee complies with the conditions of this permit. If there are other emissions activities occurring at the site besides those listed on the cover page of this permit, the permittee may be required to obtain an associated General ACDP Attachment or a Simple or Standard ACDP, if applicable.

1.4 Relation to Local Land Use Laws

This permit is not valid outside of Lane County, or at any location where the operation of the permittee's processes, activities, and insignificant activities would violate any local land use or zoning laws. For operation outside of Lane County, contact Oregon Department of Environmental Quality for any necessary permits or notifications at (503) 229-5359. It is the permittee's sole responsibility to obtain local land use approvals as, or where, applicable before operating this facility at any location.

2.0 EMISSION STANDARDS AND LIMITS

- 2.1 Visible Emissions** The permittee must comply with the following visible emission limits, as applicable:
- a. Visible emissions from sources, other than wood-fired boilers, must not equal or exceed an average of 20 percent opacity.
 - b. Visible emissions from wood-fired boilers installed, constructed or modified prior to June 1, 1970, must not equal or exceed:
 - i. An average of 40 percent opacity through December 31, 2019.
 - ii. An average of 20 percent opacity on or after January 1, 2020, with one or more of the following exceptions:
 - Visible emissions may equal or exceed an average of 20 percent opacity but may not equal or exceed 40 percent opacity during grate cleaning operations provided the grate cleaning is performed in accordance with a grate cleaning plan approved by LRAPA; or
 - LRAPA may approve a boiler specific limit greater than an average of 20 percent opacity, but not to equal or exceed an average of 40 percent opacity, based on the opacity measured during a source test that demonstrates compliance with LRAPA 32-020(2) as provided in LRAPA 32-010(4)(b)(B).
 - c. Visible emissions from wood-fired boilers installed, constructed, or modified after June 1, 1970 but before April 16, 2015, must not equal or exceed an average of 20 percent opacity.
 - d. Visible emissions from wood-fired boilers installed, constructed, or modified after April 16, 2015, must not equal or exceed an average of 20 percent opacity.
 - e. The visible emissions limitation in this condition is based upon a period or periods aggregating more than three-

minutes in any one hour. Observations shall be recorded at 15-second intervals as specified in LRAPA 32-010(2).

- f. The visible emissions standards in this condition do not apply to fugitive emissions from the source.

2.2 Particulate Matter Emissions - General The permittee must comply with the following particulate matter emission limits (i.e., total particulate matter, filterable plus condensable), as applicable. This condition does not apply to fugitive emission sources. Compliance with the emissions standards in this condition is determined using Oregon Method 5, or an alternative method approved by LRAPA.

- a. Particulate matter emissions from any fuel burning equipment installed, constructed, or modified before June 1, 1970 must not exceed:
- i. 0.10 grains per dry standard cubic foot corrected to 50% excess air provided that all representative compliance source test results (refer to Condition 2.2.d for the definition of 'representative compliance source test results') collected prior to April 16, 2015, demonstrate emissions no greater than 0.080 grains per dry standard cubic foot corrected to 50% excess air;
 - ii. If any representative compliance source test results collected prior to April 16, 2015, demonstrate emissions greater than 0.080 grains per dry standard cubic foot corrected to 50% excess air, or if there are no representative compliance source test results, then:
 - 0.24 grains per dry standard cubic foot corrected to 50% excess air until December 31, 2019; and
 - 0.15 grains per dry standard cubic foot corrected to 50% excess air on and after January 1, 2020.
 - iii. For equipment or a mode of operation (e.g., backup fuel) used less than 876 hours per calendar year:
 - 0.24 grains per dry standard cubic foot corrected to 50% excess air from April 16, 2015 through December 31, 2019; and
 - 0.20 grains per dry standard cubic foot corrected to 50% excess air on and after January 1, 2020.

- b. Particulate matter emissions from any fuel burning equipment installed, constructed, or modified on or after June 1, 1970, but prior to April 16, 2015, must not exceed:
 - i. 0.10 grains per dry standard cubic foot corrected to 50% excess air provided that all representative compliance source test results collected prior to April 16, 2015, demonstrate emissions no greater than 0.080 grains per dry standard cubic foot corrected to 50% excess air; or
 - ii. 0.14 grains per dry standard cubic foot corrected to 50% excess air, if any representative compliance source test results collected prior to April 16, 2015, demonstrate emissions greater than 0.080 grains per dry standard cubic foot corrected to 50% excess air, or if there are no representative compliance source test results.
- c. Particulate matter emissions from any fuel burning equipment installed, constructed, or modified on or after April 16, 2015, must not exceed 0.10 grains per dry standard cubic foot corrected to 50% excess air.
- d. Particulate matter emissions from any air contaminant source, other than fuel burning equipment, installed, constructed, or modified before June 1, 1970, must not exceed:
 - i. 0.10 grains per dry standard cubic foot if all representative compliance source test results collected prior to April 16, 2015, demonstrate emissions no greater than 0.080 grains per dry standard cubic foot; or
 - ii. If any representative compliance source test results collected prior to April 16, 2015, demonstrate emissions greater than 0.080 grains per dry standard cubic foot, or if there are no representative compliance source test results:
 - 0.24 grains per dry standard cubic foot on or before December 31, 2019; and
 - 0.15 grains per dry standard cubic foot on or after January 1, 2020;
 - iii. For equipment or mode of operation used less than 876 hours per calendar year:

- 0.24 grains per dry standard cubic foot from April 16, 2015 through December 31, 2019; and
 - 0.20 grains per dry standard cubic foot on or after January 1, 2020.
- e. Particulate matter emissions from any air contaminant source, other than fuel burning equipment, installed, constructed, or modified on or after June 1, 1970, but prior to April 16, 2015, must not exceed:
- i. 0.10 grains per dry standard cubic foot if all representative compliance source test results collected prior to April 16, 2015, demonstrate emissions no greater than 0.080 grains per dry standard cubic foot; or
 - ii. 0.14 grains per dry standard cubic foot if any representative compliance source test results collected prior to April 16, 2015, demonstrate emissions greater than 0.080 grains per dry standard cubic foot, or if there are no representative compliance source test results.
- f. Particulate matter emissions from any air contaminant source, other than fuel burning equipment, installed, constructed, or modified on or after April 16, 2015, must not exceed 0.10 grains per dry standard cubic foot.
- g. Representative compliance source test results are data that was obtained:
- i. Between April 16, 2005 and April 16, 2015; and
 - ii. When the emission unit and pollution control device were operating based on the current configuration.
- h. The combined particulate matter emissions from all veneer and plywood mill sources within the plant site, including, but not limited to, sanding machines, saws, presses, barkers, hogs, chippers, and other material size reduction equipment, process or space ventilation systems, and truck loading and unloading facilities, must not exceed a plant specific average hourly emission rate (lbs/hr) determined by multiplying the plant production capacity by one (1.0) pound per 1,000 square feet on a 3/8" basis of finished product for a typical operating shift divided by the number of hours in the operating shift. Excluded from this standard

are veneer dryers, fuel burning equipment, and refuse burning equipment.

- i. In all areas of Lane County, particulate emissions from veneer dryers must not exceed:
 - i. 0.75 lb/1000 square feet (MSF) on a 3/8" basis for direct wood-fired dryers when using fuel with less than or equal to 20% moisture;
 - ii. 1.50 lb/MSF on a 3/8" basis for direct wood-fired dryers when using fuel with greater than 20% moisture; or
 - iii. 0.40 lb/1000 pounds of steam generated in boilers that exhaust combustion gases to the veneer dryer;
 - iv. Exhaust gases from fuel-burning equipment vented to the veneer dryer are exempt from Conditions 2.2a, 2.2b and 2.2c.

2.3 Fugitive Emissions The permittee must comply with the following, as necessary:

- a. The permittee must take reasonable precautions to prevent fugitive particulate matter from becoming airborne from all site operations from which it may be generated. Such reasonable precautions may include, but not be limited to:
 - i. Controlling vehicle speeds on unpaved roadways;
 - ii. Application of water or other suitable chemicals on unpaved roads, material stockpiles, and other surfaces which can create airborne dusts;
 - iii. Full or partial enclosure of material stockpiles in cases where application of water or other suitable chemicals are not sufficient to prevent particulate matter from becoming airborne;
 - iv. Covering, at all times when in motion, open bodied trucks transporting materials likely to become airborne;
 - v. The prompt removal from paved streets of earth or other material (track-out) that may become airborne.
- b. For purposes of this condition, fugitive particulate emissions are visible emissions that leave the permittee's property for a period or periods totaling more than 18 seconds in a six (6)-minute period.
- c. Fugitive emissions are determined by EPA Method 22 at the downwind property boundary.

- d. If requested by LRAPA, the permittee must develop and submit a fugitive emission control plan for LRAPA approval. The plan must include best management practices the permittee will implement to prevent any visible emissions from leaving the property of a source for more than 18 seconds in a six-minute period. The plan must also include monitoring by the permittee, following the procedures of EPA Method 22. Once approved by LRAPA, the permittee must follow the plan.
- 2.4 **Particulate Matter Fallout** The permittee must not cause or permit the emission of any particulate matter larger than 250 microns in size at sufficient duration or quantity, as to create an observable deposition upon the real property of another person.
 - 2.5 **Nuisance and Odors** The permittee must not cause or allow air contaminants from any source to cause a nuisance. Nuisance conditions will be verified by LRAPA personnel.
 - 2.6 **Fuels and Fuel Sulfur Content** The permittee must not use any fuel other than wood, natural gas, propane, butane, ASTM grade fuel oils, or on-specification used oil.
 - a. Fuel oils must not contain more than:
 - i. 0.0015% sulfur by weight (15 ppmw) for ultra-low sulfur diesel;
 - ii. 0.3% sulfur by weight (3,000 ppmw) for ASTM Grade 1 distillate oil;
 - iii. 0.5% sulfur by weight (5,000 ppmw) for ASTM Grade 2 distillate oil or on-specification used oil. The permittee must obtain analyses from the marketer or, if generated on site, have the used oil analyzed, so that the permittee can demonstrate that the used oil does not exceed the used oil specifications contained in 40 CFR Part 279.11, Table 1. Used oil exceeding the used oil specifications in 40 CFR Part 279.11, Table 1 must not be burned;
 - iv. 1.75% sulfur by weight for residual oil (ASTM Grades 4 through 6).
 - 2.7 **Veneer Dryers**
 - a. No person shall willfully cause or permit the installation or use of any means, such as dilution, which, without resulting in a reduction in the total amount of air contaminants emitted, conceals an emission which would otherwise violate this rule;

- b. Where effective measures are not taken to minimize fugitive emissions, LRAPA may require that the equipment or structures in which processing, handling, and storage are done, be tightly closed, modified, or operated in such a way that air contaminants are minimized, controlled, or removed before discharge to the open air;

3.0 OPERATION AND MAINTENANCE REQUIREMENTS

- 3.1 **Work practices** The permittee must perform a maintenance service on each boiler at least once in every 2-year period. As a minimum, the service must include an inspection of the burners and refractory chamber; cleaning, adjustment, and repair as necessary. For water tube boilers, the service must include flushing the tubes.
- 3.2 **Veneer Dryers** Each veneer dryer and associated pollution control equipment must be maintained and operated at full efficiency and effectiveness so that the emissions of air contaminants is kept at the lowest practicable levels.

4.0 PLANT SITE EMISSION LIMITS

4.1 Plant Site Emission Limits (PSEL) Plant site emissions must not exceed the following:

Pollutant	Limit	Units
PM	24	tons per year
PM ₁₀	14	tons per year
PM _{2.5}	9	tons per year
SO ₂	39	tons per year
NO _x	39	tons per year
CO	99	tons per year
VOC	39	tons per year
GHGs (CO ₂ e)	74,000	tons per year
Single HAP	9	tons per year
Combined HAPs	24	tons per year

4.2 Annual Period The annual plant site emissions limits apply to any 12-consecutive calendar month period.

5.0 COMPLIANCE DEMONSTRATION

- 5.1 PSEL Compliance Monitoring for PM, PM₁₀, PM_{2.5}, SO₂, NO_x, CO, VOC and HAP** Compliance with the PSEL, except GHGs, is determined for each 12-consecutive calendar month period based on the following calculation for each pollutant for all processes other than surface coating operations:
- $$E = \Sigma(EF \times F) / (2000 \text{ lb/ton})$$
- where,
- E = pollutant emissions (tons/yr);
- Σ = symbol representing “summation of”;
- EF = pollutant emission factor (see Condition 5.3);
- F = fuel combustion or material throughput (see Condition 6.1c)
- 5.2 VOC and HAP PSEL Compliance Monitoring for Surface Coating Operations** Compliance with the VOC or HAP PSEL is determined for each 12-consecutive calendar month period based on the following calculation plus the emissions calculated in Condition 5.1:
- $$E_{\text{VOC or HAP}} = \Sigma[(C_X \times D_X \times K_X) - W] \times 1 \text{ ton}/2000 \text{ lb.}$$
- where,
- E_{VOC or HAP} = VOC or HAP emissions (tons/yr);
- Σ = symbol representing “summation of”;
- C = Material usage for the period in gallons;
- D = Material density in pounds per gallon;
if K is in units of lb/lb, otherwise D = 1.
- K = VOC or HAP content of the material (lb/lb);
- X = Subscript X represents a specific material;
- W = Weight of VOC or HAP shipped offsite (lbs).
- 5.3 Emission Factors** The permittee must use the default emission factors provided in Condition 13.0 for calculating pollutant emissions, unless alternative emission factors are approved by LRAPA. The permittee may request or LRAPA may require using alternative emission factors provided they are based on actual test data or other documentation (e.g., AP-42 compilation of emission factors) that has been reviewed and approved by LRAPA.
- 5.4 Veneer Dryers**
- LRAPA may require any veneer dryer facility to establish an effective program for monitoring the visible air contaminant emissions from each veneer dryer emission point.

- b. The program shall be subject to review and approval by LRAPA and must consist of a specified minimum frequency for performing visual opacity determinations on each veneer dryer emission point and a specified period during which all records shall be maintained at the mill site for inspection by authorized representatives of LRAPA.
- c. All data obtained must be recorded on copies of a “Veneer Dryer Visible Emissions Monitoring Form” which shall be provided by LRAPA or on an alternative form which is approved by LRAPA.

6.0 RECORDKEEPING REQUIREMENTS

6.1 Operation and Maintenance

The permittee must maintain the following records related to the operation and maintenance of the plant and associated air contaminant control devices:

- a. Sulfur content and analysis of used oil, as required by Condition 2.6iii;
- b. Records for the NSPS and NESHAP boiler(s), as required by this permit; and
- c. Monthly and annual operating parameters as shown in the table below:

Emissions Unit	Process Parameter	Units
Natural gas-fired boilers or heaters	fuel combusted	cubic feet (ft ³)
Propane, butane, or oil-fired boilers or heaters	fuel combusted	gallons
Wood-fired boilers	steam production	pounds of steam
Cyclones	material throughput by type of material	bone dry ton (BDT)
Kiln	material throughput	thousand board feet (MBF)
Veneer Dryer and Plywood Press	material throughput	thousand square feet (MSF)
Surface Coating	material usage	gallons or pounds

Emissions Unit	Process Parameter	Units
VOCs and HAPs	VOC content	pounds per gallon or weight %
	HAP content (single and combined)	pounds per gallon or weight %

6.2 Excess Emissions

The permittee must maintain records of excess emissions as defined in LRAPA Title 36 (recorded on occurrence). Typically, excess emissions are caused by process upsets, startups, shutdowns, or scheduled maintenance. In many cases, excess emissions are evident when visible emissions are greater than 20% opacity for three (3) minutes or more in any 60-minute period. If there is an ongoing excess emission caused by an upset or breakdown, the permittee must immediately take corrective action or cease operation of the equipment or facility no later than 48 hours after the beginning of the excess emissions, unless continued operation is approved by LRAPA in accordance with LRAPA 36-020(4).

6.3 Complaint Log

The permittee must maintain a log of all written complaints and complaints received via telephone that specifically refer to air pollution concerns associated to the permitted facility. The log must include a record of the permittee's actions to investigate the validity of each complaint and a record of actions taken for complaint resolution.

6.4 Retention of Records

Unless otherwise specified, the permittee must retain all records in hard copy or electronic form for a period of at least five (5) years from the date of the monitoring sample, measurement, report, or application and make them available to LRAPA upon request. The permittee must maintain the two (2) most recent years of records onsite.

7.0 REPORTING REQUIREMENTS

7.1 Excess Emissions

The permittee must notify LRAPA by telephone or in person of any excess emissions which are of a nature that could endanger public health.

- a. Such notice must be provided as soon as possible, but never more than one hour after becoming aware of the problem. Notice must be made to the LRAPA office identified in Condition 8.2.

- b. If the excess emissions occur during non-business hours, the permittee must notify LRAPA by calling the Oregon Emergency Response System (OERS). The current number is 1-800-452-0311.
 - c. The permittee must also submit follow-up reports when required by LRAPA.
- 7.2 Complaint Log**

The permittee must maintain a log of all written complaints and complaints received via telephone that specifically refer to air pollution concerns associated to the permitted facility. The log must include a record of the permittee's actions to investigate the validity of each complaint and a record of actions taken for complaint resolution.
- 7.3 Annual Report**

The permittee must submit to LRAPA by **February 15** of each year this permit is in effect, two (2) copies of the following information for the preceding calendar year:

 - a. Annual emissions as calculated according to Conditions 5.1 and 5.2, including the supporting process parameter and emission factor information.
 - b. Records of all planned and unplanned excess emissions events.
 - c. Summary of complaints relating to air quality received by the permittee during the year.
 - d. List permanent changes made in plant process, production levels, and pollution control equipment which affected air contaminant emissions.
 - e. List major maintenance performed on pollution control equipment.
- 7.4 Greenhouse Gas Registration and Reporting**

If the calendar year emission rate of greenhouse gases (CO₂e) is greater than or equal to 2,756 tons (2,500 metric tons), the permittee must register and report its greenhouse gas emissions with LRAPA in accordance with OAR 340-215.
- 7.5 Initial Startup Notice**

The permittee must notify LRAPA in writing of the date a new facility is started up. The notification must be submitted no later than seven (7) days after startup.
- 7.6 Notice of Change of Ownership or Company Name**

The permittee must notify LRAPA in writing using a "Permit Application Form" within 60 days after the following:

 - a. Legal change of the name of the company as registered with the Corporations Division of the State of Oregon; or
 - b. Sale or exchange of the activity or facility.

7.7 Construction or Modification Notices

The permittee must notify LRAPA in writing using a "Notice of Intent to Construct" form, or "Permit Application" form, and obtain approval in accordance with LRAPA Title 34 before:

- a. Constructing or installing any new source of air contaminant emissions, including air pollution control equipment;
- b. Modifying or altering an existing source that may significantly affect the emission of air contaminants;
- c. Making any physical change which increases emissions;
- d. Changing the method of operation, the process, or the fuel use, or increasing the normal hours of operation that result in increased emissions.

7.8 Where to Send Reports and Notices Reports and notices, with the permit number prominently displayed, must be sent to LRAPA as identified in Condition 8.2.

8.0 ADMINISTRATIVE REQUIREMENTS

8.1 Reassignment to the General Permit

A complete application for reassignment to this permit is due within 30 days prior to the expiration date of the General ACDP or within 30 days after the permit is reissued. LRAPA will notify the permittee when the permit is reissued. The application must be sent to the LRAPA office.

- a. If LRAPA is delinquent in renewing the permit, the existing permit will remain in effect and the permittee must comply with the conditions of the permit until such time that the permit is reissued and the source is reassigned to the permit.
- b. The permittee may submit an application for either a Simple or Standard ACDP at any time, but the permittee must continue to comply with the General ACDP until LRAPA takes final action on the Simple or Standard ACDP application.
- c. If a complete application for reassignment to the general permit or Simple or Standard ACDP is filed with LRAPA in a timely manner, the permit will not be deemed to expire until final action has been taken on the application.

8.2 LRAPA Address and Contact Number

All reports, notices, and applications should be directed to the LRAPA office. The LRAPA address and contact number is as follows:

Lane Regional Air Protection Agency
1010 Main Street
Springfield, OR 97477
Telephone: 541-736-1056

- 8.3 LRAPA Website** Information about air quality permits and LRAPA's regulations may be obtained from the LRAPA web page at www.lrapa.org.

9.0 FEES

- 9.1 Annual Compliance Fee** The permittee must pay the annual Compliance Determination Fee specified in LRAPA 37-8020, Table 2, Part 2.c. for a Class Three General ACDP by **December 1** of each year this permit is in effect. An invoice indicating the amount, as determined by LRAPA regulations, will be mailed to the permittee prior to the above date.
- 9.2 Change of Ownership or Company Name Fee** The non-technical permit modification fee specified in LRAPA 37-8020, Table 2, Part 3.a. is due with an application for changing the ownership or the name of the company of a source assigned to this permit.
- 9.3 Where to Submit Fees** Fees must be submitted to:
Lane Regional Air Protection Agency
1010 Main Street
Springfield, OR 97477

10.0 GENERAL CONDITIONS AND DISCLAIMERS

- 10.1 Other Regulations** In addition to the specific requirements listed in this permit, the permittee must comply with all other legal requirements enforceable by LRAPA.
- 10.2 Conflicting Conditions** In any instance in which there is an apparent conflict relative to conditions in this permit, the most stringent conditions apply.
- 10.3 Masking of Emissions** The permittee must not cause or permit the installation of any device or use any means designed to mask the emissions of an air contaminant that causes or is likely to cause detriment to health, safety, or welfare of any person or otherwise violate any other regulation or requirement.

- 10.4 LRAPA Access** The permittee must allow LRAPA's representatives access to the plant site and pertinent records at all reasonable times for the purposes of performing inspections, surveys, collecting samples, obtaining data, reviewing and copying air contaminant emissions discharge records and conducting all necessary functions related to this permit in accordance with ORS 468.095.
- 10.5 Permit Availability** The permittee must have a copy of the permit available at the facility at all times.
- 10.6 Outdoor Burning** The permittee must not conduct any outdoor burning except as allowed by LRAPA Title 47.
- 10.7 Asbestos** The permittee must comply with the asbestos abatement requirements in LRAPA Title 43 for all activities involving asbestos-containing materials, including, but not limit to, demolition, renovation, repair, construction, and maintenance.
- 10.8 Property Rights** The issuance of this permit does not convey any property rights in either real or personal property, or any exclusive privileges, nor does it authorize any injury to private property or any invasion of personal rights, nor any infringement of federal, state, or local laws or regulations.
- 10.9 Permit Termination, Revocation, or Modification** LRAPA may modify or revoke this permit pursuant to LRAPA 37-0060(3), (4), and 37-0082.

11.0 NEW SOURCE PERFORMANCE STANDARDS

- 11.1 NSPS Applicability** Federal requirements apply to boilers for which construction, modification, or reconstruction is commenced after June 9, 1989 and that have a maximum design heat input capacity of 100 million Btu per hour (MMBtu/hr) or less, but greater than or equal to 10 MMBtu/hr. These requirements are in addition to requirements listed elsewhere in the permit. The full text of the federal standards are found in 40 CFR 60, Subpart Dc.
- 11.2 NSPS Definitions**
- a. **Construction** means fabrication, erection, or installation of an affected facility.

- b. **Modification** means any physical change in, or change in the method of operation of, an existing facility which increases the amount of any air pollutant (to which a standard applies) emitted into the atmosphere by that facility or which results in the emission of any air pollutant (to which a standard applies) into the atmosphere not previously emitted.
- 11.3 NSPS Visible Emissions Limit**
- a. If oil is combusted in the boiler, and the heat input is greater than 30 MMBtu/hr, the permittee must not cause to be discharged into the atmosphere any gases that exhibit greater than 20% opacity as a 6-minute average, except for one 6-minute period per hour of not more than 27% opacity.
- b. The opacity standard applies at all times except during periods of startup, shutdown or malfunction.
- 11.4 NSPS Visible Emissions Monitoring**
- a. Visible emissions must be measured and recorded with a continuous opacity monitoring system installed, operated, and maintained in accordance with 40 CFR 60.13 and 60.47c(a) and (b).
- b. The permittee is not required to operate a COMS provided the boiler burns only gaseous fuels and/or fuel oils that contain no greater than 0.5 weight percent sulfur, and the permittee operates the unit according to a written site-specific monitoring plan approved by LRAPA.
- i. This monitoring plan must include procedures and criteria for establishing and monitoring specific parameters for the affected facility indicative of compliance with the opacity standard.
- ii. For testing performed as part of this site-specific monitoring plan, the permitting authority may require as an alternative to the notification and reporting requirements specified in 40 CFR 60.8 and 60.11 that the permittee submit any deviations with the excess emissions report required under 40 CFR 60.48c(c).
- c. If not required to use a COMS due to Condition 11.4b, the permittee must conduct a performance test using EPA Method 9 and the procedures in 40 CFR 60.11 to demonstrate compliance with Condition 11.3 within 45 days of stopping use of an existing COMS or within 180 days after initial startup of the facility, whichever is later. The observation period for EPA Method 9 performance tests may be reduced from 3 hours to 60

minutes if all 6-minute averages are less than 10 percent and all individual 15-second observations are less than or equal to 20 percent during the initial 60 minutes of observation.

- d. The permittee must conduct subsequent EPA Method 9 performance tests using the procedures in Condition 11.4c according to the applicable schedule as follows and as determined by the most recent EPA Method 9 performance test results:
- i. If no visible emissions are observed, a subsequent EPA Method 9 performance test must be completed within 12 calendar months from the date that the most recent performance test was conducted or within 45 days of the next day that fuel with an opacity standard is combusted, whichever is later;
 - ii. If visible emissions are observed but the maximum 6-minute average opacity is less than or equal to 5 percent, a subsequent EPA Method 9 performance test must be completed within 6 calendar months from the date that the most recent performance test was conducted or within 45 days of the next day that fuel with an opacity standard is combusted, whichever is later;
 - iii. If the maximum 6-minute average opacity is greater than 5 percent but less than or equal to 10 percent, a subsequent EPA Method 9 performance test must be completed within 3 calendar months from the date that the most recent performance test was conducted or within 45 days of the next day that fuel with an opacity standard is combusted, whichever is later; or
 - iv. If the maximum 6-minute average opacity is greater than 10 percent, a subsequent EPA Method 9 performance test must be completed within 45 calendar days from the date that the most recent performance test was conducted.

**11.5 NSPS Particulate
Matter Emission
Limits**

For any boiler that has a heat input capacity of 30 MMBtu/hr or greater, and that combusts oil or a mixture of oil with any other fuels, and that commenced construction, reconstruction, or modification after February 28, 2005:

- a. The permittee must not cause to be discharged into the atmosphere any gases that contain particulate matter in excess of 0.030 lbs/MMBtu heat input.
- b. As an alternative to meeting the requirements of Condition 11.5a, particulate matter emissions must not exceed 0.051 lbs/MMBtu heat input and particulate matter emissions must be reduced by 99.8 percent from uncontrolled.
- c. Exemption: Each boiler that combusts only oil that contains no more than 0.50% sulfur by weight or a mixture of 0.50% sulfur by weight oil with other fuels not subject to the particulate emission limit standard under 40 CFR 60.43c and not using a post-combustion technology (except a wet scrubber) to reduce PM or SO₂ emissions is not subject to the PM limit in Condition 11.5a or 11.5b.

11.6 NSPS Particulate Matter Emission Testing

For each boiler subject to the PM and/or opacity standards under Conditions 11.3 and/or 11.5, the permittee must conduct an initial performance test in accordance with 40 CFR 60.45c(a), and must conduct subsequent performance tests as requested by LRAPA, to determine compliance with the standards, except as specified in Condition 11.4.

- a. The permittee must submit to LRAPA the performance test data from the initial and any subsequent performance tests; and
- b. As of January 1, 2012, and within 90 days after the date of completing each performance test, as defined in 40 CFR 60.8, conducted to demonstrate compliance with the NSPS, the permittee must submit relative accuracy test audit (*i.e.*, reference method) data and performance test (*i.e.*, compliance test) data, except opacity data, electronically to EPA's Central Data Exchange (CDX) by using the Electronic Reporting Tool (ERT) (see http://www.epa.gov/ttn/chief/ert/ert_tool.html/) or other compatible electronic spreadsheet. Only data collected using test methods compatible with ERT are subject to this requirement to be submitted electronically into EPA's WebFIRE database.

11.7 NSPS Sulfur Limits The sulfur content of fuel oil burned in the boiler must not exceed 0.5% by weight.

11.8 NSPS Fuel Sulfur Monitoring Unless an approved alternate monitoring frequency is obtained from the EPA Administrator, the permittee must record and maintain records of the amounts of each fuel combusted during each day in each subject boiler.

- a. Except as specified in Condition 11.8c, if oil is burned, the permittee must maintain records of the sulfur content of the fuel oil either by obtaining fuel supplier certifications or sampling and analyzing the fuel oil in accordance with ASTM procedures.
- b. If relying on fuel samples for demonstrating compliance with the fuel sulfur content limits, a sample must be collected and analyzed after each shipment of fuel is added to the storage tank.
- c. For residual oil-fired boilers, the use of fuel supplier certifications to demonstrate compliance are only allowed for boilers with heat input capacities between 10 to 30 MMBtu/hr.

11.9 NSPS Boiler Reporting

Unless an approved alternate monitoring frequency is obtained from the EPA Administrator, the permittee must submit semi-annual reports for periods during which oil was burned that include the following information:

- a. The calendar dates covered in the reporting period;
- b. Each 30-day average sulfur content (weight percent), calculated during the reporting period, ending with the last 30-day period, including reasons for any noncompliance with the emission standards, and a description of corrective actions taken.
- c. Identification of any times when emissions data have been excluded from the calculation of average emission rates, justification for excluding data, and a description of corrective actions taken if data have been excluded for periods other than those during which oil was not combusted in the steam generating unit.
- d. If fuel supplier certifications are used to demonstrate compliance, records of fuel supplier certifications that include the following. In addition to records of fuel supplier certifications, the report shall include a certified statement signed by the permittee that the records of fuel supplier certifications submitted represent all of the fuel combusted during the reporting period.
 - i. For distillate oil:
 - The name of the oil supplier;
 - A statement from the oil supplier that the oil complies with the specifications under the definition of distillate oil in 40 CFR 61.41c;

- and
 - The sulfur content or maximum sulfur content of the oil.
- ii. For residual oil:
 - The name of the oil supplier;
 - The location of the oil when the sample was drawn for analysis to determine the sulfur content of the oil, specifically including whether the oil was sampled as delivered to the facility, or whether the sample was drawn from oil in storage at the oil supplier's or oil refiner's facility, or other location;
 - The sulfur content of the oil from which the shipment came (or of the shipment itself); and
 - The method used to determine the sulfur content of the oil.
- iii. For other fuels:
 - The name of the oil supplier;
 - The potential sulfur emissions rate or maximum potential sulfur emissions rate of the fuel in ng/J heat input; and
 - The method used to determine the potential sulfur emissions rate of the fuel.

Note: If using ASTM grade 3, include the most relevant information depending on whether the blend exhibits the characteristics of a distillate or residual oil.

- e. If residual oil is burned in the boiler and the heat input is greater than 30 MMBtu/hr, the semi-annual report must include a summary of any excess visible emissions recorded by the COMS.
- f. The initial semi-annual report must be postmarked by the 30th day of the third month following the actual date of startup. Each subsequent semi-annual report must be postmarked by the 30th day following the end of the reporting period (July 30th and January 30th).
- g. If fuel supplier certification is used to demonstrate compliance, records of fuel supplier certification as described under Condition 11.9d, as applicable. In addition to records of fuel supplier certifications, the report shall include a certified statement signed by the permittee that the records of fuel supplier certifications

submitted represent all of the fuel combusted during the reporting period.

- h. For a boiler subject to the opacity limit in Condition 3.3, the permittee must submit excess emission reports for any excess emissions that occur during the reporting period and maintain records according to the following requirements, as applicable to the visible emissions monitoring method used.
 - i. For each performance test conducted using EPA Method 9, the permittee must keep the following records:
 - Dates and time intervals of all opacity observation periods;
 - Name, affiliation, and copy of current visible emission reading certification for each visible emission observer participating in the performance test; and
 - Copies of all visible emission observer opacity field data sheets.
 - ii. For each performance test conducted using EPA Method 22, the permittee must keep the following records:
 - Dates and time intervals of all visible emissions observation periods;
 - Name and affiliation for each visible emission observer participating in the performance test;
 - Copies of all visible emission observer opacity field data sheets; and
 - Documentation of any adjustments made and the time the adjustments were completed to the affected facility operation by the permittee to demonstrate compliance with the applicable monitoring requirements.
 - iii. For each digital opacity compliance system, the permittee must maintain records and submit reports according to the requirements specified in the site-specific monitoring plan approved by LRAPA.

**11.10 NSPS
Recordkeeping**

The permittee must maintain on-site, records of the amount and type of fuels burned each day, unless an alternate frequency is obtained from EPA, for a period of at least two (2) years. As an

alternative, if combusting only natural gas, fuels using fuel certification in Condition 11.9d to demonstrate compliance with the SO₂ standard, fuels not subject to an emission standard (excluding opacity), or a mixture of these fuels, the permittee may elect to record and maintain records of the amount of each fuel combusted during each calendar month.

11.11 Construction or Modification

In addition to the Notice of Intent to Construct (NC) requirement in Condition 7.7, the permittee must submit a notification that includes the information specified in 40 CFR 60.48c(a) to LRAPA and the EPA when equipment becomes subject to NSPS as summarized below:

If	Notification of	Due Date
Constructing or installing a new affected NSPS boiler	The date construction began	Within 30 days of commencing construction
	Actual start-up date	Within 15 days after start-up
Modifying existing equipment	The nature of the change, present and future emissions, productive capacity differences, expected completion date of change	60 days prior to expected completion date

11.12 EPA Submittal Address

All submittals to the EPA must be sent to the following address:

Clean Air Act Compliance Manager
US EPA Region 10, Mail Stop: OCE-101
1200 Sixth Avenue, Suite 155
SEATTLE, WA 98101-3123

12.0 NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS

12.1 NESHAP Applicability

- a. The NESHAP applies to industrial, commercial, or institutional oil and biomass-fired boilers.
- b. The NESHAP does not apply to gas-fired boilers if oil is burned only during periods of gas curtailment, gas supply interruption, startups, or for periodic testing, maintenance, or operator training. Periodic testing, maintenance, or operator training on oil shall not exceed a combined total of 48 hours during any calendar year. Records of elapsed time burning oil must be maintained for five (5) years.
- c. A boiler is considered existing if construction or reconstruction of the boiler commenced on or before June 4, 2010.
- d. A boiler is considered new if construction of the boiler commenced after June 4, 2010, and the boiler meets the applicability criteria at the time construction commenced.
- e. A boiler is considered reconstructed if the boiler meets the reconstruction criteria as defined in 40 CFR 63.2, the permittee commenced reconstruction after June 4, 2010, and the boiler meets the applicability criteria at the time reconstruction commenced.
- f. An existing dual-fuel fired boiler meeting the definition of gas-fired boiler, as defined in 40 CFR 63.11237, that meets the applicability requirements of the NESHAP after June 4, 2010 due to a fuel switch from gaseous fuel to solid fossil fuel, biomass, or liquid fuel is considered to be an existing boiler under the NESHAP as long as the boiler was designed to accommodate the alternate fuel.
- g. The NESHAP standards apply at all times the affected boiler is operating, except during periods of startup and shutdown as defined in 40 CFR 63.11237, during which time the permittee must comply only with Table 1.

12.2 NESHAP Particulate Matter Emission Limit

- a. For new or reconstructed oil-fired boilers, that meet the applicability criteria at the time construction commenced, with heat input capacities of 10 MMBtu/hr or greater, and that are not considered seasonal or limited-use boilers, the permittee must achieve less than or equal to 0.030 lbs/MMBtu of heat input, except during periods of startup and shutdown.

**12.3 NESHAP Work
Practice Standards**

- b. For new or reconstructed biomass-fired boilers, that meet the applicability criteria at the time construction commenced, with heat input capacities between 10 and 30 MMBtu/hr or greater, and that are not considered seasonal or limited-use boilers, the permittee must achieve less than or equal to 0.070 lbs/MMBtu of heat input, except during periods of startup and shutdown.
 - c. The permittee must demonstrate initial compliance with the emission limit specified in Condition 12.2 by conducting a performance (stack) test according to 40 CFR 63.11212 and Table 2 in Appendix A to this permit.
- a. For new or reconstructed biomass-fired or new or reconstructed oil-fired boilers with heat input capacity of 10 MMBtu/hr or greater, the permittee must minimize the boiler's startup and shutdown periods and conduct startups and shutdowns according to the manufacturer's recommended procedures, if available. If manufacturer's recommended procedures are not available, the permittee must follow recommended procedures for a unit of similar design for which manufacturer's recommended procedures are available. The permittee must submit a signed statement in the Notification of Compliance Status report that indicates that they conducted startups and shutdowns according to the manufacturer's recommended procedures or procedures specified for a boiler of similar design if manufacturer's recommended procedures are not available.
 - b. For biomass-fired boilers or oil-fired boilers with heat input capacity greater than 5 MMBtu/hr that are not seasonal or limited-use boilers and do not use an oxygen trim system that maintains an optimum air-to-fuel ratio, the permittee must conduct a tune-up of the boiler biennially as specified in Condition 12.7. Each biennial tune-up must be conducted no more than 25 months after the previous tune-up. For new or reconstructed boilers, the first biennial tune-up must be no later than 25 months after initial startup of the new or reconstructed boiler. The permittee must submit a signed statement in the Notification of Compliance Status report that indicates that the permittee conducted an initial tune-up of the boiler.
 - c. For oil-fired boilers with heat input capacity equal to or less than 5 MMBtu/hr, or biomass and oil-fired boilers that are seasonal or limited-use boilers or that use an

oxygen trim system that maintains an optimum air-to-fuel ratio, the permittee must conduct a tune-up of the boiler every 5 years as specified in Condition 12.7. Each 5-year tune-up must be conducted no more than 61 months after the previous tune-up. For new or reconstructed boilers, the first 5-year tune-up must be no later than 61 months after initial startup. The permittee may delay the burner inspection and inspection of the system controlling the air-to-fuel ratio until the next scheduled unit shutdown, but must inspect each burner and system controlling the air-to-fuel ratio at least once every 72 months. If an oxygen trim system is utilized on a unit without emission standards to reduce the tune-up frequency to once every 5 years, set the oxygen level no lower than the oxygen concentration measured during the most recent tune-up. The permittee must submit a signed statement in the Notification of Compliance Status report that indicates that the permittee conducted an initial tune-up of the boiler.

12.4 NESHAP General Compliance Requirements

At all times, the permittee must operate and maintain any affected source, including associated air pollution control equipment and monitoring equipment, in a manner consistent with safety and good air pollution control practices for minimizing emissions. The general duty to minimize emissions does not require the permittee to make any further efforts to reduce emissions if levels required by this standard have been achieved.

12.5 NESHAP Initial Compliance Requirements

- a. For any existing affected boiler, the permittee must demonstrate compliance with the NESHAP upon assignment to this permit, including meeting the requirement to perform an energy assessment, if applicable.
- b. For any existing affected boilers that have not operated on biomass or liquid fuel since March 21, 2011, the permittee must complete the initial performance tune-up, if subject to the tune-up requirements by following the procedures described in Condition 12.7, no later than 30 days after the re-start of the affected boiler on biomass or liquid fuel.
- c. For any new or reconstructed affected boiler, the permittee must demonstrate compliance with the NESHAP within 180 days of startup.
- d. For new or reconstructed affected boilers that are subject to an emission limit in Condition 12.2, the permittee must demonstrate initial compliance with the emission limit no later than assignment to this permit or within 180 days

- after startup of the boiler, whichever is later, according to 40 CFR 63.7(a)(2)(ix).
- e. For new or reconstructed oil-fired boilers that commenced construction or reconstruction on or before September 14, 2016, that combust only oil that contains no more than 0.50 weight percent sulfur or a mixture of 0.50 weight percent sulfur oil with other fuels not subject to a particulate matter (PM) emission limit and that do not use a post-combustion technology (except a wet scrubber) to reduce PM or sulfur dioxide emissions, the permittee is not subject to the PM emission limit in Condition 12.2 until September 14, 2019, providing the permittee monitors and records on a monthly basis the type of fuel combusted. If intending to burn a new type of fuel or fuel mixture that does not meet the requirements of this Condition, the permittee must conduct a performance test within 60 days of burning the new fuel. On and after September 14, 2019, the permittee is subject to the PM emission limit in Condition 12.2 and must demonstrate compliance with the PM emission limit no later than March 12, 2020.
 - f. For new or reconstructed boilers that combust only ultra-low-sulfur liquid fuel as defined in 40 CFR 63.11237, the permittee is not subject to the PM emission limit in Condition 12.2 providing the permittee monitors and records on a monthly basis the type of fuel combusted. If intending to burn a fuel other than ultra-low-sulfur liquid fuel or gaseous fuels as defined in 40 CFR 63.11237, the permittee must conduct a performance test within 60 days of burning the new fuel.
 - g. For affected boilers that ceased burning solid waste consistent with 40 CFR 63.11196(d) and for which the initial compliance date has passed, the permittee must demonstrate compliance within 60 days of the effective date of the waste-to-fuel switch as specified in 40 CFR 60.2145(a)(2) and (3) or 40 CFR 60.2710(a)(2) and (3). If having not conducted the compliance demonstration for the NESHAP within the previous 12 months, the permittee must complete all compliance demonstrations for the NESHAP before commencing or recommencing combustion of solid waste.
 - h. For affected boilers that switch fuels or make a physical change to the boiler that results in the applicability of a different subcategory within the NESHAP or the boiler

becoming subject to the NESHAP, the permittee must demonstrate compliance within 180 days of the effective date of the fuel switch or the physical change. Notification of such changes must be submitted according to Condition 12.13.

**12.6 NESHAP
Subsequent Testing**

- a. If the boiler has a heat input capacity of 10 MMBtu/hr or greater, the permittee must conduct all applicable performance (stack) tests according to 40 CFR 63.11212 on a triennial basis, except as specified in Conditions 12.6b through 12.6f. Triennial performance tests must be completed no more than 37 months after the previous performance test.
- b. For new or reconstructed boilers that commenced construction or reconstruction on or before September 14, 2016, when demonstrating initial compliance with the PM emission limit, if the boiler's performance test results show that the PM emissions are equal to or less than half of the PM emission limit, the permittee does not need to conduct further performance tests for PM until September 14, 2021, but must continue to comply with all applicable operating limits and monitoring requirements, and must comply with the following provisions:
 - i. A performance test for PM must be conducted by September 14, 2021. [40 CFR 63.11220(b)(1)]
 - ii. If the performance test results show that the PM emissions are equal to or less than half of the PM emission limit, the permittee may choose to conduct performance tests for PM every fifth year. Each such performance test must be conducted no more than 61 months after the previous performance test.
 - iii. If intending to burn a new type of fuel other than ultra-low-sulfur liquid fuel or gaseous fuels as defined in 40 CFR 63.11237, the permittee must conduct a performance test within 60 days of burning the new fuel type.
 - iv. If the performance test results show that the PM emissions are greater than half of the PM emission limit, the permittee must conduct subsequent performance tests on a triennial basis as specified in Condition 12.6a.

- c. For new or reconstructed boilers that commenced construction or reconstruction after September 14, 2016, when demonstrating initial compliance with the PM emission limit, if the boiler's performance test results show that PM emissions are equal to or less than half of the PM emission limit, the permittee may choose to conduct performance tests for PM every fifth year, but must continue to comply with all applicable operating limits and monitoring requirements and each such performance test must be conducted no more than 61 months after the previous performance test.
- d. If intending to burn a new type of fuel other than ultra-low-sulfur liquid fuel or gaseous fuels as defined in 40 CFR 63.11237, the permittee must conduct a performance test within 60 days of burning the new fuel type.
- e. If the performance test results show that PM emissions are greater than half of the PM emission limit, the permittee must conduct subsequent performance tests on a triennial basis as specified in Condition 12.6a.
- f. For existing affected boilers that have not operated on biomass or liquid fuel since the previous compliance demonstration and more than 3 years have passed since the previous compliance demonstration, the permittee must complete subsequent compliance demonstration no later than 180 days after the re-start of the affected boiler on biomass or liquid fuel.

12.7 NESHAP Tune-up Requirements

The permittee must conduct a performance tune-up for each biomass and oil-fired boiler as follows and keep records to demonstrate continuous compliance. The permittee must conduct the tune-up while burning the type of fuel (or fuels in the case of boilers that routinely burn two types of fuels at the same time) that provided the majority of the heat input to the boiler over the 12 months prior to the tune-up.

- a. As applicable, inspect the burner, and clean or replace any components of the burner as necessary (the permittee may delay the burner inspection until the next scheduled unit shutdown, not to exceed 36 months from the previous inspection). Units that produce electricity for sale may delay the burner inspection until the first outage, not to exceed 36 months from the previous inspection.
- b. Inspect the flame pattern, as applicable, and adjust the burner as necessary to optimize the flame pattern. The

adjustment should be consistent with the manufacturer's specifications, if available.

- c. Inspect the system controlling the air-to-fuel ratio, as applicable, and ensure that it is correctly calibrated and functioning properly (the permittee may delay the inspection until the next scheduled unit shutdown, not to exceed 36 months from the previous inspection). Units that produce electricity for sale may delay the inspection until the first outage, not to exceed 36 months from the previous inspection.
- d. Optimize total emissions of CO. This optimization should be consistent with the manufacturer's specifications, if available, and with any nitrogen oxide requirement to which the unit is subject.
- e. Measure the concentrations in the effluent stream of CO in parts per million, by volume, and oxygen in volume percent, before and after the adjustments are made (measurements may be either on a dry or wet basis, as long as it is the same basis before and after the adjustments are made). Measurements may be taken using a portable CO analyzer.
- f. Maintain on-site and submit, if requested by LRAPA, a report containing the concentrations of CO in the effluent stream in parts per million, by volume, and oxygen in volume percent, measured at high fire or typical operating load, before and after the tune-up of the boiler.
- g. A description of any corrective actions taken as a part of the tune-up of the boiler.
- h. The type and amount of fuel used over the 12 months prior to the tune-up of the boiler, but only if the unit was physically and legally capable of using more than one type of fuel during that period. Units sharing a fuel meter may estimate the fuel use by each unit.
- i. If the unit is not operating on the required date for a tune-up, the tune-up must be conducted within 30 days of startup.

**12.8 NESHAP
Monitoring,
Installation,
Operation and
Maintenance
Requirements**

- a. If using a control device to comply with the emission limits specified in Condition 12.2, the permittee must maintain each operating limit in Table 1 in Appendix A to this permit that applies to the boiler as specified in Table 4 in Appendix A to this permit. If using a control device not covered in Table 1 in Appendix A to this permit, or if wishing to establish and monitor an alternative operating

limit and alternative monitoring parameters, the permittee must apply to the EPA Administrator for approval of alternative monitoring under 40 CFR 63.8(f).

- b. If demonstrating compliance with any applicable emission limit through performance (stack) testing and subsequent compliance with operating limits (including the use of CPMS) or with a COMS, the permittee must develop a site-specific monitoring plan according to 40 CFR 63.11205(c) and 63.11224(c) and install, operate, and maintain each required CPMS according to Conditions 12.8e, 12.8f and 12.8g, as applicable. This requirement also applies if petitioning to the EPA Administrator for alternative monitoring parameters under 40 CFR 63.8(f).
- c. The permittee must conduct a performance evaluation of each CMS in accordance with their site-specific monitoring plan.
- d. The permittee must monitor and collect data as follows and the site-specific monitoring plan required by Condition 12.8b:
 - i. The permittee must operate the monitoring system and collect data at all required intervals at all times the affected source is operating and compliance is required, except for periods of monitoring system malfunctions or out-of-control periods (see 40 CFR 63.8(c)(7)), repairs associated with monitoring system malfunctions or out-of-control periods, and required monitoring system quality assurance or quality control activities including, as applicable, calibration checks, required zero and span adjustments, and scheduled CMS maintenance as defined in their site-specific monitoring plan. A monitoring system malfunction is any sudden, infrequent, not reasonably preventable failure of the monitoring system to provide valid data. Monitoring system failures that are caused in part by poor maintenance or careless operation are not malfunctions. The permittee is required to complete monitoring system repairs in response to monitoring system malfunctions or out-of-control periods and to return the monitoring system to operation as expeditiously as practicable.

- ii. The permittee may not use data collected during periods of startup and shutdown, monitoring system malfunctions or out-of-control periods, repairs associated with monitoring system malfunctions or out-of-control periods, or required monitoring system quality assurance or quality control activities in calculations used to report emissions or operating levels. Any such periods must be reported according to the requirements in Condition 12.11. The permittee must use all the data collected during all other periods in assessing the operation of the control device and associated control system.
 - iii. Except for periods of monitoring system malfunctions or monitoring system out-of-control periods, repairs associated with monitoring system malfunctions or monitoring system out-of-control periods, and required monitoring system quality assurance or quality control activities (including, as applicable, calibration checks, required zero and span adjustments, and scheduled CMS maintenance as defined in the site-specific monitoring plan), failure to collect required data is a deviation of the monitoring requirements.
- e. If having an operating limit that requires the use of a CMS, the permittee must install, operate, and maintain each CPMS according to the following procedures:
 - i. The CPMS must complete a minimum of one cycle of operation every 15 minutes. The permittee must have data values from a minimum of four successive cycles of operation representing each of the four 15-minute periods in an hour, or at least two 15-minute data values during an hour when CMS calibration, quality assurance, or maintenance activities are being performed, to have a valid hour of data.
 - ii. The permittee must calculate hourly arithmetic averages from each hour of CPMS data in units of the operating limit and determine the 30-day rolling average of all recorded readings, except as provided in Condition 12.8d.ii. Calculate a 30-day rolling average from all of the hourly averages collected for the 30-day operating period using the following equation:

$$30 - \text{day average} = \frac{\sum_{i=1}^n Hpvi}{n}$$

Where:

Hpvi = the hourly parameter value for hour i;

n = the number of valid hourly parameter values collected over 30 boiler operating days.

- iii. For purposes of collecting data, the permittee must operate the CPMS as specified in Condition 12.8d.i. For purposes of calculating data averages, the permittee must use all the data collected during all periods in assessing compliance, except that the permittee must exclude certain data as specified in Condition 12.8d.ii. Periods when CPMS data are unavailable may constitute monitoring deviations as specified in Condition 12.8d.iii.
- iv. Record the results of each inspection, calibration, and validation check.
- f. If having an applicable opacity operating limit under the NESHAP, the permittee must install, operate, certify and maintain each COMS according to the following procedures:
 - i. Each COMS must be installed, operated, and maintained according to Performance Specification 1 of 40 CFR Part 60, Appendix B.
 - ii. The permittee must conduct a performance evaluation of each COMS according to the requirements in 40 CFR 63.8 and according to Performance Specification 1 of 40 CFR Part 60, Appendix B.
 - iii. As specified in 40 CFR 63.8(c)(4)(i), each COMS must complete a minimum of one cycle of sampling and analyzing for each successive 10-second period and one cycle of data recording for each successive 6-minute period.
 - iv. The COMS data must be reduced as specified in 40 CFR 63.8(g)(2).
 - v. The permittee must include in their site-specific monitoring plan procedures and acceptance criteria for operating and maintaining each COMS according to the requirements in 40 CFR 63.8(d). At a minimum, the monitoring plan must include a daily calibration drift assessment, a quarterly

- performance audit, and an annual zero alignment audit of each COMS.
- vi. The permittee must operate and maintain each COMS according to the requirements in the monitoring plan and the requirements of 40 CFR 63.8(e). The permittee must identify periods the COMS is out of control including any periods that the COMS fails to pass a daily calibration drift assessment, a quarterly performance audit, or an annual zero alignment audit.
 - vii. The permittee must calculate and record 6-minute averages from the opacity monitoring data and determine and record the daily block average of recorded readings, except as provided in Condition 12.8d.ii.
 - viii. For purposes of collecting opacity data, the permittee must operate the COMS as specified in Condition 12.8d.i. For purposes of calculating data averages, the permittee must use all the data collected during all periods in assessing compliance, except that the permittee must exclude certain data as specified in Condition 12.8d.ii. Periods when COMS data are unavailable may constitute monitoring deviations as specified in Condition 12.8d.iii.
- g. If using a fabric filter bag leak detection system to comply with the requirements of the NESHAP, the permittee must install, calibrate, maintain, and continuously operate the bag leak detection system as follows:
- i. The permittee must install and operate a bag leak detection system for each exhaust stack of the fabric filter.
 - ii. Each bag leak detection system must be installed, operated, calibrated, and maintained in a manner consistent with the manufacturer's written specifications and recommendations and in accordance with EPA-454/R-98-015.
 - iii. The bag leak detection system must be certified by the manufacturer to be capable of detecting particulate matter emissions at concentrations of 10 milligrams per actual cubic meter or less.

- iv. The bag leak detection system sensor must provide output of relative or absolute particulate matter loadings.
- v. The bag leak detection system must be equipped with a device to continuously record the output signal from the sensor.
- vi. The bag leak detection system must be equipped with an audible or visual alarm system that will activate automatically when an increase in relative particulate matter emissions over a preset level is detected. The alarm must be located where it is easily heard or seen by plant operating personnel.
- vii. For positive pressure fabric filter systems that do not duct all compartments or cells to a common stack, a bag leak detection system must be installed in each baghouse compartment or cell.
- viii. Where multiple bag leak detectors are required, the system's instrumentation and alarm may be shared among detectors.

**12.9 NESHAP
Demonstrating
Continuous
Compliance with
the Emission Limits**

- a. The permittee must demonstrate continuous compliance with the emission limit and applicable operating limit in Condition 12.2 and Table 1 in Appendix A to this permit according to the following methods:
 - i. Following the date on which the initial compliance demonstration is completed or is required to be completed, whichever date comes first, the permittee must continuously monitor the operating parameters. Operation above the established maximum, below the established minimum, or outside the allowable range of the operating limits constitutes a deviation from the operating limits established under this NESHAP, except during performance tests conducted to determine compliance with the emission and operating limits or to establish new operating limits. Operating limits are confirmed or reestablished during performance tests.
 - ii. The permittee must keep records of the type and amount of all fuels burned in each boiler during the reporting period.
 - iii. If the unit is controlled with a fabric filter and demonstrating continuous compliance using a bag leak detection system, the permittee must initiate

corrective action within 1 hour of a bag leak detection system alarm and operate and maintain the fabric filter system such that the alarm does not sound more than 5 percent of the operating time during a 6-month period. The permittee must also keep records of the date, time, and duration of each alarm, the time corrective action was initiated and completed, and a brief description of the cause of the alarm and the corrective action taken. The permittee must also record the percent of the operating time during each 6-month period that the alarm sounds. In calculating this operating time percentage, if inspection of the fabric filter demonstrates that no corrective action is required, no alarm time is counted. If corrective action is required, each alarm is counted as a minimum of 1 hour. If taking longer than 1 hour to initiate corrective action, the alarm time is counted as the actual amount of time taken to initiate corrective action.

- b. The permittee must report each instance in which the permittee did not meet each emission limit and operating limit in Condition 12.2 and Table 1 in Appendix A that apply. These instances are deviations from the emission limits in the NESHAP. These deviations must be reported according to the requirements in Condition 12.11.

12.10 NESHAP Notifications

- a. The permittee must submit all of the notifications in 40 CFR 63.7(b); 63.8(e) and (f); and 63.9(b) through (e), (g), and (h) that apply by the dates specified in those sections.
- b. An Initial Notification must be submitted no later than within 120 days after the boiler becomes subject to the standard.
- c. If required to conduct a performance stack test, the permittee must submit a Notification of Intent to conduct a performance test at least 60 days before the performance stack test is scheduled to begin.
- d. The permittee must submit the Notification of Compliance Status no later than July 19, 2014 unless owning or operating a new boiler subject only to a requirement to conduct a biennial or 5-year tune-up or a performance stack test. If owning or operating a new boiler subject to a requirement to conduct a tune-up, the permittee is not required to prepare and submit a Notification of Compliance Status for the tune-up. If the permittee must

conduct a performance stack test, the permittee must submit the Notification of Compliance Status within 60 days of completing the performance stack test. The permittee must submit the Notification of Compliance Status as follows. The Notification of Compliance Status must include the information and certification(s) of compliance as follows, and as applicable, and signed by a responsible official:

- i. The permittee must submit the information required in 40 CFR 63.9(h)(2), except the information listed in 40 CFR 63.9(h)(2)(i)(B), (D), (E), and (F). If conducting any performance tests or CMS performance evaluations, the permittee must submit that data as specified in 40 CFR 63.11225(e). If conducting any opacity or visible emission observations, or other monitoring procedures or methods, the permittee must submit that data to the EPA Administrator at the appropriate address listed in 40 CFR 63.13.
- ii. "This facility complies with the requirements in 40 CFR 63.11214 to conduct an initial tune-up of the boiler."
- iii. "This facility has had an energy assessment performed according to 40 CFR 63.11214(c)."
- iv. For units that install bag leak detection systems: "This facility complies with the requirements in 40 CFR 63.11224(f)."
- v. For units that do not qualify for a statutory exemption as provided in section 129(g)(1) of the Clean Air Act: "No secondary materials that are solid waste were combusted in any affected unit."
- vi. The notification must be submitted electronically using the Compliance and Emissions Data Reporting Interface (CEDRI) that is accessed through EPA's Central Data Exchange (CDX) (www.epa.gov/cdx). However, if the reporting form specific to the NESHAP is not available in CEDRI at the time that the report is due, the written Notification of Compliance Status must be submitted to the EPA Administrator and LRAPA at the appropriate address listed in 40 CFR 63.13.
- vii. If using data from a previously conducted emission test to serve as documentation of conformance with the emission standards and operating limits of

the NESHAP, the permittee must include in the Notification of Compliance Status the date of the test and a summary of the results, not a complete test report, relative to the NESHAP.

12.11 NESHAP Reporting

The permittee must prepare, by March 1 of each year, and submit to LRAPA, an annual compliance certification report for the previous calendar year containing the following information. The permittee must submit the report by March 15 if there were any instances described by Condition 12.11c. For boilers that are subject only to the energy assessment requirement and/or a requirement to conduct a biennial or 5-year tune-up according to Condition 12.7 and not subject to emission limits or operating limits, the permittee may prepare only a biennial or 5-year compliance report.

- a. Company name and address.
- b. Statement by a responsible official, with the official's name, title, phone number, email address, and signature, certifying the truth, accuracy and completeness of the notification and a statement of whether the source has complied with all the relevant standards and other requirements of the NESHAP. The notification must include the following certification(s) of compliance, as applicable, and be signed by a responsible official:
 - i. "This facility complies with the requirements in 40 CFR 63.11223 to conduct a biennial or 5-year tune-up, as applicable, of each boiler."
 - ii. For units that do not qualify for a statutory exemption as provided in section 129(g)(1) of the Clean Air Act: "No secondary materials that are solid waste were combusted in any affected unit."
 - iii. "This facility complies with the requirement in 40 CFR 63.11214(d) and 63.11223(g) to minimize the boiler's time spent during startup and shutdown and to conduct startups and shutdowns according to the manufacturer's recommended procedures or procedures specified for a boiler of similar design if manufacturer's recommended procedures are not available."
- c. If the source experiences any deviations from the applicable requirements during the reporting period, include a description of deviations, the time periods during which the deviations occurred, and the corrective actions taken.

- d. The total fuel use for each affected boiler subject to an emission limit, for each calendar month within the reporting period, including, but not limited to, a description of the fuel, whether the fuel has received a non-waste determination by the permittee or EPA through a petition process to be a non-waste under 40 CFR 241.3(c), whether the fuel(s) were processed from discarded non-hazardous secondary materials within the meaning of 40 CFR 241.3, and the total fuel usage amount with units of measure.

**12.12 NESHAP
Recordkeeping**

- a. The permittee must keep records to document conformance with the work practices, emission reduction measures, and management practices as follows:
 - i. Records must identify each boiler, the date of tune-up, the procedures followed for tune-up, and the manufacturer's specifications to which the boiler was tuned.
 - ii. For operating units that combust non-hazardous secondary materials that have been determined not to be solid waste pursuant to 40 CFR 241.3(b)(1), the permittee must keep a record which documents how the secondary material meets each of the legitimacy criteria under 40 CFR 241.3(d)(1). If combusting a fuel that has been processed from a discarded non-hazardous secondary material pursuant to 40 CFR 241.3(b)(4), the permittee must keep records as to how the operations that produced the fuel satisfies the definition of processing in 40 CFR 241.2 and each of the legitimacy criteria in 40 CFR 241.3(d)(1). If the fuel received a non-waste determination pursuant to the petition process submitted under 40 CFR 241.3(c), the permittee must keep a record that documents how the fuel satisfies the requirements of the petition process. For operating units that combust non-hazardous secondary materials as fuel per 40 CFR 241.4, the permittee must keep records documenting that the material is a listed non-waste under 40 CFR 241.4(a).
 - iii. For each boiler required to conduct an energy assessment, the permittee must keep a copy of the energy assessment report.
 - iv. For each boiler subject to an emission limit in Condition 12.2, the permittee must keep records of

- monthly fuel use by each boiler, including the type(s) of fuel and amount(s) used. For each new boiler that meets the requirements of Condition 12.5e and 12.5f, the permittee must keep records, on a monthly basis, of the type of fuel combusted.
- v. For each boiler that meets the definition of seasonal boiler, the permittee must keep records of days of operation per year.
 - vi. For each boiler that meets the definition of limited-use boiler, the permittee must keep a copy of the federally enforceable permit that limits the annual capacity factor to less than or equal to 10 percent and records of fuel use for the days the boiler is operating.
 - vii. Records of the occurrence and duration of each malfunction of the boiler, or of the associated air pollution control and monitoring equipment.
 - viii. Records of actions taken during periods of malfunction to minimize emissions in accordance with the general duty to minimize emissions in Condition 12.4, including corrective actions to restore the malfunctioning boiler, air pollution control, or monitoring equipment to its normal or usual manner of operation.
- b. The permittee must keep the records of all inspection and monitoring data required by Condition 12.8d and 12.8e, and the following information for each required inspection or monitoring:
- i. The date, place, and time of the monitoring event.
 - ii. Person conducting the monitoring.
 - iii. Technique or method used.
 - iv. Operating conditions during the activity.
 - v. Results, including the date, time, and duration of the period from the time the monitoring indicated a problem to the time that monitoring indicated proper operation.
 - vi. Maintenance or corrective action taken (if applicable).
- c. If using a bag leak detection system, the permittee must keep the following records:
- i. Records of the bag leak detection system output.

- ii. Records of bag leak detection system adjustments, including the date and time of the adjustment, the initial bag leak detection system settings, and the final bag leak detection system settings.
- iii. The date and time of all bag leak detection system alarms, and for each valid alarm, the time corrective action was initiated, the corrective action taken, and the date on which corrective action was completed.

- 12.13 NESHAP Fuel Switch or Physical Change Notification** If having switched fuels or made a physical change to the boiler and the fuel switch or change resulted in the applicability of a different subcategory within the NESHAP, in the boiler becoming subject to the NESHAP, or in the boiler switching out of the NESHAP due to a fuel change that results in the boiler meeting the definition of gas-fired boiler, as defined in 40 CFR 63.11237, the permittee must provide notice of the date upon which they switched fuels, made the physical change, or took a permit limit within 30 days of the change. The notification must identify:
- a. The name of the permittee, the location of the source, the boiler(s) that have switched fuels, were physically changed, or took a permit limit, and the date of the notice.
 - b. The date upon which the fuel switch, physical change, or permit limit occurred.

13.0 EMISSION FACTORS

This section contains emission factors for both criteria pollutants and hazardous air pollutants (HAPs). Because many HAP emission factors remain under development, they represent the best available data at the time of permit renewal. The use of the following HAP emission factors does not guarantee that facilities will be in compliance with federal requirements for major sources of HAPs. Facilities should use the most reliable emission factors as they become available in the future, or provide emission source test results that demonstrate actual emissions for their specific emission unit.

13.1 Emission Factors (EF) for Boilers

- a. PM, PM₁₀, PM_{2.5}, SO₂, NO_x, CO and VOC

Fuel type	Boiler type or controls	EF units	PM	PM ₁₀	PM _{2.5}	SO ₂	NO _x	CO	VOC
Natural Gas	Uncontrolled	lb/MMcf	2.5	2.5	2.5	1.7	100	84	5.5
	"Low NO _x " burners	lb/MMcf	2.5	2.5	2.5	1.7	50	84	5.5
	Flue gas recirculation	lb/MMcf	2.5	2.5	2.5	1.7	32	84	5.5
Propane	All	lb/Mgal	0.6	0.6	0.6	0.10S ⁽¹⁾	19	3.2	0.5
Butane	All	lb/Mgal	0.6	0.6	0.6	0.09S ⁽¹⁾	21	3.6	0.6
#1 distillate oil	All	lb/Mgal	3.3	2.3	1.6	42.6 ⁽¹⁾	18	5	0.2 ⁽²⁾
#2 distillate oil	All	lb/Mgal	3.3	2.3	1.6	71 ⁽¹⁾	20	5	0.2 ⁽²⁾
#4 residual oil	All	lb/Mgal	8.5	7.5	5.4	263 ⁽¹⁾	20	5	0.2 ⁽²⁾
#5 residual oil	All	lb/Mgal	11.5	10.1	7.1	275 ⁽¹⁾	55	5	0.28 ⁽²⁾
#6 residual oil	All	lb/Mgal	20.8	18.2	12.4	275	55	5	0.28 ⁽²⁾
wood	Dutch Oven	lb/Mlbs steam	0.4	0.2	0.2	0.014	0.31	3.0	0.13
wood	Spreader-Stoker	lb/Mlbs steam	0.4	0.2	0.2	0.014	0.31	2.0	0.13
wood	Fuel Cell	lb/Mlbs steam	0.4	0.2	0.2	0.014	0.31	1.0	0.13

(1) The sulfur dioxide emission factor is based on the sulfur content of the fuel expressed as a percent by weight. For example, if the sulfur content of #1 distillate oil is 0.3%, the emission factor is $142 \times 0.3 = 42.6$ lb/1000 gallons of oil burned.

(2) VOC reported as non-methane total organic carbon (NMTOC).

b. HAPS

Fuel type	EF units	Acrolein	Benzene	Formaldehyde	HCl	Naphthalene	Styrene	Toluene
Natural Gas	lb/MMcf		0.0021	0.075				0.0034
#1 Distillate Oil	lb/Mgal		0.00275	0.061		0.00033		
#2 Distillate Oil	lb/Mgal		0.00275	0.061		0.00033		
#4 residual oil	lb/Mgal		0.000214	0.033		0.00113		0.0062
#5 residual oil	lb/Mgal		0.000214	0.033		0.00113		0.0062
#6 residual oil	lb/Mgal		0.000214	0.033		0.00113		0.0062
Wood	lbs/Mlbs Steam	0.0060	0.0063	0.0066	0.029	0.000146	0.0014	0.00138

Fuel type	EF units	Antimony	Arsenic	Chromium	Cobalt	Lead	Manganese	Nickel
Natural Gas	lb/MMcf		0.00020		0.000084	0.0005	0.00038	0.0021
#1 distillate oil	lb/Mgal		0.00056	0.00042		0.0013	0.00083	0.00042
#2 distillate oil	lb/Mgal		0.00056	0.00042		0.0013	0.00083	0.00042
#4 residual oil	lb/Mgal	0.0053	0.0013		0.0060	0.0015	0.0030	0.0845
#5 residual oil	lb/Mgal	0.0053	0.0013		0.0060	0.0015	0.0030	0.0845
#6 residual oil	lb/Mgal	0.0053	0.0013		0.0060	0.0015	0.0030	0.0845
Wood	lbs/Mlbs Steam	0.000012	0.000033		0.0000098	0.000072	0.0024	0.00005

13.2 Emission Factors for Cyclones and Target Boxes

Process Equipment	Type	Description	Units	PM (lb/BDT)	PM ₁₀ (lb/BDT)	PM _{2.5} (lb/BDT)
Cyclone	Medium Efficiency	Dry & Green Chips, Shavings, Hogged Fuel/Bark, Green Sawdust	Bone Dry Tons (BDT)	0.5	0.43	0.25
	High Efficiency			0.2	0.19	0.16
	Baghouse Control			0.001	0.001	0.001
	Medium Efficiency	Sanderdust	Bone Dry Tons (BDT)	NA	NA	NA
	High Efficiency			2.0	1.9	0.16
	Baghouse Control			0.04	0.04	0.04
Target Box	Medium Efficiency	Sanderdust	Bone Dry Tons (BDT)	0.1	0.085	0.05

13.3 Emission Factors for Steam and Electric Heated Kilns ($\leq 200^\circ\text{F}$) (lb/1000 board feet)⁽¹⁾

Wood species	PM/PM ₁₀ /PM _{2.5}	VOC	Methanol	Formaldehyde	Acetaldehyde
Ponderosa Pine	0.02	1.96	0.055	0.0028	0.042
Lodgepole Pine	0.02	1.38	0.073	0.000	0.012
Douglas Fir	0.02	0.77	0.039	0.0013	0.051
White Fir	0.05	0.59	0.122	0.0028	0.055
Hemlock	0.05	0.38	0.081	0.0013	0.120

(1) Use source specific data, if available

13.4 Emission Factors for Steam and Electric Heated Kilns ($> 200^\circ\text{F}$) (lb/1000 board feet)⁽¹⁾

Wood species	PM/PM ₁₀ /PM _{2.5}	VOC	Methanol	Formaldehyde	Acetaldehyde
Ponderosa Pine	0.02	3.80	0.144	0.0092	0.028
Lodgepole Pine	0.02	1.39	0.060	0.0040	0.028
Douglas Fir	0.02	1.62	0.117	0.0043	0.040
White Fir	0.05	0.99	0.420	0.016	0.055
Hemlock	0.05	0.53	0.184	0.0039	0.084

(1) Use source specific data, if available

13.5 Emission Factors for Veneer Dryers (lb/1000 square feet, 3/8" basis)

a. PM/PM₁₀/PM_{2.5}, NO_x, and CO:

Process Equipment	Description	PM/PM ₁₀ /PM _{2.5}	NO _x	CO
Veneer Dryer - Gas heat	Douglas Fir (uncontrolled)	0.52	0.12	0.02
	Douglas Fir (Burley or 45% control)	0.29		
	Hemlock, White Fir (uncontrolled)	0.15		
	Hemlock, White Fir (Burley or 45% control)	0.10		
Veneer Dryer - Steam heat	Douglas Fir (uncontrolled)	1.01	None	
	Douglas Fir (Burley or 45% control)	0.56		
	Hemlock, White Fir (uncontrolled)	0.25		
	Hemlock, White Fir (Burley or 45% control)	0.15		

- b. VOC and Hazardous Air Pollutants: These factors are based on recent studies performed on **softwoods** by NCASI. EPA incorporated NCASI's data into AP-42, but did not distinguish between southern and northwest softwood species. Therefore, the highest average test result is included in this permit as a conservative estimate of emissions. The VOC emission factors have been adjusted to an as propane basis by the multiplying the carbon basis by a factor of 44/36. All emission factors are in units of pounds per 1000 square feet on a 3/8" basis (lb/MSF) for uncontrolled emissions.

Dryer type/activity	Pollutant	Steam heated	Direct Wood-Fired	Direct Natural Gas-Fired
Veneer Dryers	VOC	1.8	1.1	2.5
	Acetaldehyde	0.017	ND ⁽¹⁾	0.062
	Acrolein	0.0013	ND	0.009
	Formaldehyde	0.014	0.045	0.064
	Methanol	0.039	ND	0.036
	Phenol	0.0034	ND	0.006
	Propionaldehyde	0.0024	ND	0.0016
	Benzene	0.00059	ND	0.0057
	Toluene	0.0011	ND	0.0074
	m, p-xylene	0.00075	ND	0.0039
Cooling Section	VOC	0.054	ND ⁽¹⁾	0.044
	Acetaldehyde	0.0046	ND	0.0034
	Acrolein	BDL	ND	BDL
	Formaldehyde	0.0013	ND	0.0015
	Methanol	0.010	ND	0.0057
	Phenol	0.0062	ND	0.010
	Propionaldehyde	BDL	ND	0.002
Fugitives	VOC	0.06	ND	0.046
	Acetaldehyde	0.005	ND	0.003
	Formaldehyde	0.001	ND	0.002
	Methanol	0.01	ND	0.006
	Phenol	0.006	ND	0.01

(1) ND = No Data

13.6 Plywood Presses (lb/MSF⁽¹⁾) using Phenol Formaldehyde Resin

Pollutant	Softwood Emission Factor
VOC	0.25
Acetaldehyde	0.0042
Formaldehyde	0.0019
Methanol	0.14
Phenol	0.0014

(1) MSF = 1000 ft²

13.7 Miscellaneous Plywood Activities

Pollutant	I-J CC ⁽¹⁾ (lbs/MLF)	I-J Saw ⁽²⁾ (lbs/MLF)	Log Vats (lbs/MSF 3/8")	Trim Chip (lbs/MSF 3/8")	Sander (lbs/MSF)	Skin Saw (lbs/MSF)
VOC	0.0035	0.11	ND ⁽³⁾	0.068	0.18	0.086
Acetaldehyde	BDL ⁽⁴⁾	BDL	0.0047	BDL	0.0028	0.0009
Formaldehyde	0.0002	BDL	BDL	BDL	0.002	0.0003
Methanol	0.0006	0.016	0.007	0.008	0.012	0.012

(1) I-Joist Conditioning Chamber

(2) I-Joist Saw

(3) ND=No Data

(4) BDL=Below Detection Limits

13.8 Emission Factors for Surface Coating Operations

Consult manufacturer or Safety Data Sheet for required information needed to calculate emissions.

14.0 ABBREVIATIONS, ACRONYMS, AND DEFINITIONS

ACDP	Air Contaminant Discharge Permit	MMBtu	million British thermal units
ASTM	American Society for Testing and Materials	MMcf	Million cubic
AQMA	Air Quality Maintenance Area	MSF	1000 square feet
Btu	British thermal unit	NA	not applicable
calendar year	The 12-month period beginning January 1st and ending December 31st	NESHAP	National Emissions Standards for Hazardous Air Pollutants
CFR	Code of Federal Regulations	NO _x	nitrogen oxides
CMS	Continuous monitoring system	NSPS	New Source Performance Standard
CO	carbon monoxide	NSR	New Source Review
CO ₂	carbon dioxide	O ₂	oxygen
CO _{2e}	carbon dioxide equivalent	OAR	Oregon Administrative Rules
COMS	Continuous opacity monitoring system	ORS	Oregon Revised Statutes
CPMS	Continuous parameter monitoring system	O&M	operation and maintenance
DEQ	Oregon Department of Environmental Quality	Pb	lead
dscf	dry standard cubic foot	PCD	pollution control device
EPA	US Environmental Protection Agency	PM	particulate matter
FCAA	Federal Clean Air Act	PM ₁₀	particulate matter less than 10 microns in size
gal	gallon(s)	PM _{2.5}	particulate matter less than 2.5 microns in size
GHGs	Greenhouse gasses in CO ₂ equivalent	ppm	part per million
gr/dscf	grains per dry standard cubic foot	PSD	Prevention of Significant Deterioration
HAP	Hazardous Air Pollutant as defined by LRAPA Title 44	PSEL	Plant Site Emission Limit
ID	identification number	PTE	Potential to Emit
I&M	inspection and maintenance	RACT	Reasonably Available Control Technology
lb	pound(s)	scf	standard cubic foot
LRAPA	Lane Regional Air Protection Agency	SER	Significant Emission Rate
MBF	1000 board feet	SIC	Standard Industrial Code
Mgal	1000 gallons	SIP	State Implementation Plan
Mlbs	1000 pounds	SO ₂	sulfur dioxide
MLF	1000 linear feet	Special Control Area	as defined in LRAPA Title 29 or OAR 340-204-0070
		VE	visible emissions
		VOC	volatile organic compound
		year	A period consisting of any 12 consecutive calendar months

APPENDIX A: AREA SOURCES NESHAP FOR INDUSTRIAL, COMMERCIAL, AND INSTITUTIONAL BOILERS (40 CFR PART 63 SUBPART JJJJJJ)

Table 1 - Operating Limits for Boilers with Emission Limit

If demonstrating compliance with applicable emission limits using...	The permittee must meet these operating limits except during periods of startup and shutdown...
1. Fabric filter control	a. Maintain opacity to less than or equal to 10 percent opacity (daily block average); OR b. Install and operate a bag leak detection system according to Condition 12.8g and operate the fabric filter such that the bag leak detection system alarm does not sound more than 5 percent of the operating time during each 6-month period.
2. Electrostatic precipitator control	a. Maintain opacity to less than or equal to 10 percent opacity (daily block average); OR b. Maintain the 30-day rolling average total secondary electric power of the electrostatic precipitator at or above the minimum total secondary electric power as defined in 40 CFR 63.11237.
3. Wet scrubber control	Maintain the 30-day rolling average pressure drop across the wet scrubber at or above the minimum scrubber pressure drop as defined in 40 CFR 63.11237 and the 30-day rolling average liquid flow rate at or above the minimum scrubber liquid flow rate as defined in 40 CFR 63.11237.
4. Any other add-on air pollution control type	This option is for boilers that operate dry control systems. Boilers must maintain opacity to less than or equal to 10 percent opacity (daily block average).
5. Performance stack testing	For boilers that demonstrate compliance with a performance test, maintain the operating load of each unit such that it does not exceed 110 percent of the average operating load recorded during the most recent performance test.

Table 2 - Performance (Stack) Testing Requirements

To conduct a performance test for the following pollutant...	The permittee must...	Using...
PM.....	<p>a. Select sampling ports location and the number of traverse points.</p> <p>b. Determine velocity and volumetric flow-rate of the stack gas.</p> <p>c. Determine oxygen and carbon dioxide concentration of the stack gas.</p> <p>d. Measure the moisture content of the stack gas.</p> <p>e. Measure the PM emission concentration.</p> <p>f. Convert emissions concentration to lb/MMBtu emission rates.</p>	<p>Method 1 in Appendix A-1 to 40 CFR Part 60.</p> <p>Method 2, 2F, or 2G in Appendix A-2 to 40 CFR Part 60.</p> <p>Method 3A or 3B in Appendix A-2 to 40 CFR Part 60, or ASTM D6522-00 (Re-approved 2005), or ANSI/ASME PTC 19.10-1981.</p> <p>Method 4 in Appendix A-3 to 40 CFR Part 60.</p> <p>Method 5 or 17 (positive pressure fabric filters must use Method 5D) in Appendix A-3 or A-6 to 40 CFR Part 60 and a minimum 1 dscm of sample volume per run.</p> <p>Method 19 F-factor methodology in Appendix A-7 to 40 CFR Part 60.</p>

Table 3 - Establishing Operating Limits

If having an applicable emission limit for...	And the operating limits are based on...	The permittee must...	Using...	According to the following requirements
1. PM	a. Wet scrubber operating parameters	Establish site-specific minimum scrubber pressure drop and minimum scrubber liquid flow rate operating limits according to 40 CFR 63.11211(b)	Data from the pressure drop and liquid flow-rate monitors and the PM performance stack tests	i. The permittee must collect scrubber pressure drop and liquid flow-rate data every 15 minutes during the entire period of the performance stack tests. ii. Determine the average pressure drop and liquid flow-rate for each individual test run in three-run performance stack test by computing the average of all the 15-minute readings taken during each test run.
	b. Electrostatic precipitator operating parameters	Establish a site-specific minimum total secondary electric power operating limit input according to 40 CFR 63.11211(b)	Data from the secondary electric power monitors and the PM performance stack tests	i. The permittee must collect secondary electric power data every 15 minutes during the entire period of the performance stack tests. ii. Determine the average total secondary electric power for each individual test run in the three-run performance stack test by computing the average of all the 15-minute readings taken during each test run.
2. Any pollutant for which compliance is demonstrated by a performance test	Boiler operating load	Establish a unit-specific limit for maximum operating load according to 40 CFR 63.11212(c)	Data from the operating load monitors (fuel feed monitors or steam generation monitors)	i. The permittee must collect operating load data (fuel feed rate or steam generation data) every 15 minutes during the entire period of the performance test. ii. Determine the average operating load by computing the hourly averages using all of the 15-minute readings taken during each performance test. iii. Determine the average of the three test run averages during the performance test, and multiply this by 1.1 (110 percent) as the operating limit.

Table 4 - Demonstrating Continuous Compliance

If the permittee must meet the following operating limits...	The permittee must demonstrate continuous compliance by...
1. Opacity	a. Collecting the opacity monitoring system data according to Conditions 12.8d and 12.8f; and b. Reducing the opacity monitoring data to 6-minute averages; and c. Maintaining opacity to less than or equal to 10 percent (daily block average).
2. Fabric Filter Bag Leak Detection Operation	Installing and operating a bag leak detection system according to Condition 12.8g and operating the fabric filter such that the requirements in Condition 12.9iii are met.
3. Wet Scrubber Pressure Drop and Liquid Flow-rate	a. Collecting the pressure drop and liquid flow rate monitoring system data according to Condition 12.8; and b. Reducing the data to 30-day rolling averages; and c. Maintaining the 30-day rolling average pressure drop and liquid flow rate at or above the minimum pressure drop and minimum liquid flow rate according to 40 CFR 63.11211.
4. Dry Scrubber Sorbent or Activated Carbon Injection Rate	a. Collecting the sorbent or activated carbon injection rate monitoring system data for the dry scrubber according to Condition 12.8; and b. Reducing the data to 30-day rolling averages; and c. Maintaining the 30-day rolling average sorbent or activated carbon injection rate at or above the minimum sorbent or activated carbon injection rate according to 40 CFR 63.11211.
5. Electrostatic Precipitator Total Secondary Electric Power	a. Collecting the total secondary electric power monitoring system data for the electrostatic precipitator according to Condition 12.8; and b. Reducing the data to 30-day rolling averages; and c. Maintaining the 30-day rolling average total secondary electric power at or above the minimum secondary electric power according to 40 CFR 63.11211.
6. Boiler Operating Load	a. Collecting operating load data (fuel feed rate or steam generation data) every 15 minutes; and b. Reducing the data to 30-day rolling averages; and c. Maintaining the 30-day rolling average at or below the operating limit established during the performance test according to 40 CFR 63.11212(c) and Table 3.

Lane Regional Air Protection Agency

**GENERAL
AIR CONTAMINANT DISCHARGE PERMIT
ASSESSMENT REPORT**

WOOD PRODUCTS

FACILITY

Whitsell Manufacturing, Inc.

32910 and 32941 East Saginaw Road
Cottage Grove, OR 97424

SOURCE DESCRIPTION AND QUALIFICATION

1. This General Permit is designed to regulate air contaminant emissions from wood products facilities including sawmills, planing mills, millwork facilities, veneer peeling, veneer drying, and plywood production facilities.
2. If there are other emission activities occurring at the facility besides those regulated by this permit, the facility may be required to obtain a Simple or Standard Air Contaminant Discharge Permit (ACDP) or General ACDP Attachment(s), as applicable.
3. Facilities eligible for assignment to this permit have not experienced recurring or serious compliance problems.

ASSESSMENT OF EMISSIONS

4. Facilities assigned to this General Permit are primarily sources of PM, PM₁₀, and PM_{2.5}. Many of the facilities have boilers for producing steam that is used in the production processes. Boilers are sources of PM, PM₁₀, and PM_{2.5} as well as SO₂, CO, NO_x, VOC, HAP, and GHG emissions. The type of fuel (wood, natural gas, or oil) used in boilers affects the levels of these emissions. Some facilities have lumber drying kilns that are sources of PM, PM₁₀, PM_{2.5}, VOC, and HAP. The surface coating operations at some facilities may emit VOC and hazardous air pollutants (HAPs).
5. LRAPA has assessed the level of emissions of all air pollutants from these facilities and determined that facilities complying with the operational limits and monitoring requirements of this permit have emission levels below the established levels of concern stated in Tables 1 and 2 of LRAPA title 12.

FACILITY EMISSION UNITS

6. The facility was inspected on June 15, 2023, and found to have the following equipment and/or activities occurring at the 32941 East Saginaw Road location:

Emission Unit	Pollution Control Device
One (1) 4.713 MMBtu/hr Burnham natural gas-fired boiler	None
Two (2) steam-heated heat treating chambers	None
One (1) planer and associated lumber remanufacturing saws and molder	Routed to material handling cyclones (3 total)
One (1) chipper and screener	
One (1) auto core pointer	Cyclone
One (1) wood stain application process area with partially enclosed "spray vessel"	None
One (1) 1,600 kW Mitsubishi/Baldor diesel-fired emergency generator	None

⁽¹⁾ Requirements for the emergency generator are contained in the General ACDP Attachment AQGP-050a issued on January 30, 2024.

At the time of inspection, the permittee was not operating any equipment at the 32910 East Saginaw Road location.

SOURCE TESTS

7. LRAPA is not aware of any source testing conducted at this facility.

SPECIFIC AIR PROGRAM APPLICABILITY

8. Facilities assigned to this General Permit are subject to the general visible emissions standards, nuisance requirements (control of fugitive dust and odors), particulate matter standards, and fuel sulfur limits in LRAPA titles 32, 48, and 49. The permit contains requirements and limitations to ensure compliance with these standards.
9. Some of the facilities assigned to this General Permit may have veneer dryers that are subject to the visible emissions and particulate matter limits in LRAPA title 33. The permit contains requirements and limitations to ensure compliance with these standards.
10. Some of the facilities assigned to this General Permit are subject to federal New Source Performance Standards for Small Industrial-Commercial-Institutional Steam Generating Units found in 40 CFR, Part 60, Subpart Dc. Facilities for which construction, modification, or reconstruction was commenced after June 9, 1989 are subject to these

federal requirements, which include sulfur limits for fuel oil. The permit contains requirements and limitations to ensure compliance with these federal standards.

11. Some of the facilities assigned to this General Permit are subject to federal National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers found in 40 CFR, Part 63, Subpart JJJJJJ. The federal standards apply to all new, reconstructed and existing industrial, commercial, and institutional boilers as listed in 40 CFR 63.11200 and defined in 40 CFR 63.11237, including but not limited to oil-fired boilers. The permit contains requirements and limitations to ensure compliance with these federal standards.

COMPLIANCE ASSURANCE

12. Permittees are required to demonstrate compliance with the emission limits for wood fired boilers by conducting a stack source test within 2 years after being assigned to the permit.
13. Permittees are required to maintain records of production, fuel use, upset conditions, and complaints received at the facility. These items are reported to LRAPA annually.
14. LRAPA staff members perform site inspections of the permitted facilities on a routine basis, and more frequently if complaints are received.

REVOCATION OF ASSIGNMENT

15. Any facility that fails to demonstrate compliance, generates complaints, or fails to conform to the requirements and limitations contained in the permit may have its assignment to the General Permit revoked. The facility would then be subject to a higher, more stringent level of permitting.

PUBLIC NOTICE

16. General Air Contaminant Discharge Permits are authorized by LRAPA Rules and Regulations and are part of the State Implementation Plan. As part of the General ACDP issuance process under LRAPA title 31, the public was provided at least 30 days to submit written comments. There were no comments received during the public comment period.



ASSIGNMENT TO
GENERAL AIR CONTAMINANT DISCHARGE PERMIT ATTACHMENT

Lane Regional Air Protection Agency
1010 Main Street
Springfield, OR 97477
Telephone: (541) 736-1056

Issued To:
Whitsell Manufacturing, Inc.
32910 East Saginaw Road
Cottage Grove, OR 97424

Information Relied Upon:
Application Number: 69605, 69685
Dated: May 2, 2023, June 15, 2023

Plant Site Location:
32910 and 32941 East Saginaw Road
Cottage Grove, OR 97424

Land Use Compatibility Statement:
From: Lane County
Dated: October 13, 2010 and May 10, 2023

ASSIGNMENT: The permittee identified above is assigned by the Lane Regional Air Protection Agency to the General ACDP Attachment listed below in accordance with ORS 468A.040, LRAPA 37-0062(2), and based on the land use compatibility findings included in the permit record.



Susannah Sbragia, Interim Director

2-27-2024

Dated

General ACDP Attachment Issued in Accordance with LRAPA Section 37-0062:

General ACDP Attachment Number	Expiration Date	Emission Unit Description
AQGP-050a	01/09/2034	Emergency stationary RICE subject to 40 CFR part 63 subpart ZZZZ alone or in combination with 40 CFR part 60 subpart IIII and/or 40 CFR part 60 subpart JJJJ, as adopted under LRAPA titles 44 and 46.

SUPPLEMENTAL INFORMATION:

Facility Contact:		
Name:	Bonnie Parmenter, CFO	
Phone number:	(541) 726-6637	
Email address:	bonniewhitsellmfg@gmail.com	
Permit Summary:		
Source Test Requirement	No	N/A
NSPS (40 CFR Part 60)	Yes	IIII
NESHAP (40 CFR Part 63)	Yes	ZZZZ
Reports Required:		
Annual	Yes	February 15 each year
NSPS	No	N/A
NESHAP	No	N/A
Other	N/A	N/A
Public Notice:	Category I	

JJW/RR: 02/23/2024



Permit Number: AQGP-050a
Expiration Date: January 9, 2034
Page 1 of 24

LANE REGIONAL AIR PROTECTION AGENCY
GENERAL AIR CONTAMINANT DISCHARGE PERMIT
ATTACHMENT

Lane Regional Air Protection Agency
1010 Main Street
Springfield, OR 97477
Telephone: (541) 736-1056

This permit attachment is being issued in accordance with the provisions of ORS 468A.040 and LRAPA 37-0062.

ISSUED BY THE LANE REGIONAL AIR PROTECTION AGENCY


Susannah Sbragia, Interim Director

1-9-2024
Effective Date

Emergency stationary RICE subject to 40 CFR part 63 subpart ZZZZ alone or in combination with 40 CFR part 60 subpart IIII and/or 40 CFR part 60 subpart JJJJ, as adopted under LRAPA titles 44 and 46.

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1.0 PERMIT ASSIGNMENT

1.1. Qualifications

The permittee must meet all of the following Conditions in order to qualify for assignment to this General Air Contaminant Discharge Permit (ACDP) Attachment:

- a. The facility is already covered by a General ACDP;
- b. The source is considered an area source of federal hazardous air pollutants;
- c. The aggregate horsepower rating of all stationary emergency generator and pump engines at the source is not more than 3,000 horsepower (HP);
- d. No emergency generator is equipped with emission controls, including but not limited to diesel particulate filters, 3-way catalysts, or selective noncatalytic reduction, to meet any applicable emission limitations; and
- e. The permittee does not use any emergency generators or firewater pumps for peak shaving or non-emergency demand response, or to generate income for a facility to an electric grid or otherwise supply power as part of a financial arrangement with another entity.
- f. If the emergency stationary reciprocating internal combustion engines is subject to a New Source Performance Standard, the engine must be certified by the manufacturer to meet the applicable emission limitations under the standard for the fuels the engine will use, except as allowed by rule.
- g. If the emergency stationary reciprocating internal combustion engines is subject to 40 CFR part 60 subpart IIII – Standards of Performance for Stationary Compression Ignition Internal Combustion Engines, the engine displacement must be less than 30 liters per cylinder.
- h. If the emergency stationary reciprocating internal combustion engines is subject to 40 CFR part 60 subpart JJJJ – Standards of Performance for Stationary Spark Ignition Internal Combustion Engines, the engine power must be greater than 25 HP.

1.2. Assignment

LRAPA will assign qualifying permittees to this General ACDP Attachment that have and maintain a good record of compliance with the LRAPA's Air Quality regulations and that LRAPA determines would be appropriately regulated by a General ACDP Attachment. LRAPA may rescind assignment if the permittee no longer meets the qualifications in Condition 1.1 above, conditions of LRAPA Section 37-0060, or the conditions of General ACDP Attachment.

1.3. Permitted Activities

Until this General ACDP Attachment expires, is modified, or is revoked, the permittee is allowed to discharge air contaminants from processes and activities directly related to or associated with the air contaminant source(s) listed on the first page of this permit attachment in addition to any categorically insignificant activities, as defined in LRAPA title 12, at the source. Discharge of air contaminants from any other equipment or activity not identified herein is not authorized by this permit attachment.

1.4. Relation to Local Land Use Laws

This permit attachment is not valid outside of Lane County, or at any location where the operation of the permittee's processes, activities, and insignificant activities would violate any local land use or zoning laws. It is the permittee's responsibility to obtain local land use approvals as, or where, applicable before operating this facility at any location. For operation outside of Lane County, contact the Oregon Department of Environmental Quality for any necessary permits at (503) 229-5359.

2.0 GENERAL EMISSION STANDARDS AND LIMITS

2.1. Visible Emissions/Opacity

The permittee must comply with the following visible emission limit. Opacity must be measured as a three-minute aggregate using Modified EPA Method 9 in accordance with EPA Method 203B or an alternative method approved by LRAPA that is equivalent to Modified EPA Method 9.

- a. Visible emissions from any air contaminant source must not equal or exceed an average of 20% opacity for a period or periods aggregating more than three (3) minutes in any one (1) hour; [LRAPA 32-010(3)]
- b. Aggregate times consist of the total duration of all reading during the observation period that are equal to or greater than the opacity percentage in the standard, whether or not the readings are consecutive; and [LRAPA 32-010(2)]
- c. The visible emission standard in this condition does not apply to fugitive emissions from a source or part of a source. [LRAPA 32-010(1)]

2.2. Particulate Emissions

The permittee must comply with the following particulate emission limits. Compliance with the particulate emission standards in this section must be determined using DEQ Method 5 or an alternative method approved by LRAPA.

- a. The permittee must not cause, suffer, allow, or permit particulate matter emissions in excess of 0.20 grains per dry standard cubic foot from any air contaminant source installed, constructed or modified before June 1, 1970 for equipment or a mode of operation that is used less than 876 hours per calendar year. [LRAPA 32-015(2)(a)(C)]
- b. The permittee must not cause, suffer, allow, or permit particulate matter emissions in excess of 0.14 grains per dry standard cubic foot from any air contaminant source installed, constructed or modified on or after June 1, 1970 but prior to April 16, 2015 if there are no representative compliance source test results. [LRAPA 32-015(2)(b)(B)]
- c. The permittee must not cause, suffer, allow, or permit particulate matter emissions in excess of 0.10 grains per dry standard cubic foot from any air contaminant source installed, constructed or modified after April 16, 2015. [LRAPA 32-015(2)(c)]

2.3. Nuisance Prohibited

The permittee must comply with the following nuisance requirements:

- a. The permittee must not cause or allow air contaminants from any source subject to regulation by LRAPA to cause a nuisance. [LRAPA 49-010(1)]
- b. The permittee must not cause or permit the emission of any particulate matter larger than 250 microns in size at such duration and quantity as to create an observable deposition upon the real property of another person. [LRAPA 32-055]
- c. The permittee must not discharge from any source whatsoever such quantities of air contaminants which cause injury or damage to any persons, the public, business or property; such determination to be made by LRAPA. [LRAPA 32-090(1)]

2.4. Compliance with General Emission Standards and Limits

- a. The permittee must operate and maintain all stationary RICE and after-treatment control device (if any) subject to this General ACDP Attachment according to the manufacturer's emission-related written instructions or develop a maintenance plan which must provide to the extent practicable for the maintenance and operation of the engine in a manner consistent with good air pollution control practice for minimizing emissions. [LRAPA 32-007(1)]
- b. The permittee must keep records of the maintenance conducted on all stationary RICE subject to this General ACDP Attachment in order to demonstrate that the permittee operated and maintained the stationary RICE according to the manufacturer's emission-related written instructions or the permittee's own maintenance plan. [LRAPA 34-016(1)]

3.0 40 CFR PART 63 SUBPART ZZZZ – NATIONAL EMISSIONS STANDARDS FOR HAZARDOUS AIR POLLUTANTS FOR STATIONARY RECIPROCATING INTERNAL COMBUSTION ENGINES

3.1. Applicability

- a. 40 CFR part 63 subpart ZZZZ applies to any existing, new, or reconstructed stationary RICE located at an area source of HAP emissions, excluding stationary RICE being tested at a stationary RICE test cell/stand. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6590(a)]
 - i. Existing stationary RICE. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6590(a)(1)]
 - A. For stationary RICE located at an area source of HAP emissions, a stationary RICE is existing if the permittee commenced construction or reconstruction of the stationary RICE before June 12, 2006. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6590(a)(1)(iii)]
 - B. A change in ownership of an existing stationary RICE does not make that stationary RICE a new or reconstructed stationary RICE. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6590(a)(1)(iv)]

- ii. New stationary RICE. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6590(a)(2)]
 - A. A stationary RICE located at an area source of HAP emissions is new if the permittee commenced construction of the stationary RICE on or after June 12, 2006. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6590(a)(2)(iii)]
- iii. Reconstructed stationary RICE. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6590(a)(3)]
 - A. A stationary RICE located at an area source of HAP emissions is reconstructed if the permittee met the definition of reconstruction in 40 CFR 63.2 and reconstruction is commenced on or after June 12, 2006. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6590(a)(3)(iii)]
- b. Stationary RICE subject to Regulations under 40 CFR part 60. A new or reconstructed stationary RICE located at an area source must meet the requirements of 40 CFR part 63 subpart ZZZZ by meeting the requirements of 40 CFR part 60 subpart IIII, for compression ignition engines or 40 CFR part 60 subpart JJJJ, for spark ignition engines. No further requirements apply for such engines under 40 CFR part 63 subpart ZZZZ. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6590(c) and 40 CFR 63.6590(c)(1)]

3.2. Emission Limitations, Operating Limitations, and Other Requirements for an Existing Stationary RICE Located at an Area Source of HAP Emissions

If the permittee owns or operates an existing stationary RICE located at an area source of HAP emissions, the permittee must comply with the requirements in Table 2d to 40 CFR part 63 subpart ZZZZ that apply to the permittee. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6603(a)]

Table 2d to Subpart ZZZZ of Part 63 – Requirements for Existing Stationary RICE Located at Area Sources of HAP Emissions

As stated in 40 CFR 63.6603 and 40 CFR 63.6640, the permittee must comply with the following requirements for existing stationary RICE located at area sources of HAP emissions:

For each . . .	The permittee must meet the following requirement, except during periods of startup . . .	During periods of startup the permittee must . . .
4. Emergency stationary CI RICE. ^a	<ul style="list-style-type: none"> a. Change oil and filter every 500 hours of operation or annually, whichever comes first;^b b. Inspect air cleaner every 1,000 hours of operation or annually, whichever comes first, and replace as necessary; and c. Inspect all hoses and belts every 500 hours of operation or annually, whichever comes 	Minimize the engine's time spent at idle and minimize the engine's startup time at startup to a period needed for appropriate and safe loading of the engine, not to exceed 30 minutes, after which time the non-startup emission limitations apply.

Table 2d to Subpart ZZZZ of Part 63 – Requirements for Existing Stationary RICE Located at Area Sources of HAP Emissions

As stated in 40 CFR 63.6603 and 40 CFR 63.6640, the permittee must comply with the following requirements for existing stationary RICE located at area sources of HAP emissions:

For each . . .	The permittee must meet the following requirement, except during periods of startup . . .	During periods of startup the permittee must . . .
	first, and replace as necessary.	
5. Emergency stationary SI RICE. ^a	<p>a. Change oil and filter every 500 hours of operation or annually, whichever comes first;^b</p> <p>b. Inspect spark plugs every 1,000 hours of operation or annually, whichever comes first, and replace as necessary; and</p> <p>c. Inspect all hoses and belts every 500 hours of operation or annually, whichever comes first, and replace as necessary.</p>	Minimize the engine's time spent at idle and minimize the engine's startup time at startup to a period needed for appropriate and safe loading of the engine, not to exceed 30 minutes, after which time the non-startup emission limitations apply.

^a If an emergency engine is operating during an emergency and it is not possible to shut down the engine in order to perform the management practice requirements on the schedule required in Table 2d of 40 CFR part 63 subpart ZZZZ, or if performing the management practice on the required schedule would otherwise pose an unacceptable risk under federal, state, or local law, the management practice can be delayed until the emergency is over or the unacceptable risk under federal, state, or local law has abated. The management practice should be performed as soon as practicable after the emergency has ended or the unacceptable risk under federal, state, or local law has abated. The permittee must report any failure to perform the management practice on the schedule required and the federal, state or local law under which the risk was deemed unacceptable.

^b The permittee has the option to utilize an oil analysis program as described in 40 CFR 63.6625(i) or (j) in order to extend the specified oil change requirement in Table 2d of 40 CFR part 63 subpart ZZZZ.

3.3. General Requirements

- a. The permittee must be in compliance with the emission limitations, operating limitations, and other requirements in 40 CFR part 63 subpart ZZZZ that apply to the permittee at all times. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6605(a)]
- b. At all times the permittee must operate and maintain any affected source, including

associated air pollution control equipment and monitoring equipment, in a manner consistent with safety and good air pollution control practices for minimizing emissions. The general duty to minimize emissions does not require the permittee to make any further efforts to reduce emissions if levels required by this standard have been achieved. Determination of whether such operation and maintenance procedures are being used will be based on information available to LRAPA which may include, but is not limited to, monitoring results, review of operation and maintenance procedures, review of operation and maintenance records, and inspection of the source. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6605(b)]

3.4. Monitoring, Installation, Collection, Operation and Maintenance Requirements

- a. If the permittee owns or operates an existing emergency stationary RICE located at an area source of HAP emissions, the permittee must operate and maintain the stationary RICE and after-treatment control device (if any) according to the manufacturer's emission-related written instructions or develop a maintenance plan which must provide to the extent practicable for the maintenance and operation of the engine in a manner consistent with good air pollution control practice for minimizing emissions. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6625(e)]
- b. If the permittee owns or operates an existing emergency stationary RICE located at an area source of HAP emissions, the permittee must install a non-resettable hour meter on each emergency stationary RICE if one is not already installed. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6625(f)]
- c. If the permittee operates a new, reconstructed, or existing stationary engine, the permittee must minimize the engine's time spent at idle during startup and minimize the engine's startup time to a period needed for appropriate and safe loading of the engine, not to exceed 30 minutes, after which time the emission standards applicable to all times other than startup in Table 2d to 40 CFR part 63 subpart ZZZZ apply. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6625(h)]
- d. If the permittee owns or operates a stationary CI engine that is subject to the work, operation or management practices in item 4 of Table 2d of 40 CFR part 63 subpart ZZZZ, the permittee has the option of utilizing an oil analysis program in order to extend the specified oil change requirement in Table 2d of 40 CFR part 63 subpart ZZZZ. The oil analysis must be performed at the same frequency specified for changing the oil in Table 2d of 40 CFR part 63 subpart ZZZZ. The analysis program must at a minimum analyze the following three parameters: Total Base Number, viscosity, and percent water content. The condemning limits for these parameters are as follows: Total Base Number is less than 30 percent of the Total Base Number of the oil when new; viscosity of the oil has changed by more than 20 percent from the viscosity of the oil when new; or percent water content (by volume) is greater than 0.5. If all of these condemning limits are not exceeded, the permittee is not required to change the oil. If any of the limits are exceeded, the permittee must change the oil within two (2) days of receiving the results of the analysis; if the engine is not in operation when the results of the analysis are received, the permittee must change the oil within 2 days or before commencing operation, whichever is later. The permittee must keep records of the parameters that are analyzed as part of the program, the results of the analysis, and the oil changes for the

engine. The analysis program must be part of the maintenance plan for the engine. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6625(i)]

- e. If the permittee owns or operates a stationary SI engine that is subject to the work, operation or management practices in item 5 of Table 2d to 40 CFR part 63 subpart ZZZZ, the permittee has the option of utilizing an oil analysis program in order to extend the specified oil change requirement in Table 2d to 40 CFR part 63 subpart ZZZZ. The oil analysis must be performed at the same frequency specified for changing the oil in Table 2d to 40 CFR part 63 subpart ZZZZ. The analysis program must at a minimum analyze the following three parameters: Total Acid Number, viscosity, and percent water content. The condemning limits for these parameters are as follows: Total Acid Number increases by more than 3.0 milligrams of potassium hydroxide (KOH) per gram from Total Acid Number of the oil when new; viscosity of the oil has changed by more than 20 percent from the viscosity of the oil when new; or percent water content (by volume) is greater than 0.5. If all of these condemning limits are not exceeded, the permittee is not required to change the oil. If any of the limits are exceeded, the permittee must change the oil within two (2) days of receiving the results of the analysis; if the engine is not in operation when the results of the analysis are received, the permittee must change the oil within two (2) days or before commencing operation, whichever is later. The permittee must keep records of the parameters that are analyzed as part of the program, the results of the analysis, and the oil changes for the engine. The analysis program must be part of the maintenance plan for the engine. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6625(j)]

3.5. Demonstrating Continuous Compliance with the Emission Limitations and Operating Limitations

- a. The permittee must operate the emergency stationary RICE according to the requirements in Conditions 3.5.a.i. through ii. In order for the engine to be considered an emergency stationary RICE under 40 CFR part 63 subpart ZZZZ, any operation other than emergency operation, maintenance and testing, as described in Conditions 3.5.a.i. through ii., is prohibited. If the permittee does not operate the engine according to the requirements in Conditions 3.5.a.i. through ii., the engine will not be considered an emergency engine under 40 CFR part 63 subpart ZZZZ and must meet all requirements for non-emergency engines. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6640(f)]
 - i. There is no time limit on the use of emergency stationary RICE in emergency situations. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6640(f)(1)]
 - ii. The permittee may operate the emergency stationary RICE for any combination of the purposes specified in Condition 3.5.a.ii.A. for a maximum of 100 hours per calendar year. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6640(f)(2)]
 - A. Emergency stationary RICE may be operated for maintenance checks and readiness testing, provided that the tests are recommended by federal, state or local government, the manufacturer, the vendor, the regional transmission organization or equivalent balancing authority and transmission operator, or the insurance company associated with the engine. The permittee may petition LRAPA for approval of additional hours to be used for maintenance

checks and readiness testing, but a petition is not required if the permittee maintains records indicating that federal, state, or local standards require maintenance and testing of emergency RICE beyond 100 hours per calendar year. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6640(f)(2)(i)]

3.6. Notification Requirements

If the permittee owns or operates an existing stationary emergency RICE, the permittee is not required to submit any notifications under 40 CFR 63.7(b) and (c), 40 CFR 63.8(e), (f)(4) and (f)(6), 40 CFR 63.9(b) through (e), and (g) and (h). [LRAPA 44-150(5)(ffff) and 40 CFR 63.6645(a)(5)]

3.7. Reporting Requirements

If the permittee owns or operates an existing stationary emergency RICE, the permittee is not required to submit any reports for 40 CFR part 63 subpart ZZZZ. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6650(a)]

3.8. Recordkeeping Requirements

- a. The permittee must keep the records described in Conditions 3.8.a.i. through ii. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6655(a)]
 - i. Records of the occurrence and duration of each malfunction of operation (*i.e.*, process equipment). [LRAPA 44-150(5)(ffff) and 40 CFR 63.6655(a)(2)]
 - ii. Records of actions taken during periods of malfunction to minimize emissions in accordance with Condition 3.3.b., including corrective actions to restore malfunctioning process to its normal or usual manner of operation. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6655(a)(5)]
- b. The permittee must keep records of the maintenance conducted on the stationary RICE in order to demonstrate that the permittee operated and maintained the stationary RICE according to the permittee's own maintenance plan; [LRAPA 44-150(5)(ffff) and 40 CFR 63.6655(e)]
- c. If the permittee owns or operates an existing emergency stationary RICE located at an area source of HAP emissions that does not meet the standards applicable to non-emergency engines, the permittee must keep records of the hours of operation of the engine that is recorded through the non-resettable hour meter. The permittee must document how many hours are spent for emergency operation, including what classified the operation as emergency and how many hours are spent for non-emergency operation. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6655(f)]

3.9. Records Retention

- a. The permittee's records must be in a form suitable and readily available for expeditious review according to 40 CFR 63.10(b)(1). [LRAPA 44-150(5)(ffff) and 40 CFR 63.6660(a)]
- b. As specified in 40 CFR 63.10(b)(1), the permittee must keep each record for five (5) years following the date of each occurrence, measurement, maintenance, corrective action, report, or record. [LRAPA 44-150(5)(ffff) and 40 CFR 63.6660(b)]

- c. The permittee must keep each record readily accessible in hard copy or electronic form for at least five (5) years after the date of each occurrence, measurement, maintenance, corrective action, report, or record, according to 40 CFR 63.10(b)(1). [LRAPA 44-150(5)(ffff) and 40 CFR 63.6660(c)]

4.0 40 CFR PART 60 SUBPART IIII – STANDARDS OF PERFORMANCE FOR STATIONARY COMPRESSION IGNITION INTERNAL COMBUSTION ENGINES

4.1. Applicability

- a. 40 CFR part 60 subpart IIII is applicable to permittees that own or operate stationary compression ignition (CI) internal combustion engines (ICE) as specified Conditions 4.1.a.i. and ii. For the purposes of 40 CFR part 60 subpart IIII, the date that construction commences is the date the engine is ordered by the permittee. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4200(a)]
 - i. Permittee's that own and operate stationary CI ICE that commence construction after July 11, 2005, where the stationary CI ICE are: [LRAPA 46-535(3)(cccc) and 40 CFR 60.4200(a)(2)]
 - A. Manufactured after April 1, 2006, and are not fire pump engines, or [LRAPA 46-535(3)(cccc) and 40 CFR 60.4200(a)(2)(i)]
 - B. Manufactured as a certified National Fire Protection Association (NFPA) fire pump engine after July 1, 2006. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4200(a)(2)(ii)]
 - ii. Permittees that own or operate any stationary CI ICE that are modified or reconstructed after July 11, 2005 and any permittee that modifies or reconstructs any stationary CI ICE after July 11, 2005. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4200(a)(3)]

4.2. Emission Standards for Stationary CI Internal Combustion Emergency Engines

- a. Permittees that own or operate pre-2007 model year emergency stationary CI ICE with a displacement of less than 10 liters per cylinder that are not fire pump engines must comply with the emission standards in Table 1 to 40 CFR part 60 subpart IIII. Permittees that own or operate a pre-2007 model year emergency stationary CI ICE with a displacement of greater than or equal to 10 liters per cylinder and less than 30 liters per cylinder that are not fire pump engines must comply with the Tier 1 emission standards in 40 CFR part 1042, appendix I. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(a)]
- b. Permittees that own or operate 2007 model year and later emergency stationary CI ICE with a displacement of less than 30 liters per cylinder that are not fire pump engines must comply with the emission standards for new nonroad CI engines in 40 CFR 60.4202, for all pollutants, for the same model year and maximum engine power for their 2007 model year and later emergency stationary CI ICE. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(b)]

- c. Permittees that own or operate fire pump engines with a displacement of less than 30 liters per cylinder must comply with the emission standards in Table 4 to 40 CFR part 60 subpart IIII, for all pollutants. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(c)]
- d. Permittees that own or operate emergency stationary CI engines with a displacement of greater than or equal to 30 liters per cylinder must meet the requirements in this section. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)]
 - i. For engines installed prior to January 1, 2012, limit the emissions of NO_x in the stationary CI internal combustion engine exhaust to the following: [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)(1)]
 - A. 17.0 g/KW-hr (12.7 g/HP-hr) when maximum engine speed is less than 130 rpm; [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)(1)(i)]
 - B. $45 n^{-0.2}$ g/KW-hr ($34 n^{-0.2}$ g/HP-hr) when maximum engine speed is 130 or more but less than 2,000 rpm, where n is maximum engine speed; and [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)(1)(ii)]
 - C. 9.8 g/kW-hr (7.3 g/HP-hr) when maximum engine speed is 2,000 rpm or more. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)(1)(iii)]
 - ii. For engines installed on or after January 1, 2012, limit the emissions of NO_x in the stationary CI internal combustion engine exhaust to the following: [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)(2)]
 - A. 14.4 g/KW-hr (10.7 g/HP-hr) when maximum engine speed is less than 130 rpm; [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)(2)(i)]
 - B. $44 n^{-0.23}$ g/KW-hr ($33 n^{-0.23}$ g/HP-hr) when maximum engine speed is greater than or equal to 130 but less than 2,000 rpm and where n is maximum engine speed; and [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)(2)(ii)]
 - C. 7.7 g/KW-hr (5.7 g/HP-hr) when maximum engine speed is greater than or equal to 2,000 rpm. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)(2)(iii)]
 - iii. Limit the emissions of PM in the stationary CI internal combustion engine exhaust to 0.40 g/KW-hr (0.30 g/HP-hr). [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(d)(3)]
- e. Permittees that own or operate any modified or reconstructed emergency stationary CI ICE subject to 40 CFR part 60 subpart IIII subpart must meet the emission standards applicable to the model year, maximum engine power, and displacement of the modified or reconstructed CI ICE that are specified in Conditions 4.2.a. through d. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4205(f)]

4.3. Emission Standard End Date

Permittees that own or operate stationary CI ICE must operate and maintain stationary CI ICE that achieve the emission standards as required in Condition 4.2 over the entire life of the engine. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4206]

4.4. Fuel Requirements for Stationary CI Internal Combustion Engines

- a. Beginning October 1, 2010, permittees that own or operate stationary CI ICE subject to 40 CFR part 60 subpart IIII with a displacement of less than 30 liters per cylinder that use diesel fuel must use diesel fuel that meets the requirements of Condition 4.4.a.i. and ii. for nonroad diesel fuel, except that any existing diesel fuel purchased (or otherwise obtained) prior to October 1, 2010, may be used until depleted. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4207(b)]
 - i. Sulfur standard. Maximum sulfur content of 15 ppm. [40 CFR 1090.305(b)]
 - ii. Cetane index or aromatic content. Diesel fuel must meet one of the following standards: [40 CFR 1090.305(c)]
 - A. Minimum cetane index of 40. [40 CFR 1090.305(c)(1)]
 - B. Maximum aromatic content of 35 volume percent. [40 CFR 1090.305(c)(2)]
- b. Beginning June 1, 2012, permittees that own or operate stationary CI ICE subject to 40 CFR part 60 subpart IIII with a displacement of greater than or equal to 30 liters per cylinder must use diesel fuel that meets a maximum per-gallon sulfur content of 1,000 parts per million (ppm). [LRAPA 46-535(3)(cccc) and 40 CFR 60.4207(d)]

4.5. Monitoring Requirements for Stationary CI Internal Combustion Engines

Permittees that own or operate stationary CI internal combustion engines must meet the monitoring requirements of Condition 4.5. In addition, the permittee must also meet the monitoring requirements specified in Condition 4.6. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4209]

- a. If the permittee owns or operates an emergency stationary CI internal combustion engine that does not meet the standards applicable to non-emergency engines, the permittee must install a non-resettable hour meter prior to startup of the engine. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4209(a)]

4.6. Compliance Requirements for Stationary CI Internal Combustion Engines

- a. If the permittee must comply with the emission standards specified in 40 CFR part 60 subpart IIII, the permittee must do all of the following: [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(a)]
 - i. Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's emission-related written instructions; [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(a)(1)]
 - ii. Change only those emission-related settings that are permitted by the manufacturer; and [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(a)(2)]
 - iii. Meet the requirements of 40 CFR part 1068, as they apply to the permittee. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(a)(3)]
- b. If the permittee owns or operates a pre-2007 model year stationary CI internal combustion engine and must comply with the emission standards specified in 40 CFR 60.4205(a), or if the permittee owns or operates a CI fire pump engine that is manufactured prior to the model years in Table 3 to 40 CFR part 60 subpart IIII and must comply with the emission standards specified in 40 CFR 60.4205(c), the permittee must

demonstrate compliance according to the method specified Condition 4.6.b.i. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(b)]

- i. Purchasing an engine certified to emission standards for the same model year and maximum engine power as described in 40 CFR parts 1039 and 1042, as applicable. The engine must be installed and configured according to the manufacturer's specifications. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(b)(1)]
- c. If the permittee owns or operates a 2007 model year and later stationary CI internal combustion engine and must comply with the emission standards specified in 40 CFR 60.4205(b), or if the permittee owns or operates a CI fire pump engine that is manufactured during or after the model year that applies to the fire pump engine power rating in Table 3 to 40 CFR part 60 subpart IIII and must comply with the emission standards specified in 40 CFR 60.4205(c), the permittee must comply by purchasing an engine certified to the emission standards in 40 CFR 60.2405(b) or (c), as applicable, for the same model year and maximum (or in the case of fire pumps, NFPA nameplate) engine power. The engine must be installed and configured according to the manufacturer's emission-related specifications. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(c)]
- d. If the permittee owns or operates a modified or reconstructed stationary CI internal combustion engine and must comply with the emission standards specified in 40 CFR 60.4205(f), the permittee must demonstrate compliance according to the method specified in Condition 4.6.d.i. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(e)]
 - i. Purchasing, or otherwise owning or operating, an engine certified to the emission standards in 40 CFR 60.4205(f), as applicable. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(e)(1)]
- e. If the permittee owns or operates an emergency stationary ICE, the permittee must operate the emergency stationary ICE according to the requirements in Conditions 4.6.e.i. through ii. In order for the engine to be considered an emergency stationary ICE under 40 CFR part 60 subpart IIII, any operation other than emergency operation and maintenance and testing, as described in Conditions 4.6.e.i. through ii., is prohibited. If the permittee does not operate the engine according to the requirements in Conditions 4.6.e.i. through ii., the engine will not be considered an emergency engine under 40 CFR part 60 subpart IIII and must meet all requirements for non-emergency engines. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(f)]
 - i. There is no time limit on the use of emergency stationary ICE in emergency situations. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(f)(1)]
 - ii. The permittee may operate the emergency stationary ICE for the purpose specified in Condition 4.6.e.ii.A. for a maximum of 100 hours per calendar year. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(f)(2)]
 - A. Emergency stationary ICE may be operated for maintenance checks and readiness testing, provided that the tests are recommended by federal, state or local government, the manufacturer, the vendor, the regional transmission organization or equivalent balancing authority and transmission operator, or

the insurance company associated with the engine. The permittee may petition LRAPA for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the permittee maintains records indicating that federal, state, or local standards require maintenance and testing of emergency ICE beyond 100 hours per calendar year. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4211(f)(2)(i)]

4.7. Notification, Reporting, and Recordkeeping Requirements for Stationary CI Internal Combustion Engines

- a. If the stationary CI internal combustion engine is an emergency stationary internal combustion engine, the permittee is not required to submit an initial notification. Starting with the model years in Table 5 to 40 CFR part 60 subpart IIII, if the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, the permittee must keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. The permittee must record the time of operation of the engine and the reason the engine was in operation during that time. [LRAPA 46-535(3)(cccc) and 40 CFR 60.4214(b)]

Table 3 to 40 CFR 60 Subpart IIII – Labeling and Recordkeeping Requirements for New Stationary Fire Pump Engines

Engine power	Starting model year engine manufacturers must certify new stationary fire pump engines according to 40 CFR 60.4202(d) ^c
KW < 75 (HP < 100)	2011
75 ≤ KW < 130 (100 ≤ HP < 175)	2010
130 ≤ KW ≤ 560 (175 ≤ HP ≤ 750)	2009
KW > 560 (HP > 750)	2008

^c Manufacturers of fire pump stationary CI ICE with a maximum engine power greater than or equal to 37 kW (50 HP) and less than 450 KW (600 HP) and a rated speed of greater than 2,650 revolutions per minute (rpm) are not required to certify such engines until three model years following the model year indicated in this table for engines in the applicable engine power category.

Table 5 to 40 CFR 60 Subpart IIII – Labeling and Recordkeeping Requirements for New Stationary Emergency Engines

Engine power	Starting model year
19 ≤ KW < 56 (25 ≤ HP < 75)	2013
56 ≤ KW < 130 (75 ≤ HP < 175)	2012
KW ≥ 130 (HP ≥ 175)	2011

5.0 40 CFR PART 60 SUBPART JJJJ – STANDARDS OF PERFORMANCE FOR STATIONARY SPARK IGNITION INTERNAL COMBUSTION ENGINES

5.1. Applicability

- a. 40 CFR part 60 subpart JJJJ is applicable to permittees that own or operate stationary spark ignition (SI) internal combustion engines (ICE) as specified Conditions 4.1.a.i. and ii. For the purposes of 40 CFR part 60 subpart JJJJ, the date that construction commences is the date the engine is ordered by the permittee. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4230(a)]
 - i. Owners and operators of stationary SI ICE that commence construction after June 12, 2006, where the stationary SI ICE are manufactured on or after January 1, 2009, for emergency engines with a maximum engine power greater than 19 KW (25 HP). [LRAPA 46-535(3)(dddd) and 40 CFR 60.4230(a)(4) and 40 CFR 60.4230(a)(4)(iv)]
 - ii. Permittees that own or operate stationary SI ICE that are modified or reconstructed after June 12, 2006, and any permittee that modifies or reconstructs any stationary SI ICE after June 12, 2006. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4230(a)(5)]

5.2. Emission Standards for Stationary SI Internal Combustion Engine

- a. Permittees that own or operate stationary SI ICE with a maximum engine power greater than 19 KW (25 HP) manufactured on or after the applicable date in Condition 5.1.a.i. that use gasoline must comply with the emission standards in 40 CFR 60.4231(b) for their stationary SI ICE. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4233(b)]
- b. Permittees that own or operate stationary SI ICE with a maximum engine power greater than 19 KW (25 HP) manufactured on or after the applicable date in Condition 5.1.a.i. that are rich burn engines that use liquefied petroleum gas (LPG) must comply with the emission standards in 40 CFR 60.4231(c) for their stationary SI ICE. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4233(c)]
- c. Permittees that own or operate stationary SI ICE with a maximum engine power greater than 19 KW (25 HP) and less than 75 KW (100 HP) (except gasoline and rich burn engines that use LPG) must comply with the emission standards in Table 1 to 40 CFR part 60 subpart JJJJ for their emergency stationary SI ICE. Permittees that own or operate stationary SI ICE with a maximum engine power greater than 19 KW (25 HP) and less than 75 KW (100 HP) manufactured prior to January 1, 2011, that were certified to the standards in Table 1 to 40 CFR part 60 subpart JJJJ applicable to engines with a maximum engine power greater than or equal to 100 HP and less than 500 HP, may optionally choose to meet those standards. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4233(d)]
- d. Permittees that own or operate stationary SI ICE with a maximum engine power greater than or equal to 75 KW (100 HP) (except gasoline and rich burn engines that use LPG) must comply with the emission standards in Table 1 to 40 CFR part 60 subpart JJJJ for the stationary SI ICE. For permittees that own or operate stationary SI ICE with a

maximum engine power greater than or equal to 100 HP (except gasoline and rich burn engines that use LPG) manufactured prior to January 1, 2011 that were certified to the certification emission standards in 40 CFR part 1048 applicable to engines that are not severe duty engines, if such stationary SI ICE was certified to a carbon monoxide (CO) standard above the standard in Table 1 to 40 CFR part 60 subpart JJJJ, then the permittee may meet the CO certification (not field testing) standard for which the engine was certified. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4233(e)]

- e. Permittees that own or operate any modified or reconstructed stationary SI ICE subject to 40 CFR part 60 subpart JJJJ must meet the requirements as specified in Conditions 5.2.e.i. through iii. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4233(f)]
 - i. Permittees that own or operate stationary SI ICE with a maximum engine power greater than 19 KW (25 HP) that are gasoline engines and are modified or reconstructed after June 12, 2006, must comply with the emission standards in 40 CFR 60.4231(b) for the stationary SI ICE. Engines with a date of manufacture prior to January 1, 2009 for emergency engines must comply with the emission standards specified in 40 CFR 60.4231(b) applicable to engines manufactured on January 1, 2009 for emergency engines. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4233(f)(1)]
 - ii. Permittees that own or operate stationary SI ICE with a maximum engine power greater than 19 KW (25 HP) that are rich burn engines that use LPG, that are modified or reconstructed after June 12, 2006, must comply with the same emission standards as those specified in 40 CFR 60.4231(c). Engines with a date of manufacture prior to January 1, 2009 for emergency engines must comply with the emission standards specified in 40 CFR 60.4231(c) applicable to engines manufactured on January 1, 2009 for emergency engines. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4233(f)(3)]
 - iii. Permittees that own or operate stationary SI natural gas and lean burn LPG engines with a maximum engine power greater than 19 KW (25 HP), that are modified or reconstructed after June 12, 2006, must comply with the same emission standards as those specified in Condition 5.2.c. or e., except that such permittees that own or operate emergency engines greater than or equal to 130 HP must meet a nitrogen oxides (NO_x) emission standard of 3.0 grams per HP-hour (g/HP-hr), a CO emission standard of 4.0 g/HP-hr (5.0 g/HP-hr for non-emergency engines less than 100 HP), and a volatile organic compounds (VOC) emission standard of 1.0 g/HP-hr, or a NO_x emission standard of 250 ppmvd at 15 percent oxygen (O₂), a CO emission standard 540 ppmvd at 15 percent O₂ (675 ppmvd at 15 percent O₂ for non-emergency engines less than 100 HP), and a VOC emission standard of 86 ppmvd at 15 percent O₂, where the date of manufacture of the engine is prior to January 1, 2009, for emergency engines. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4233(f)(1) and 40 CFR 60.4233(f)(4)(iii)]

Table 1 to 40 CFR 60 subpart JJJJ – NO_x, CO, and VOC Emission Standards for Stationary Emergency Engines >25 HP

Engine type and fuel	Maximum engine power	Manufacture date	Emission standards					
			g/HP-hr			ppmvd at 15% O ₂		
			NO _x	CO	VOC ^e	NO _x	CO	VOC
Emergency	25<HP<130	1/1/2009	10 ^d	387	N/A	N/A	N/A	N/A
	HP≥130		2.0	4.0	1.0	160	540	86

^d The emission standards applicable to emergency engines between 25 HP and 130 HP are in terms of NO_x + HC.

^e For purposes of 40 CFR part 60 subpart JJJJ, when calculating emissions of volatile organic compounds, emissions of formaldehyde should not be included.

5.3. Emission Standards End Date

Permittees that own or operate stationary SI ICE must operate and maintain stationary spark ignition internal combustion engine that achieve the emission standards as required in 40 CFR 60.4233 over the entire life of the engine. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4234]

5.4. Fuel Requirements for Stationary SI Gasoline Fired Internal Combustion Engines

Permittees that own or operate stationary SI ICE subject to 40 CFR part 60 subpart JJJJ that use gasoline must use gasoline that meets the per gallon sulfur limit in 40 CFR 1090.205. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4235]

5.5. Monitoring Requirements for Emergency Stationary SI Internal Combustion Engines

- Starting on July 1, 2010, if the emergency stationary SI internal combustion engine that is greater than or equal to 500 HP that was built on or after July 1, 2010, does not meet the standards applicable to non-emergency engines, the permittee must install a non-resettable hour meter. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4237(a)]
- Starting on January 1, 2011, if the emergency stationary SI internal combustion engine that is greater than or equal to 130 HP and less than 500 HP that was built on or after January 1, 2011, does not meet the standards applicable to non-emergency engines, the permittee must install a non-resettable hour meter. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4237(b)]
- If the permittee owns or operates an emergency stationary SI internal combustion engine that is less than 130 HP, was built on or after July 1, 2008, and does not meet the standards applicable to nonemergency engines, the permittee must install a non-resettable hour meter upon startup of the emergency engine. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4237(c)]

5.6. Compliance Requirements for Stationary SI Internal Combustion Engines

- If the permittee owns or operates an emergency stationary ICE, the permittee must operate the emergency stationary ICE according to the requirements in Conditions 5.6.a.i. through ii. In order for the engine to be considered an emergency stationary ICE under 40

CFR part 60 subpart JJJJ, any operation other than emergency operation and maintenance and testing, as described in Conditions 5.6.a.i. through ii., is prohibited. If the permittee does not operate the engine according to the requirements in Conditions 5.6.a.i. through ii., the engine will not be considered an emergency engine under 40 CFR part 60 subpart JJJJ and must meet all requirements for non-emergency engines. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4243(d)]

- i. There is no time limit on the use of emergency stationary ICE in emergency situations. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4243(d)(1)]
- ii. The permittee may operate the emergency stationary ICE for the purpose specified in Condition 5.6.a.ii.A. for a maximum of 100 hours per calendar year. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4243(d)(2)]
 - A. Emergency stationary ICE may be operated for maintenance checks and readiness testing, provided that the tests are recommended by federal, state or local government, the manufacturer, the vendor, the regional transmission organization or equivalent balancing authority and transmission operator, or the insurance company associated with the engine. The permittee may petition LRAPA for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the permittee maintains records indicating that federal, state, or local standards require maintenance and testing of emergency ICE beyond 100 hours per calendar year. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4243(d)(2)(i)]
- b. Permittees that own or operate stationary SI natural gas fired engines may operate their engines using propane for a maximum of 100 hours per year as an alternative fuel solely during emergency operations, but must keep records of such use. If propane is used for more than 100 hours per year in an engine that is not certified to the emission standards when using propane, the permittee is required to conduct a performance test to demonstrate compliance with the emission standards of 40 CFR 60.4233. [40 CFR 4243(e)]

5.7. Notification, Reporting, and Recordkeeping Requirements for Stationary SI Internal Combustion Engines

Permittees that own or operate stationary SI ICE must meet the following notification, reporting and recordkeeping requirements.

- a. Permittees that own or operate stationary SI ICE must keep records of the information in Conditions 5.7.a.i. through iii. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4245(a)]
 - i. All notifications submitted to comply with 40 CFR part 60 subpart JJJJ and all documentation supporting any notification. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4245(a)(1)]
 - ii. Maintenance conducted on the engine. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4245(a)(2)]
 - iii. If the stationary SI internal combustion engine is a certified engine, documentation from the manufacturer that the engine is certified to meet the emission standards

and information as required in 40 CFR parts 1048, 1054, and 1060, as applicable.
[LRAPA 46-535(3)(dddd) and 40 CFR 60.4245(a)(3)]

- b. For all stationary SI emergency ICE greater than or equal to 500 HP manufactured on or after July 1, 2010, that do not meet the standards applicable to non-emergency engines, the permittee must keep records of the hours of operation of the engine that is recorded through the non-resettable hour meter. For all stationary SI emergency ICE greater than or equal to 130 HP and less than 500 HP manufactured on or after July 1, 2011 that do not meet the standards applicable to non-emergency engines, the permittee must keep records of the hours of operation of the engine that is recorded through the non-resettable hour meter. For all stationary SI emergency ICE greater than 25 HP and less than 130 HP manufactured on or after July 1, 2008, that do not meet the standards applicable to non-emergency engines, the permittee must keep records of the hours of operation of the engine that is recorded through the non-resettable hour meter. The permittee must document how many hours are spent for emergency operation, including what classified the operation as emergency and how many hours are spent for non-emergency operation. [LRAPA 46-535(3)(dddd) and 40 CFR 60.4245(b)]

6.0 PLANT SITE EMISSION LIMITS

6.1. Plant Site Emission Limits (PSEL)

The emission units covered by this General ACDP attachment are considered categorically insignificant activities under Title 12. Under subsection 42-0035(5), PSELs do not include emissions from categorically insignificant activities.

7.0 RECORDKEEPING REQUIREMENTS

7.1. Excess Emissions

Unless otherwise specified, the permittee must maintain records of excess emissions as defined in LRAPA title 36 (recorded on occurrence). Typically, excess emissions are caused by process upsets, startups, shutdowns, or scheduled maintenance. In many cases, excess emissions are evident when visible emissions are greater than 20% opacity for three (3) minutes or more in any 60 minute period.

7.2. Retention of Records

Unless otherwise specified, the permittee must retain all records for a period of at least five (5) years from the date of each report or record and make them available to LRAPA upon request. The permittee must maintain at least the two (2) most recent years of records onsite or otherwise readily available electronically for expeditious review during an on-site inspection. [LRAPA 34-016(5)]

7.3. Complaint Log

The permittee must maintain a log of all complaints received that specifically refer to air pollution, odor, or nuisance concerns associated with the permitted facility. The permittee must investigate the condition within 24 hours, if possible. The log must include at least the following for each complaint or concern received: [LRAPA 34-016(1)]

- a. The date the complaint was received;
- b. The date and time the complaint states the condition was present;
- c. A description of the complaint;
- d. The location of the complainant or receptor relative to the plant site;
- e. The status of plant operations and activities during the complaint's stated time of pollution or odor condition;
- f. A description of the permittee's actions to investigate the validity of the complaint; and
- g. A description of any actions taken in response to the complaint investigation.

8.0 REPORTING REQUIREMENTS

8.1. Annual Report

For each year this permit is in effect, the permittee must submit to LRAPA by **February 15**, one (1) copy of the following information for the previous calendar year: [LRAPA 34-016(1)&(2)]

- a. The company's name and the street address (physical location) of the affected source and the street address where compliance records are maintained, if different; and
- b. Summary of complaints relating to air quality received by permittee during the year.

8.2. Notice of Change of Ownership or Company Name

The permittee must notify LRAPA in writing using a LRAPA "Permit Application Form" within 60 days after any of the following: [LRAPA 37-0030(4)]

- a. Legal change of the name of the company as registered with the Corporation Division of the State of Oregon; or
- b. Sale or exchange of the activity or facility.

8.3. Construction or Modification Notices

The permittee must notify LRAPA in writing using a LRAPA "Notice of Construction Form," or "Permit Application Form," and obtain approval in accordance with LRAPA title 34 before:

- a. Constructing, installing, or establishing a new stationary source that will cause an increase in any regulated pollutant emissions; [LRAPA 34-034(1)]
- b. Making any physical change or change in operation of an existing stationary source that will cause an increase, on an hourly basis at full production, in any regulated pollutant emissions; or [LRAPA 34-034(2)]
- c. Constructing or modifying any air pollution control equipment. [LRAPA 34-034(3)]

8.4. Where to Send Reports and Notices

Reports, with the permit number prominently displayed, must be sent to the LRAPA address as identified in Condition 9.2.

9.0 ADMINISTRATIVE REQUIREMENTS

9.1. Reassignment to the General ACDP Attachment

A permittee that wishes to continue assignment to this General ACDP Attachment must submit to LRAPA an application for reassignment as follows:

- a. The application must be received by LRAPA within 30 days prior to the expiration date

- listed on this General ACDP Attachment;
- b. The application must be sent to the LRAPA office identified in Condition 9.2.; and
 - c. The permittee may submit an application for either a Simple or Standard ACDP at any time, but the permittee must continue to comply with this General ACDP Attachment, the General ACDP, and any other General ACDP Attachments until LRAPA takes final action on the Simple or Standard ACDP application.

9.2. LRAPA Address

All reports, notices, applications, and fees must be directed to LRAPA as follows:

Lane Regional Air Protection Agency
1010 Main Street
Springfield, OR 97477
541-736-1056

9.3. LRAPA's Website

Information about air quality permits and the LRAPA's regulations may be obtained from the LRAPA web page at www.lrapa.org.

10.0 FEES

10.1. Annual Compliance Fee

The annual fees specified in LRAPA section 37-8020, Table 2 for a General ACDP Attachment are due on or by **December 1** of each year this General ACDP Attachment is in effect. An invoice indicating the amount, as determined by LRAPA regulations, will be mailed prior to the above date. Late fees in accordance with LRAPA section 37-8020, Table 2, Part 5 will be assessed as appropriate.

10.2. Change of Ownership or Company Name Fee

The Non-Technical Permit Modification specific activity fee specified in LRAPA section 37-0020, Table 2, Part 4.a. is due with an application for changing the ownership or the name of the company for a source assigned to a General ACDP and General ACDP Attachments. Forms that require fees must be sent together to the LRAPA address as identified in Condition 9.2.

10.3. Where to Submit Fees

Fees, with a permit number prominently displayed, must be sent to the LRAPA address as identified in Condition 9.2.

11.0 GENERAL CONDITIONS AND DISCLAIMERS

11.1. Other Regulations

In addition to the specific requirements listed in this permit, the permittee must comply with all other applicable legal requirements enforceable by LRAPA. [ORS 468A.060 and LRAPA 12-001(2)]

11.2. Conflicting Conditions

In any instance in which there is an apparent conflict relative to the conditions in this General ACDP Attachment, the most stringent conditions apply.

11.3. Masking of Emissions

The permittee must not cause or permit the installation of any device or use any means designed to mask the emissions of an air contaminant that causes or is likely to cause detriment to health, safety, or welfare of any person or otherwise violate any other regulation or requirement.
[LRAPA 32-050]

11.4. LRAPA Access

The permittee must allow LRAPA's representatives access to the plant site and pertinent records at all reasonable times for the purposes of performing inspections, surveys, collecting samples, obtaining data, reviewing and copying air contaminant emissions discharge records and conducting all necessary functions related to this permit in accordance with LRAPA section 13-020. [ORS 468.095(1) and LRAPA 13-020(1)(h)]

11.5. Permit Availability

The permittee must have a copy of the permit available at the facility at all times. [LRAPA 37-0020(3)]

11.6. Outdoor Burning

The permittee must not conduct any outdoor burning except as allowed by LRAPA title 47.
[LRAPA 47-015(4)&(5)]

11.7. Asbestos

The permittee must comply with the asbestos abatement requirements in LRAPA title 43 for all activities involving asbestos-containing materials, including, but not limited to, demolition, renovation, repair, construction, and maintenance.

11.8. Property Rights

The issuance of this General ACDP Attachment does not convey any property rights in either real or personal property, or any exclusive privileges, nor does it authorize any injury to private property or any invasion of personal rights, nor any infringement of federal, state, or local laws or regulations.

11.9. Termination, Revocation, Rescission, or Modification

LRAPA may modify or revoke this General ACDP Attachment pursuant to LRAPA sections 37-0082 and 37-0084.

12.0 ABBREVIATIONS, ACRONYMS, AND DEFINITIONS

12.1. Abbreviations and Acronyms

ACDP	Air Contaminant Discharge Permit	KW	kilowatt
AQGP	Air Quality General Permit	LRAPA	Lane Regional Air Protection Agency
AQMA	Air Quality Maintenance Area	LPG	liquefied petroleum gas
calendar year	The 12-month period beginning January 1st and ending December 31st	SDS	safety data sheet
CAO	Cleaner Air Oregon	NESHAP	National Emissions Standards for Hazardous Air Pollutants
CI	compression ignition	OAR	Oregon Administrative Rules
CFR	Code of Federal Regulations	ORS	Oregon Revised Statutes
DEQ	Oregon Department of Environmental Quality	PSEL	Plant Site Emission Limit
EPA	US Environmental Protection Agency	RICE	reciprocating internal combustion engine
HAP	Hazardous Air Pollutant as defined LRAPA title 44	SI	spark ignition
HP	horsepower	SIC	Standard Industrial Code
ICE	internal combustion engine	VOC	volatile organic compound
		year	A period consisting of any 12-consecutive calendar months

12.2. Definitions

Emergency stationary RICE means any stationary reciprocating internal combustion engine that meets all of the criteria in paragraphs (1) through (2) of this definition. All emergency stationary RICE must comply with the requirements specified in 40 CFR 60.4211(f), 40 CFR 60.4243(d), and 40 CFR 63.6640(f), as applicable, in order to be considered emergency stationary RICE. If the engine does not comply with the requirements specified in 40 CFR 60.4211(f), 40 CFR 60.4243(d), and 40 CFR 63.6640(f), as applicable, then it is not considered to be an emergency stationary RICE under 40 CFR 60 subpart IIII, 40 CFR 60 subpart JJJJ, and 40 CFR 63 subpart ZZZZ, as applicable:

- (1) The stationary RICE is operated to provide electrical power or mechanical work during an emergency situation. Examples include stationary RICE used to produce power for critical networks or equipment (including power supplied to portions of a facility) when electric power from the local utility (or the normal power source, if the facility runs on its own power production) is interrupted, or stationary RICE used to pump water in the case of fire or flood, etc.

- (2) The stationary RICE is operated under limited circumstances for situations not included in paragraph (1) of this definition, as specified in 40 CFR 60.4211(f), 40 CFR 60.4243(d), and 40 CFR 63.6640(f).

JJW:RR 12/14/2023

GENERAL AIR CONTAMINANT DISCHARGE PERMIT ATTACHMENT ASSESSMENT REPORT

EMERGENCY STATIONARY RICE

Whitsell Manufacturing, Inc.
32910 and 32941 East Saginaw Road
Cottage Grove, OR 97424

Source Information:

Primary SIC	2421 – Sawmills and Planing Mills, General
NAICS	321113 – Sawmills
Source Categories	B.62 – Sawmills and/or planing mills 25,000 or more board

(LRAPA title 37, Table 1)	feet/maximum 8 hour finished product.
Public Notice Category	I

Compliance and Emissions Monitoring Requirements:

Unassigned Emissions	N
Emission Credits	N
Compliance Schedule	N
Source Test [date(s)]	N

COMS	N
CEMS	N
Ambient monitoring	N

Reporting Requirements

Annual Report (due date)	2/15
Semi-Annual Report (due date)	N
GHG Report (due date)	N
Monthly Report (due date)	N

Quarterly Report (due date)	N
Excess Emissions Report	Y
Other Reports (due date)	N

Air Programs

NSPS (list subparts)	IIII
NESHAP (list subparts)	ZZZZ
CAM	N
Regional Haze (RH)	N
Synthetic Minor (SM)	Y
SM-80	N
Title V	N
Part 68 Risk Management	N
Major FHAP Source	N

Federal Major Source	N
NA New Source Review (NSR)	N
Prevention of Significant Deterioration (PSD)	N
Acid Rain	N
Clean Air Mercury Rule (CAMR)	N
TACT	N
>20 Megawatts	N

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LIST OF ABBREVIATIONS USED IN THIS ASSESSMENT REPORT

ACDP	Air Contaminant Discharge Permit	PCD	pollution control device
AQMA	Air Quality Management Area	PEMS	predictive emissions monitoring system
ASTM	American Society of Testing and Materials	PM	particulate matter
BDT	bone dry ton	PM ₁₀	particulate matter less than or equal to 10 microns in size
CAO	Cleaner Air Oregon	PM _{2.5}	particulate matter less than or equal to 2.5 microns in size
CEMS	continuous emissions monitoring system	PSD	Prevention of Significant Deterioration
C.F.R.	Code of Federal Regulations	PSEL	Plant Site Emission Limit
CH ₄	methane (greenhouse gas)	RICE	Reciprocating internal combustion engine
CMS	continuous monitoring system	SO ₂	sulfur dioxide
CO	carbon monoxide	ST	source test
CO _{2e}	carbon dioxide equivalent	TACT	Typically Achievable Control Technology
COMS	continuous opacity monitoring system	VE	visible emissions
DEQ	Oregon Department of Environmental Quality	VMT	vehicle mile traveled
DPF	diesel particulate filter	VOC	volatile organic compound
dscf	dry standard cubic feet		
EF	emission factor		
EPA	United State Environmental Protection Agency		
EU	emissions unit		
FCAA	Federal Clean Air Act		
FCE	Full Compliance Evaluation		
GHG	greenhouse gas		
gr/dscf	grains per dry standard cubic feet		
HAP	hazardous air pollutant		
ID	identification code		
I&M	inspection and maintenance		
LRAPA	Lane Regional Air Protection Agency		
MB	material balance		
Mlb	1000 pounds		
MM	million		
N ₂ O	nitrous oxide (greenhouse gas)		
NA	not applicable		
NESHAP	National Emission Standard for Hazardous Air Pollutants		
NO _x	oxides of nitrogen		
NSPS	New Source Performance Standard		
NSR	New Source Review		
O ₂	oxygen		
OAR	Oregon Administrative Rules		
ORS	Oregon Revised Statutes		
O&M	operation and maintenance		
Pb	lead		

SOURCE DESCRIPTION AND QUALIFICATION

1. This General ACDP Attachment is designed to regulate air contaminant emissions from emergency stationary reciprocating internal combustion engines (RICE), subject to 40 CFR part 63 subpart ZZZZ – National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines either alone or in combination with 40 CFR 60 subpart IIII – Standards of Performance for Stationary Compression Ignition Internal Combustion Engines and/or 40 CFR 60 subpart JJJJ – Standards of Performance for Stationary Spark Ignition Internal Combustion Engines, as adopted under LRAPA titles 44 and 46.
2. This General ACDP Attachment only applies to a source that meets the following requirements:
 - a. The facility is already covered by a General ACDP;
 - b. The source is considered an area source of federal hazardous air pollutants;
 - c. The aggregate horsepower rating of all stationary emergency generator and pump engines at the source is not more than 3,000 horsepower (hp);
 - d. No emergency generator at the source is equipped with emission controls, including but not limited to diesel particulate filters, 3-way catalysts, or selective noncatalytic reduction, to meet any applicable emission limitations; and
 - e. The permittee does not use any emergency generators or firewater pumps for peak shaving or non-emergency demand response, or to generate income for a facility to an electric grid or otherwise supply power as part of a financial arrangement with another entity.
 - f. If an emergency stationary reciprocating internal combustion engines is subject to a New Source Performance Standard, the engine must be certified by the manufacturer to meet the applicable emission limitations under the standard for the fuels the engine will use, except as allowed by rule.
 - g. If the emergency stationary reciprocating internal combustion engines is subject to 40 CFR part 60 subpart IIII – Standards of Performance for Stationary Compression Ignition Internal Combustion Engines, the engine displacement must be less than 30 liters per cylinder.
 - h. If the emergency stationary reciprocating internal combustion engines is subject to 40 CFR part 60 subpart JJJJ – Standards of Performance for Stationary Spark Ignition Internal Combustion Engines, the engine power must be greater than 25 HP.
3. The facilities assigned to this General ACDP Attachment may not emit any other air pollution that requires regulation beyond that specified in this permit, except for other pollution emissions that also qualify for assignment, and are assigned, to other General ACDPs, other General ACDP Attachments and categorically insignificant activities as defined under LRAPA title 12. A facility that has experienced reoccurring or serious compliance problems may not be eligible for assignment to this General ACDP Attachment, as determined by LRAPA.
4. If all activities at a source cannot be addressed by a General ACDP and General ACDP Attachments, the permittee of the source must apply for a Simple or Standard ACDP.
5. A source may not be assigned to a General ACDP Attachment for a source category in a higher annual fee class than the General ACDP to which the source is currently assigned. Instead a source must be reassigned to the General ACDP for the source category in the higher annual fee class in accordance with LRAPA 37-0060(2)(c)(E) and maybe assigned to one or more General ACDP Attachments associated with source categories in an equal or lower annual fee class.

FACILITY IDENTIFICATION

6. The permittee is Whitsell Manufacturing, Inc., 32910 East Saginaw Road, Cottage Grove, OR 97424. The site contact person and responsible official is Bonnie Parmenter, CFO who can be reached at (541) 726-6637 or bonniewhitsellmfg@gmail.com.

7. Whitsell Manufacturing, Inc., ("Whitsell", "the facility", "the permittee", "the source") operates a 1,600 kW Baldor diesel generator with a maximum engine output rating of 2,346 HP. This emission unit was manufactured sometime in calendar year 2006, but after April 1, 2006, and was installed in 2022. This engine is used for emergency operation, maintenance and testing.

COMPLIANCE HISTORY

8. The facility will be inspected by LRAPA personnel on a recurring basis to ensure compliance with the permit conditions.

ASSESSMENT OF EMISSIONS

9. Emergency stationary RICE at facilities assigned to this General ACDP Attachment are sources of combustion-related pollutants. The primary combustion-related pollutants are carbon monoxide (CO) and nitrogen oxides (NOx) emissions. Emergency stationary RICE will also be sources of particulate matter (PM), PM₁₀ (particulate matter no greater than 10 microns), PM_{2.5} (particulate matter no greater than 2.5 microns), volatile organic compounds (VOC), sulfur dioxides (SO₂) and hazardous air pollutant (HAP) emissions.
10. The General ACDP Attachment authorizes the permittee to have stationary emergency generators and pump engines whose aggregate horsepower rating is not more than 3,000 horsepower. Up to this aggregated horsepower rating, these emission units are considered categorically insignificant activities. The emissions from categorically insignificant activities do not count towards demonstrating compliance with a Plant Site Emission Limit under LRAPA 42-0035(5).
11. LRAPA has assessed the level of emissions from these emission units based on the 100 hours of operation allowed per calendar year as allowed under the General ACDP Attachment and determined that facilities complying with the limitations of this General ACDP Attachment will remain area sources of federal hazardous air pollutants.

STATE AND LOCAL STANDARDS APPLICABILITY

12. Emergency stationary RICE at facilities assigned to this General ACDP Attachment are subject to the visible emissions standards under LRAPA 32-010, the particulate emission limitations under LRAPA 32-015, and the nuisance requirements (control of fugitive dust and odors) in LRAPA title 32 and 48. The General ACDP Attachment contains requirements and limitations to ensure compliance with these standards.
13. Depending on the potential engine emissions, some emergency stationary RICE may be subject to Typically Achievable Control Technologies (TACT). All emergency stationary RICE subject to this General ACDP Attachment are subject to 40 CFR part 63 subpart ZZZZ – National Emission Standards for Hazardous Air Pollutants (NESHAP) for Stationary Reciprocating Internal Combustion Engines, either alone or in combination with 40 CFR 60 subpart IIII – Standards of Performance (NSPS) for Stationary Compression Ignition Internal Combustion Engines and/or 40 CFR 60 subpart JJJJ – Standards of Performance (NSPS) for Stationary Spark Ignition Internal Combustion Engines, as adopted under LRAPA titles 44 and 46. If the emergency stationary RICE is subject to an NSPS, the unit is not subject to TACT under LRAPA 32-008(1)(a) or (2)(a). For emergency stationary RICE subject only to the NESHAP, the NESHAP is considered Typically Achievable Control Technology (TACT) under LRAPA 32-008 – Highest and Best Practicable Treatment and Control.

FEDERAL STANDARDS APPLICABILITY

14. The General ACDP Attachment incorporates the regulations in 40 CFR part 63 subpart ZZZZ – National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal

Combustion Engines. EPA promulgated this NESHAP on June 15, 2004. This NESHAP is adopted by reference in LRAPA title 44. The emergency stationary RICE at this facility was constructed after April 1, 2006. As such, the emergency stationary RICE must demonstrate compliance with

15. The General ACDP Attachment incorporates the regulations in 40 CFR 60 subpart IIII – Standards of Performance for Stationary Compression Ignition Internal Combustion Engines. EPA proposed this NSPS on July 11, 2005. This NSPS is adopted by reference in LRAPA title 46.

GREENHOUSE GAS REPORTING APPLICABILITY

16. If a regulated facility has actual emissions of greenhouse gases that exceed 2,500 metric tons (2,756 short tons) of CO₂ equivalents per year, the permittee is required to report GHG emissions under OAR Chapter 340 division 215. The emergency stationary RICE covered by this General ACDP Attachment are considered categorically insignificant activities. GHG reports may exclude emissions from categorically insignificant activities. If categorically insignificant activities cannot be separated from other activities, entities may report aggregate emissions that include categorically insignificant activities.

CLEANER AIR OREGON

17. Emergency stationary RICE are considered toxic emission units subject to Cleaner Air Oregon. Toxic emission units that solely combust natural gas, propane, and liquefied petroleum gas are subject to the gas combustion exemption under OAR 340-245-0050(5). Under this exemption, these toxic emission units must calculate risk from toxic air contaminants emitted, but the risk is excluded from the total risk for the purpose of determining compliance with the Risk Action Levels under Cleaner Air Oregon. Toxic emission units that solely combust diesel or gasoline are not allowed an exemption under Cleaner Air Oregon. Gasoline-fired emergency generators are typically small units whose toxic air contaminant emissions are minimal and would not be expected to materially contribute to facility risk. Diesel-fired emergency generators may be expected to contribute to facility acute risk due to the toxicity of diesel particulate matter and polycyclic aromatic hydrocarbons. LRAPA has included a requirement that diesel-fired emergency generators not be operated for readiness and maintenance testing for more than two (2) hours in any 24 hour period or day to reduce the contribution to acute risk. All emergency generators are limited to a maximum of 100 hours per calendar year for maintenance checks and readiness testing which reduces the contribution to chronic risk. There is no limit on hours of operation during an emergency situation.

TOXICS RELEASE INVENTORY

18. The Toxics Release Inventory (TRI) is federal program that tracks the management of certain toxic chemicals that may pose a threat to human health and the environment, over which LRAPA has no regulatory authority. It is a resource for learning about toxic chemical releases and pollution prevention activities reported by certain industrial facilities. Section 313 of the Emergency Planning and Community Right-to-Know Act (EPCRA) created the TRI Program. In general, chemicals covered by the TRI Program are those that cause:
 - Cancer or other chronic human health effects;
 - Significant adverse acute human health effects; or
 - Significant adverse environmental effects.

There are currently over 650 chemicals covered by the TRI Program. Facilities that manufacture, process or otherwise use these chemicals in amounts above established levels must submit annual TRI reports on each chemical.

Emergency stationary RICE covered by this General ACDP Attachment are not covered by the TRI program because emergency stationary RICE are not a specific industry sector that is

required to report under the TRI program. Emergency stationary RICE are a specific emission unit present at multiple types of industry sectors.

COMPLIANCE ASSURANCE

19. Permittees are required to maintain the following records related to emergency generators, as applicable:
 - a. Documentation of all maintenance and inspections performed on each engine.
 - b. Hours of operation including how many hours are spent for emergency operation, what classified the operation as emergency, and how many hours are spent for non-emergency operation.
 - c. The total hours of operation during any single day that readiness and maintenance testing is performed on each diesel-fired emergency generator or fire pump.
20. LRAPA reviews submittals and performs site inspections of permitted facilities in Lane County on a routine basis. Site inspections may be performed more frequently if LRAPA receives complaints about a particular facility.

REVOCATION OF ASSIGNMENT

21. Any facility that fails to demonstrate compliance, generates complaints, or fails to conform to the requirements and limitations contained in the General ADP Attachment may have its assignment to the General ACDP Attachment revoked. If assignment to the General ACDP Attachment is revoked, the facility may also have their assignment to their General ACDP and any other General ACDP Attachments revoked. The facility would then be required to apply for a Simple or Standard ACDP, as applicable.

PUBLIC NOTICE

22. General ACDP Attachments are allowed under LRAPA Rules and Regulations and are part of the State Implementation Plan. Pursuant to LRAPA 37-0062(2)(c), issuance of a General ACDP Attachment requires public notice in accordance with LRAPA 31-0030(3)(b). LRAPA 31-0030(3)(b) requires LRAPA to provide notice of the proposed permit action and a minimum of 30 days for interested persons to submit written comments. The public was provided the period of November 13 to December 12, 2023 to submit written comments on the draft General ACDP Attachment and the opportunity to request a public hearing.
23. LRAPA did not receive written requests for a hearing from ten persons or from an organization representing at least ten persons within the public comment period. Therefore, no hearing was scheduled. During the public comment period, LRAPA received no written comments.
24. The final General ACDP Permit Attachment was issued after approval by the LRAPA Director on January 9, 2024.
25. Calculation of the PSEL and toxic air contaminant emissions are attached.

JJW/RR: 01/22/2024

EMISSION DETAILS

Emission Detail Sheet
 General ACDP Attachment
 Whitsell Emergency Generator

Inputs

2,346 Maximum Horsepower
 100 Maximum Hours per Year
 7,000 Btu/hp-hr (diesel)

Pollutant	Diesel	
	Emission Factor lb/hp-hr	Emissions Tons per Year
PM	0.0007	0.08
PM10	0.0007	0.08
PM2.5	0.0007	0.08
CO	5.50E-03	0.65
NOx	0.024	2.82
SO2	1.21E-05	1.42E-03
VOC	7.05E-04	0.08
	lb/MMBtu	
GHG (CO2 eq.)	164	134

GHG-Related Emission Factors

Pollutant	Diesel (kg/MMBtu)	GWP
Carbon Dioxide (CO ₂)	73.96	1
Methane (CH ₄)	3.0E-03	25
Nitrous Oxide (N ₂ O)	6.0E-04	298

Notes:

An average brake specific fuel consumption of 7,000 Btu/hp-hr for diesel and gasoline was used for conversions. Based on footnote a of Table 3.3-1 in US EPA AP-42, Section 3.3 - Gasoline and Diesel Industrial Engines. For diesel, the emission factors are from US EPA AP-42, Section 3.4 - Large Stationary Diesel and All Stationary Dual-fuel Engines.

The sulfur content of diesel is assumed to be 15 ppmv or 0.0015 percent.

GHG emission factors are from 40 CFR 98, Tables C-1 and C-2.

Emission Detail Sheet
General ACDP Attachment
Whitell Emergency Generator

Inputs

2,346 Maximum Horsepower
100 Maximum Hours per Year
7,000 Btu/hp-hr (diesel)
0.138 MMBtu/gal (diesel)

Pollutant	CAS / DEQ Number	Diesel	
		Emission Factor lb/M gal	Emissions Tons per Year
1,1,2,2-Tetrachloroethane	79-34-5		
1,1,2-Trichloroethane (Vinyl trichloride)	79-00-5		
1,2-Dichloropropane (Propylene dichloride)	78-87-5		
1,2,4-Trimethylbenzene	95-63-6		
1,3-Butadiene	106-99-0	0.2174	1.29E-03
1,3-Dichloropropene	542-75-6		
2-Butanone (Methyl ethyl ketone)	78-93-3		
Acetaldehyde	75-07-0	0.7833	4.66E-03
Acrolein	107-02-8	0.0339	2.02E-04
Ammonia	7664-41-7	0.8	4.76E-03
Antimony	7440-36-0	3.18E-04	1.89E-06
Arsenic	7440-38-2	1.60E-03	9.52E-06
Barium	7440-39-3	3.74E-04	2.23E-06
Benzene	71-43-2	0.1863	1.11E-03
Benzo[a]pyrene	50-32-8	3.52E-05	2.09E-07
Beryllium	7440-41-7	4.77E-06	2.84E-08
Cadmium	7440-43-9	1.50E-03	8.93E-06
Carbon Tetrachloride	56-23-5		
Chlorine	7782-50-5		
Chloroform	67-66-3		
Chromium (VI)	18540-29-9	1.00E-04	5.95E-07
Cobalt	7440-48-4	1.58E-05	9.40E-08
Copper and compounds	7440-50-8	4.10E-03	2.44E-05
Dichloromethane (Methylene chloride)	75-09-2		
Diesel particulate matter (total)	200	33.5	0.20
Ethyl benzene	100-41-4	0.0109	6.49E-05
Ethylene dibromide (EDB, 1,2-Dibromoethane)	106-93-4		
Ethylene dichloride (EDC, 1,2-Dichloroethane)	107-06-2		
Formaldehyde	50-00-0	1.73	1.03E-02
Hexane	110-54-3	0.0269	1.60E-04
Hydrochloric acid	7647-01-0	0.19	1.13E-03
Lead	7439-92-1	8.30E-03	4.94E-05
Manganese and compounds	7439-96-5	3.10E-03	1.84E-05
Mercury	7439-97-6	2.00E-03	1.19E-05
Methanol	67-56-1		
Naphthalene	91-20-3	1.97E-02	1.17E-04
Nickel compounds, insoluble	365	3.90E-03	2.32E-05
PAHs (excluding Naphthalene)	401	3.62E-02	2.15E-04
Phosphorus	504	8.40E-03	5.00E-05
Selenium	7782-49-2	2.20E-03	1.31E-05
Silver	7440-22-4	4.80E-05	2.86E-07
Styrene	100-42-5		
Thallium	7440-28-0	2.40E-04	1.43E-06
Toluene	108-88-3	0.11	6.55E-04
Vinyl Chloride	75-01-4		
Xylene (mixture)	1330-20-7	0.04	2.38E-04
Zinc	7440-66-6	5.23E-03	3.11E-05

Notes:

An average brake specific fuel consumption of 7,000 Btu/hp-hr for diesel and gasoline was used for conversions. Based on footnote a of Table 3.3-1 in US EPA AP-42, Section 3.3 - Gasoline and Diesel Industrial Engines. For diesel, the emission factors are from Oregon DEQ AQ104B Toxics Reporting & Air Toxics Emissions Inventory - Combustion Emission Factor Search Tool for pre-2006 Tier 0 and Tier 1 diesel internal combustion engines. All fuel Btu values are from Oregon DEQ's Fuel Combustion Greenhouse Gas Calculator Fuel Lookup tab - June 2021.