DEPARTMENT OF ENVIRONMENTAL CONSERVATION
AIR QUALITY OPERATING PERMIT

Permit No. AQ0286TVP05 Issue Date: Public Comment - July 14, 2020

Expiration Date: Five Years

The Alaska Department of Environmental Conservation, under the authority of AS 46.14 and 18 AAC 50, issues an operating permit to the Permittee, **Copper Valley Electric Association, Inc.**, for the operation of the **Valdez Diesel Plant**.

This permit satisfies the obligation of the owner and operator to obtain an operating permit as set out in AS 46.14.130(b).

As set out in AS 46.14.120(c), the Permittee shall comply with the terms and conditions of this operating permit.

Citations listed herein are contained within the effective version of 18 AAC 50 at permit issuance. All federal regulation citations are from those sections adopted by reference in this version of regulation in 18 AAC 50.040 unless otherwise specified.

Upon effective date of this permit, Operating Permit AQ0286TVP04 expires:

This Operating Permit becomes effective <insert date—30 days after issue date>.

James R. Plosay, Manager
Air Permits Program

Table of Contents

Abbreviations and Acronyms

AAC.....Alaska Administrative Code
ADEC .....Alaska Department of Environmental Conservation
Administrator.....EPA and the Department
AS .....Alaska Statutes
ASTM .....American Society for Testing and Materials
BACT .....best available control technology
CFR .....Code of Federal Regulations
CI .....compression ignition
CAA or The Act .Clean Air Act
CO .....carbon monoxide
CO_2e .....CO_2-equivalent
Department .....Alaska Department of Environmental Conservation
dscf .....dry standard cubic foot
EPA .....Environmental Protection Agency
EU.....emissions unit
gr./dscf.....grain per dry standard cubic foot (1 pound = 7000 grains)
HAP .....Hazardous Air Pollutants [as defined in AS 46.14.990]
ID.....emissions unit identifier
kPa .....kiloPascals
LAER.....lowest achievable emission rate
MACT .....maximum achievable control technology [as defined in 40 CFR 63]
MMBtu/hr.....million British thermal units per hour
MMSCF.....million standard cubic feet
MR&R .....monitoring, recordkeeping, and reporting
NESHAP .....National Emission Standards for Hazardous Air Pollutants [as contained in 40 CFR 61 and 63]
NH_3.....ammonia
NOx.....nitrogen oxides
NSPS .....New Source Performance Standards [NSPS as contained in 40 CFR 60]
O & M .....operation and maintenance
O_2 .....oxygen
Pb .....lead
$PM_{2.5}$.....particulate matter less than or equal to a nominal 2.5 microns in diameter
PM_{10} .....particulate matter less than or equal to a nominal ten microns in diameter
ppm .....parts per million
ppmv, ppmvd .....parts per million by volume on a dry basis
psia .....pounds per square inch (absolute)
PSD .....Prevention of Significant Deterioration
PTE .....potential to emit
RICE .....reciprocating internal combustion engine
SIC. .....Standard Industrial Classification
SIP.....State Implementation Plan
SO_2 .....sulfur dioxide
SPC .....standard permit condition
tph .....tons per hour
tpy .....tons per year
VOC .....volatile organic compound [as defined in 40 CFR 51.100(s)]
VOL .....volatile organic liquid [as defined in 40 CFR 60.111b, Subpart Kb]
vol% .....volume percent
wt% .....weight percent

Section 1. Stationary Source Information

Identification

Permittee:		**Copper Valley Electric Association, Inc.** P.O. Box 45 Glennallen, Alaska, 99588
Stationary Source Name:		**Valdez Diesel Plant**
Location:		61º 08´ 07" North; 146º 21´ 12" West
Physical Address:		West Egan Drive Valdez, Alaska, 99686
Owner:		**Copper Valley Electric Association, Inc.** P.O. Box 45 Glennallen, AK, 99588
Operator:		Same as Owner above
Permittee's Responsible Official:		Wayne McKinzey, Director of PowerSupply P.O. Box 927 Valdez, AK 99686
Designated Agent:		Wayne McKinzey, Director of PowerSupply P.O. Box 927 Valdez, AK 99686
Stationary Source and Building Contact:		Wayne McKinzey, Director of PowerSupply P.O. Box 927 Valdez, AK 99686 907-835-7015 mckinzey@cvea.org
Fee and Permit Contact:		Same as Stationary Source contact above
Process Description	SIC Code:	4911- Electrical Services
	NAICS Code:	221112 - Electric power generation, fossil fuel

[18 AAC 50.040(j)(3) & 50.326(a)]
[40 CFR 71.5(c)(1 & 2)]

Section 2. Emissions Unit Inventory and Description

Emissions units listed in Table A have specific monitoring, recordkeeping, or reporting conditions in this permit. Emissions unit descriptions and ratings are given for identification purposes only.

Table A - Emissions Unit Inventory

EU ID	Emissions Unit Name	Emissions Unit Description	Fuel Type	Rating/ Size	Construction Date
4	Engine/Generator Set No. 4	DeLaval Enterprise Model DSR 46	Diesel	1926 kW	1971
5	Engine/Generator Set No. 5	DeLaval Enterprise Model DSR 46	Diesel	2620kW	1974
6	Engine/Generator Set No. 6	DeLaval Enterprise Model DSQ 36	Diesel	965 kW	1974
11	Engine/Generator Set No. 11	Caterpillar 3516 DITA Engine	Diesel	1640 kWe	2002
12	Engine/Generator Set No. 12	Caterpillar 3516 DITA Engine	Diesel	1640 kWe	2002

EU IDs 1 and 3 were decommissioned in place and have been inoperable since 2003.

EU ID 2 has been inoperable since 12/10/15.

EU ID 7 was removed 1/15/18.

EU IDs 11 and 12 are used model year 2001 CI RICE.

[18 AAC 50.326(a)]
[40 CFR 71.5(c)(3)]

Section 3. State Requirements

Visible Emissions Standard

1. Industrial Process and Fuel-Burning Equipment Visible Emissions. The Permittee shall not cause or allow visible emissions, excluding condensed water vapor, emitted from EU IDs 4 through 6, 11, and 12 listed in Table A to reduce visibility through the exhaust effluent by more than 20 percent averaged over any six consecutive minutes.

[18 AAC 50.040(j)(4), 50.055(a)(1), 50.326(j)(3), & 50.346(c)]
[40 CFR 71.6(a)(1)]

1.1. For EU IDs 11 and 12 monitor, record and report in accordance with Conditions 2 through 4.

1.2. For each of EU IDs 4 through 6, as long as the unit operates for no greater than 400 hours per consecutive 12-month period, monitoring shall consist of an annual compliance certification under Condition 49 with the visible emission standard.

a. For EU IDs 4 through 6, monitor and record the operating hours for each unit. Report the monthly and 12-month rolling total operating hours for each of EU IDs 4 through 6 using the operating report of Condition 48.

b. For any of EU IDs 4 through 6, that exceeds the threshold of Condition 1.2, notify the Department and begin monitoring for the unit(s) in accordance with Conditions 2 through 4 no later than 15 days after the calendar month in which the cumulative hours of operation for the calendar year exceeds the threshold.

[18 AAC 50.040(j)(4), 50.326(j)(3) & (4), & 50.346(c)]
[40 CFR 71.6(a)(3) & (c)(6)]

Visible Emissions Monitoring, Recordkeeping and Reporting (MR&R)

Liquid Fuel-burning Emissions Units

2. Visible Emissions Monitoring. When required by either Condition 1.1 or 1.2, or in the event of a replacement[1] during the permit term, the Permittee shall observe the exhaust of EU IDs 11 and 12, and any of EU IDs 4 through 6 that exceeds the threshold of Condition 1.2, for visible emissions using the Method 9 Plan under Condition 2.1. The Permittee may for each unit elect to continue the visible emission monitoring schedule in effect from the previous permit at the time a renewed permit is issued, if applicable.

[18 AAC 50.040(j)(4), 50.326(j)(3), & 50.346(c)]
[40 CFR 71.6(a)(3)(i)]

2.1. **Method 9 Plan.** For all observations in this plan, observe exhaust, following 40 CFR 60, Appendix A-4, Method 9 for 18 minutes to obtain 72 consecutive 15-second opacity observations.

[1] *"Replacement,"* as defined in 40 CFR 51.166(b)(32).

a. First Method 9 Observation.

(i) For any units replaced during the term of this permit, observe exhaust for 18 minutes within 30 days of startup.

(ii) For each existing emissions unit that exceeds the operational threshold in Condition 1.2, observe the exhaust for 18 minutes within 30 days after the calendar month during which the threshold was exceeded.

b. Monthly Method 9 Observations. After the first Method 9 observation, conducted under Condition 2.1.a, perform 18-minute observations at least once in each calendar month that the emissions unit operates.

c. Semiannual Method 9 Observations. After at least three monthly observations under Condition 2.1.b, unless a six-minute average opacity is greater than 15 percent and one or more observations are greater than 20 percent, perform observations:

(i) within six months after the preceding observation, or

(ii) for an emissions unit with intermittent operations, during the next scheduled operation immediately following six months after the preceding observation.

d. Annual Method 9 Observations. After at least two semiannual observations under Condition 2.1.c, unless a six-minute average opacity is greater than 15 percent and one or more individual observations are greater than 20 percent, perform observations:

(i) within twelve months after the preceding observation, or

(ii) for an emissions unit with intermittent operations, during the next scheduled operation immediately following twelve months after the preceding observation.

e. Increased Method 9 Frequency. If a six-minute average opacity is observed during the most recent set of observations to be greater than 15 percent and one or more observations are greater than 20 percent, then increase or maintain the observation frequency for that emissions unit to at least monthly intervals as described in Condition 2.1.b, and continue monitoring in accordance with the Method 9 Plan.

3. Visible Emissions Recordkeeping. When required by either Condition 1.1 or 1.2, or in the event of replacement of any EU IDs 4 through 6, 11 and 12 during the permit term, the Permittee shall keep records as follows:

[18 AAC 50.040(j), 50.326(j), & 50.346(c)]
[40 CFR 71.6(a)(3)(ii)]

3.1. When using the Method 9 Plan of Condition 2.1, the observer shall record:

a. the name of the stationary source, emissions unit and location, emissions unit type, observer's name and affiliation, and the date on the Visible Emissions Observation Form in Section 11;

b. the time, estimated distance to the emissions location, sun location, approximate wind direction, estimated wind speed, description of the sky condition (presence and color of clouds), plume background, and operating rate (load or fuel consumption rate or best estimate if unknown) on the sheet at the time opacity observations are initiated and completed;

c. the presence or absence of an attached or detached plume and the approximate distance from the emissions outlet to the point in the plume at which the observations are made;

d. opacity observations to the nearest five percent at 15-second intervals on the Visible Emissions Observation Form in Section 11, and

e. the minimum number of observations required by the permit; each momentary observation recorded shall be deemed to represent the average opacity of emissions for a 15-second period.

3.2. To determine the six-minute average opacity, divide the observations recorded on the record sheet into sets of 24 consecutive observations; sets need not be consecutive in time and in no case shall two sets overlap; for each set of 24 observations, calculate the average by summing the opacity of the 24 observations and dividing this sum by 24; record the average opacity on the sheet.

3.3. Calculate and record the highest 6- and 18-consecutive-minute average opacities observed.

4. Visible Emissions Reporting. When required by either Condition 1.1 or 1.2, or in the event of replacement of any EU IDs 4 through 6, 11 and 12 during the permit term, the Permittee shall report visible emissions as follows:

[18 AAC 50.040(j)(4), 50.326(j)(3), & 50.346(c)]
[40 CFR 71.6(a)(3)(iii)]

4.1. In each operating report required under Condition 48, include for the period covered by the report:

a. for each emissions unit under the Method 9 Plan,

(i) copies of the observation results (i.e. opacity observations) for each emissions unit that used the Method 9 Plan, except for the observations the Permittee has already supplied to the Department; and

(ii) a summary to include:

(A) number of days observations were made;

(B) highest six- and 18-consecutive minute average opacities observed; and

(C) dates when one or more observed six-minute average opacities were greater than 20 percent;

b. a summary of any monitoring or recordkeeping required under Conditions 2 and 3 that was not done;

4.2. Report under Condition 47:

a. the results of Method 9 observations that exceed an average of 20 percent average opacity for any six-minute period; and

b. if any monitoring under Condition 2 was not performed when required, report within three days of the date the monitoring was required.

Particulate Matter Emissions Standard

5. Fuel-Burning Equipment Particulate Matter. The Permittee shall not cause or allow particulate matter emitted from EU IDs 4 through 6, 11, and 12 listed in Table A to exceed 0.05 grains per cubic foot of exhaust gas corrected to standard conditions and averaged over three hours.

[18 AAC 50.040(j)(4), 50.055(b)(1), 50.326(j)(3), & 50.346(c)]
[40 CFR 71.6(a)(1)]

5.1. For EU IDs 11 and 12, monitor, record and report in accordance with Conditions 6 and 8.

5.2. For EU IDs 4 through 6, as long as the threshold in Condition 1.2 is not exceeded, monitoring shall consist of an annual compliance certification under Condition 49 with the particulate matter standard. For any unit(s) that exceed the threshold in Condition 1.2, monitor, record, and report in accordance with Conditions 6 and 8 for the duration of the permit term.

a. For EU IDs 4 through 6, monitor and report the operating hours for each unit in accordance with Condition 1.2.a.

b. For any of EU IDs 4 through 6 that exceeds the threshold of Condition 1.2, notify the Department and begin monitoring for the unit(s) in accordance with Conditions 6 and 8 no later than 15 days after the calendar month in which the cumulative hours of operation for the calendar year exceeds the threshold.

[18 AAC 50.040(j), 50.326(j), & 50.346(c)]
[40 CFR 71.6(a)(3)]

Particulate Matter MR&R

Liquid Fuel-burning Engines

6. Particulate Matter Monitoring. The Permittee shall conduct source tests on EU IDs 11 and 12, and any of EU IDs 4 through 6 that exceeds the threshold of Condition 1.2, to determine the concentration of particulate matter (PM) in the exhaust of each emissions unit as follows:

[18 AAC 50.040(j)(4), 50.326(j)(3), & 50.346(c)]
[40 CFR 71.6(a)(3)(i)]

6.1. Except as provided in Condition 6.4 within six months of exceeding the criteria of Conditions 6.2.a or 6.2.b, either

a. conduct a particulate matter source test according to requirements set out in Section 6; or

b. make repairs so that emissions no longer exceed the criteria of Condition 6.2; to show that emissions are below those criteria, observe emissions as described in Condition 2.1 under load conditions comparable to those when the criteria were exceeded.

6.2. Conduct the particulate matter test or make repairs according to Condition 6.1 if

a. Method 9 observations, as calculated under Condition 3.3, result in an 18-minute average opacity greater than 20 percent; or

b. for an emissions unit with an exhaust stack diameter that is less than 18 inches, Method 9 observations, as calculated under Condition 3.3, result in an 18-minute average opacity that is greater than 15 percent, unless the Department has waived this requirement in writing.

6.3. During each one-hour PM source test run, observe the exhaust for 60 minutes in accordance with Method 9 and calculate the highest 18-minute average opacity that was measured during each one-hour test run. Submit a copy of these observations with the source test report.

6.4. The PM source test requirement in Conditions 6.1 and 6.2 is waived for an emissions unit if a PM source test on that unit has shown compliance with the PM standard during this permit term.

7. Particulate Matter Recordkeeping. The Permittee shall comply with the following:

[18 AAC 50.040(j)(4), 50.326(j)(3), & 50.346(c)]
[40 CFR 71.6(a)(3)(ii)]

7.1. Keep records of the results of any PM source tests and visible emissions observations conducted under Condition 6.

8. Particulate Matter Reporting. The Permittee shall report as follows:

[18 AAC 50.040(j)(4), 50.326(j)(3), & 50.346(c)]
[40 CFR 71.6(a)(3)(iii)]

8.1. Report in accordance with Condition 47:

a. the results of any PM source test that exceeds the PM emissions limit; or

b. if one of the criteria of Condition 6.2 was exceeded and the Permittee did not comply with either Condition 6.1.a or 6.1.b, this must be reported by the day following the day compliance with Condition 6.1 was required;

8.2. Report observations in excess of the threshold of Condition 6.2.b within 30 days of the end of the month in which the observations occur;

8.3. In each operating report under Condition 48, include for the period covered by the report:

a. the dates, EU ID(s), and results when an observed 18-minute average opacity was greater than an applicable threshold in Condition 6.2;

b. a summary of the results of any PM testing under Condition 6; and

c. copies of any visible emissions observation results (opacity observations) greater than the thresholds of Condition 6.2, if they were not already submitted.

Sulfur Compound Emissions Standard

9. Sulfur Compound Emissions. The Permittee shall not cause or allow sulfur compound emissions, expressed as SO_2, from EU IDs 4 through 6, 11, and 12 to exceed 500 ppm averaged over three hours.

[18 AAC 50.040(j)(4), 50.055(c), 50.326(j)(3), & 50.346(c)]
[40 CFR 71.6(a)(1)]

Sulfur Compound MR&R

10. Sulfur Compound Monitoring and Recordkeeping. The Permittee shall comply with the following:

10.1. The Permittee shall do one of the following for each shipment of fuel:

a. If the fuel grade requires a sulfur content less than 0.5 percent by weight, keep receipts that specify fuel grade and amount; or

b. If the fuel grade does not require a sulfur content less than 0.5 percent by weight, keep receipts that specify fuel grade and amount and

(i) test the fuel for sulfur content; or

(ii) obtain test results showing the sulfur content of the fuel from the supplier or refinery; the test results must include a statement signed by the supplier or refinery of what fuel they represent.

10.2. Fuel testing under Condition 10 must follow an appropriate method listed in 18 AAC 50.035(b)-(c) or 40 CFR 60.17 incorporated by reference in 18 AAC 50.040(a)(1).

10.3. If a load of fuel contains greater than 0.75 percent sulfur by weight, the Permittee shall calculate SO_2 emissions in ppm using either the SO_2 material balance calculation in Section 12 or Method 19 of 40 CFR 60, Appendix A-7, adopted by reference in 18 AAC 50.040(a)(1).

[18 AAC 50.040(j)(4), 50.326(j)(3), & 50.346(c)]
[40 CFR 71.6(a)(3)(i) & (ii)]

11. Sulfur Compound Reporting. The Permittee shall report as follows:

11.1. If SO_2 emissions calculated under Condition 10.3 exceed 500 ppm, the Permittee shall report in accordance with Condition 47. When reporting under this condition, include the calculation under Condition 10.3.

11.2. The Permittee shall include in the operating report required by Condition 48.

a. a list of the fuel grades received at the stationary source during the reporting period;

b. for any fuel received with a maximum fuel sulfur content greater than 0.5 percent, the fuel sulfur content of the shipment; and

c. for fuel with sulfur content greater than 0.75 percent, the calculated SO_2 emissions in ppm.

[18 AAC 50.040(j), 50.326(j), & 50.346(c)]
[40 CFR 71.6(a)(3)]

Preconstruction Permit[2] Requirements

Owner Requested Limit to Avoid PSD Classification

12. The Permittee shall emit no more than 240 tons of NOx in any consecutive 12-month period from EU IDs 4 through 6, 11, and 12 combined.

12.1. Install, maintain, and operate a kilowatt-hour (kWh) meter on EU IDs 4 through 6, 11, and 12.

12.2. For EU IDs 4 through 6, 11, and 12, monitor and record the monthly operation of each unit (kWh).

12.3. No later than the end of each calendar month, calculate the total NOx emissions from EU IDs 4 through 6, 11, and 12 for the previous month, based on the operation of each unit (kWh) during that month and the following emission factors.

a. EU IDs 4 through 6: 0.032 lb/kWh;

b. EU IDs 11 and 12: 0.021 lb/kWh;

c. If an updated emission factor from a NOx source test is available, the Permittee shall use the emission rate measured during the most recent source test for EU IDs 11 and 12. If source tests are conducted on EU ID 11 and EU ID 12, the appropriate emission factor shall be used for each unit. Tests shall be conducted in accordance with Condition 12.7.

12.4. No later than the end of each calendar month, calculate the NOx emissions from EU IDs 4 through 6, 11, and 12 combined for the 12-month rolling period ending with the previous month, based on the monthly emissions calculated under Condition 12.3.

[2] *Preconstruction Permit* refers to federal PSD permits, state-issued permits-to-operate issued on or before January 17, 1997 (these permits cover both construction and operations), construction permits issued on or after January 18, 1997, and minor permits issued on or after October 1, 2004.

12.5. Include the records and calculations required under Conditions 12.3 and 12.4 in the operating report required by Condition 48.

12.6. If the 12 month rolling NOx emissions in Condition 12.4 exceeds 240 tons, report as excess emissions in accordance with Condition 47.

12.7. If the 12 month rolling NOx emissions in Condition 12.4 exceed 216[3] tons, then within 120 days of discovery, conduct a source test to verify the NOx emission rate for either EU ID 11 or 12.

a. Conduct the source test at 100% load or the maximum load achievable in the normal operating range of the emissions units. Monitor and record the fuel consumption and average load during the test. List the average operating parameters for each run in the source test result.

b. From the source test results, determine the NOx emission factor in pounds per kilowatt-hour (lb/kWh) using exhaust properties determined by either Method 19 or Method 1-4. If using Method 19, then use the higher heating value throughout the analysis.

c. Unless the Permittee receives written notification that the Department has not approved the source test report, 60 days after submitting the source test report to the Department, calculate the 12-month rolling NOx emissions for the stationary source for each of the previous 12 calendar months using the NOx emission factor determined by the source test.

d. Report the source test results and 12-month rolling NOx emissions in the first operating report due after calculating the 12-month rolling NOx emissions in Condition 12.7.c.

[Condition 5, Minor Permit AQ0286MSS01, 2/19/2016]
[18 AAC 50.040(j) & 50.326(j)]
[40 CFR 71.6(a)]

Insignificant Emissions Units

13. For emissions units at the stationary source that are insignificant as defined in 18 AAC 50.326(d)-(i) that are not listed in this permit, the following apply:

13.1. **Visible Emissions Standard**. The Permittee shall not cause or allow visible emissions, excluding condensed water vapor, emitted from an industrial process, fuel-burning equipment, or an incinerator to reduce visibility through the exhaust effluent by more than 20 percent averaged over any six consecutive minutes.

[18 AAC 50.050(a) & 50.055(a)(1)]

13.2. **Particulate Matter Standard**. The Permittee shall not cause or allow particulate matter emitted from an industrial process or fuel-burning equipment to exceed 0.05 grains per cubic foot of exhaust gas corrected to standard conditions and averaged over three hours.

[18 AAC 50.055(b)(1)]

[3] 216 tons is 90 percent of the annual NOx limit of 240 tons.

13.3. **Sulfur Compound Standard**. The Permittee shall not cause or allow sulfur compound emissions, expressed as SO_2, from an industrial process or fuel-burning equipment, to exceed 500 ppm averaged over three hours.

[18 AAC 50.055(c)]

13.4. General MR&R for Insignificant Emissions Units

a. The Permittee shall submit the compliance certifications of Condition 49 based on reasonable inquiry for Condition 13;

b. The Permittee shall comply with the requirements of Condition 30;

c. The Permittee shall report in the operating report required by Condition 48 if an emissions unit is insignificant because of actual emissions less than the thresholds of 18 AAC 50.326(e) and actual emissions become greater than any of those thresholds; and

d. No other monitoring, recordkeeping or reporting is required.

[18 AAC 50.346(b)(4)]

Section 4. Federal Requirements

40 CFR Part 63 National Emission Standards for Hazardous Air Pollutants (NESHAP)

Subpart A – General Provisions

14. NESHAP Subpart A. For EU IDs 4 through 6, 11, and 12, the Permittee shall comply with the applicable requirements of 40 CFR 63 Subpart A in accordance with the provisions for applicability of Subpart A in Table 8 to NESHAP Subpart ZZZZ.

[18 AAC 50.040(j) & 50.326(j)]
[40 CFR 71.6(a)(1)]
[40 CFR 63.6665 & Table 8, Subpart ZZZZ]

NESHAP Subpart ZZZZ – Reciprocating Internal Combustion Engines

15. For EU IDs 4 through 6, 11, and 12, the Permittee shall comply with all applicable requirements of NESHAP Subpart ZZZZ, identified in Conditions 15.1 through 15.5, for existing stationary compression ignition reciprocating internal combustion engines (RICE) located at an area source of hazardous air pollutant (HAP) emissions.

[18 AAC 50.040(c)(23), (j)(4) & 50.326(j)]
[40 CFR 71.6(a)(1)]
[40 CFR 63.6585, 63.6590, & 63.6595(a), Subpart ZZZZ]

NESHAP Subpart ZZZZ Management Practices

15.1. For EU IDs 4 through 6, 11, and 12, the Permittee shall comply with the following:

[18 AAC 50.040(c)(23), (j)(4) & 50.326(j)]
[40 CFR 71.6(a)(1)]

a. You must meet the following requirements, except during periods of startup:

(i) Change oil and filter every 1,000 hours of operation or annually, whichever comes first;

(ii) Inspect air cleaner every 1,000 hours of operation or annually, whichever comes first, and replace as necessary;

(iii) Inspect all hoses and belts every 500 hours of operation or annually, whichever comes first, and replace as necessary.

b. During periods of startup you must 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.

c. Sources have the option to utilize an oil analysis program in order to extend the specified oil change requirement in Condition 15.1.a(i).

[40 CFR 63.6603(a), (b)(2), 63.6625(h), & Table 2d, Item 1, Subpart ZZZZ]

NESHAP Subpart ZZZZ General Requirements

15.2. For EU IDs 4 through 6, 11, and 12, the Permittee shall comply with the following:

[18 AAC 50.040(c)(23), (j)(4) & 50.326(j)]
[40 CFR 71.6(a)(1)]

a. You must be in compliance with the emission limitations, operating limitations, and other requirements in NESHAP Subpart ZZZZ that apply to you at all times.

[40 CFR 63.6605(a), Subpart ZZZZ]

b. At all times you 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 you 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 the Administrator 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.

[40 CFR 63.6605(b), Subpart ZZZZ]

NESHAP Subpart ZZZZ Demonstration of Continuous Compliance

15.3. For EU IDs 4 through 6, 11, and 12, the Permittee shall comply with the following:

[18 AAC 50.040(c)(23), (j)(4) & 50.326(j)]
[40 CFR 71.6(a)(1) & (a)(3)(i)]

a. You must demonstrate continuous compliance with each emission limitation, operating limitation, and other requirements in Condition 15.1 according to methods specified in Condition 15.3.a(i) or 15.3.a(ii).

[40 CFR 63.6640(a), Subpart ZZZZ]

(i) Operating and maintaining the stationary RICE according to the manufacturer's emission-related operation and maintenance instructions; or

(ii) Develop and follow your own 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.

[Table 6, Item 9, Subpart ZZZZ]

NESHAP Subpart ZZZZ Reporting Requirements

15.4. For EU IDs 4 through 6, 11, and 12, the Permittee must report all deviations as defined in NESHAP Subpart ZZZZ in the semiannual monitoring report required by Condition 48.

[18 AAC 50.040(c)(23), (j)(4) & 50.326(j)]
[40 CFR 71.6(a)(3)(iii)]
[40 CFR 63.6650(f), Subpart ZZZZ]

NESHAP Subpart ZZZZ Recordkeeping Requirements

15.5. For EU IDs 4 through 6, 11, and 12, the Permittee shall comply with the following:

[18 AAC 50.040(c)(23), (j)(4) & 50.326(j)]
[40 CFR 71.6(a)(3)(ii)]

a. You must keep records of the maintenance conducted on the stationary RICE in order to demonstrate that you operated and maintained the stationary RICE and after-treatment control device (if any) according to your own maintenance plan.

[40 CFR 63.6655(e), (e)(2) & (3), Subpart ZZZZ]

b. You must keep each record in a form suitable and readily available for expeditious review, in hard copy or electronic form, for at least 5 years after the date of each occurrence, measurement, maintenance, corrective action, report, or record, according to 40 CFR 63.10(b)(1).

[40 CFR 63.6660, Subpart ZZZZ]

40 CFR Part 61 NESHAP

Subpart A - General Provisions and Subpart M - Asbestos

16. The Permittee shall comply with the applicable requirements set forth in 40 CFR 61.145, 61.150, and 61.152 of Subpart M, and the applicable sections set forth in 40 CFR 61, Subpart A and Appendix A.

[18 AAC 50.040(b)(1) & (2)(F), & 50.326(j)]
[40 CFR 61, Subparts A & M, and Appendix A]

40 CFR Part 82 Protection of Stratospheric Ozone

17. Subpart F – Recycling and Emissions Reduction. The Permittee shall comply with the applicable standards for recycling and emission reduction of refrigerants set forth in 40 CFR 82, Subpart F.

[18 AAC 50.040(d) & 50.326(j)]
[40 CFR 82, Subpart F]

18. Subpart G – Significant New Alternatives. The Permittee shall comply with the applicable prohibitions set out in 40 CFR 82.174 (Protection of Stratospheric Ozone Subpart G – Significant New Alternatives Policy Program).

[18 AAC 50.040(d) & 50.326(j)]
[40 CFR 82.174(b) through (d), Subpart G]

19. Subpart H – Halon Emissions Reduction. The Permittee shall comply with the applicable prohibitions set out in 40 CFR 82.270 (Protection of Stratospheric Ozone Subpart H – Halon Emission Reduction).

[18 AAC 50.040(d) & 50.326(j)]
[40 CFR 82.270(b) through (f), Subpart H]

20. NESHAP Applicability Determinations. The Permittee shall determine rule applicability and designation of affected sources under National Emission Standards for Hazardous Air Pollutants (NESHAP) for Source Categories (40 CFR 63) in accordance with the procedures described in 40 CFR 63.1(b).

20.1. If an owner or operator of a stationary source who is in the relevant source category determines that the source is not subject to a relevant standard or other requirement established under 40 CFR 63, the owner or operator must keep a record as specified in 40 CFR 63.10(b)(3).

20.2. If a source becomes affected by an applicable subpart of 40 CFR 63, the owner or operator shall comply with such standard by the compliance date established by the Administrator in the applicable subpart, in accordance with 40 CFR 63.6(c).

[18 AAC 50.040(c)(1), 50.040(j), & 50.326(j)]
[40 CFR 71.6(a)(3)(ii)]
[40 CFR 63.1(b) & 63.6(c)(1), Subpart A]

Section 5. General Conditions

Standard Terms and Conditions

21. Each permit term and condition is independent of the permit as a whole and remains valid regardless of a challenge to any other part of the permit.

[18 AAC 50.326(j)(3), 50.345(a) & (e)]

22. The permit may be modified, reopened, revoked and reissued, or terminated for cause. A request by the Permittee for modification, revocation and re-issuance, or termination or a notification of planned changes or anticipated noncompliance does not stay any permit condition.

[18 AAC 50.326(j)(3), 50.345(a) & (f)]

23. The permit does not convey any property rights of any sort, nor any exclusive privilege.

[18 AAC 50.326(j)(3), 50.345(a) & (g)]

24. Administration Fees. The Permittee shall pay to the Department all assessed permit administration fees. Administration fee rates are set out in 18 AAC 50.400-403.

[18 AAC 50.326(j)(1), 50.400, & 50.403]
[AS 37.10.052(b), 11/04; AS 46.14.240, 6/7/03]

25. Assessable Emissions. The Permittee shall pay to the Department annual emission fees based on the stationary source's assessable emissions as determined by the Department under 18 AAC 50.410. The assessable emission fee rate is set out in 18 AAC 50.410. The Department will assess fees per ton of each air pollutant that the stationary source emits or has the potential to emit in quantities 10 tons per year or greater. The quantity for which fees will be assessed is the lesser of

25.1. the stationary source's assessable potential to emit of 415 tpy; or

25.2. the stationary source's projected annual rate of emissions that will occur from July 1 to the following June 30, based upon credible evidence of actual annual emissions during the most recent calendar year or another 12-month period approved in writing by the Department, when demonstrated by

a. an enforceable test method described in 18 AAC 50.220;

b. material balance calculations;

c. emission factors from EPA's publication AP-42, Vol. I, adopted by reference in 18 AAC 50.035; or

d. other methods and calculations approved by the Department, including appropriate vendor-provided emission factors when sufficient documentation is provided.

[18 AAC 50.040(j)(3), 50.035, 50.326(j)(1), 50.346(b)(1), 50.410, & 50.420]
[40 CFR 71.5(c)(3)(ii)]

26. Assessable Emission Estimates. Emission fees will be assessed as follows:

26.1. no later than March 31 of each year, the Permittee may submit an estimate of the stationary source's assessable emissions to ADEC, Air Permits Program, ATTN: Assessable Emissions Estimate, 555 Cordova Street, Anchorage, Alaska 99501; the submittal must include all of the assumptions and calculations used to estimate the assessable emissions in sufficient detail so the Department can verify the estimates; or

26.2. if no estimate is submitted on or before March 31 of each year, emission fees for the next fiscal year will be based on the potential to emit set out in Condition 25.1.

[18 AAC 50.040(j)(3), 50.326(j)(1), 50.346(b)(1), 50.410, & 50.420]
[40 CFR 71.5(c)(3)(ii)]

27. Dilution. The Permittee shall not dilute emissions with air to comply with this permit. Monitoring shall consist of an annual certification that the Permittee does not dilute emissions to comply with this permit.

[18 AAC 50.045(a)]

28. Reasonable Precautions to Prevent Fugitive Dust. A person who causes or permits bulk materials to be handled, transported, or stored, or who engages in an industrial activity or construction project shall take reasonable precautions to prevent particulate matter from being emitted into the ambient air.

[18 AAC 50.045(d), 50.040(e), 50. 326(j)(3), & 50.346(c)]

28.1. The Permittee shall keep records of

a. complaints received by the Permittee and complaints received by the Department and conveyed to the Permittee, and

b. any additional precautions that are taken

(i) to address complaints described in Condition 28.1.a or to address the results of Department inspections that found potential problems, and

(ii) to prevent future dust problems.

28.2. The Permittee shall report according to Conditions 30.1.e and 30.2.

29. Stack Injection. The Permittee shall not release materials other than process emissions, products of combustion, or materials introduced to control pollutant emissions from a stack at a stationary source constructed or modified after November 1, 1982, except as authorized by a construction permit, Title V permit, or air quality control permit issued before October 1, 2004.

[18 AAC 50.055(g)]

30. Air Pollution Prohibited. No person may permit any emission which is injurious to human health or welfare, animal or plant life, or property, or which would unreasonably interfere with the enjoyment of life or property.

[18 AAC 50.110, 50.040(e), 50.326(j)(3), & 50.346(a)]
[40 CFR 71.6(a)(3)]

30.1. **Monitoring, Recordkeeping, and Reporting**.

a. If emissions present a potential threat to human health or safety, the Permittee shall report any such emissions according to Condition 47.

b. As soon as practicable after becoming aware of a complaint that is attributable to emissions from the stationary source, the Permittee shall investigate the complaint to identify emissions that the Permittee believes have caused or are causing a violation of Condition 30.

c. The Permittee shall initiate and complete corrective action necessary to eliminate any violation identified by a complaint or investigation as soon as practicable if

(i) after an investigation because of a complaint or other reason, the Permittee believes that emissions from the stationary source have caused or are causing a violation of Condition 30; or

(ii) the Department notifies the Permittee that it has found a violation of Condition 30.

d. The Permittee shall keep records of

(i) the date, time, and nature of all emissions complaints received;

(ii) the name of the person or persons that complained, if known;

(iii) a summary of any investigation, including reasons the Permittee does or does not believe the emissions have caused a violation of Condition 30; and

(iv) any corrective actions taken or planned for complaints attributable to emissions from the stationary source.

e. With each operating report under Condition 48, the Permittee shall include a brief summary report which must include

(i) the number of complaints received;

(ii) the number of times the Permittee or the Department found corrective action necessary;

(iii) the number of times action was taken on a complaint within 24 hours; and

(iv) the status of corrective actions the Permittee or Department found necessary that were not taken within 24 hours.

30.2. The Permittee shall notify the Department of a complaint that is attributable to emissions from the stationary source within 24 hours after receiving the complaint, unless the Permittee has initiated corrective action within 24 hours of receiving the complaint.

31. Technology-Based Emission Standard. If an unavoidable emergency, malfunction (as defined in 18 AAC 50.235(d)), or non-routine repair (as defined in 18 AAC 50.990(64)), causes emissions in excess of a technology-based emission standard[4] listed in Condition(s) 14, 15, and 17 (refrigerants), the Permittee shall

31.1. take all reasonable steps to minimize levels of emissions that exceed the standard; and

31.2. report in accordance with Condition 47.1.b, the report must include information on the steps taken to minimize emissions and corrective measures taken or to be taken.

[18 AAC 50.235(a), 50.326(j)(4), & 50.040(j)(4)]
[40 CFR 71.6(c)(6)]

Open Burning Requirements

32. Open Burning. If the Permittee conducts open burning at this stationary source, the Permittee shall comply with the requirements of 18 AAC 50.065.The Permittee shall comply as follows:

32.1. Keep written records to demonstrate that the Permittee complies with the limitations in this condition and the requirements of 18 AAC 50.065. Upon request by the Department, submit copies of the records; and

32.2. Include this condition in the annual certification required under Condition 49.

[18 AAC 50.065, 50.040(j), & 50.326(j)]
[40 CFR 71.6(a)(3)]

[4] As defined in 18 AAC 50.990(106), the term *"technology-based emission standard"* means a best available control technology (BACT) standard; a lowest achievable emission rate (LAER) standard; a maximum achievable control technology (MACT) standard established under 40 CFR 63, Subpart B, adopted by reference in 18 AAC 50.040(c); a standard adopted by reference in 18 AAC 50.040(a) or (c); and any other similar standard for which the stringency of the standard is based on determinations of what is technologically feasible, considering relevant factors.

Section 6. General Source Testing and Monitoring Requirements

33. Requested Source Tests. In addition to any source testing explicitly required by the permit, the Permittee shall conduct source testing as requested by the Department to determine compliance with applicable permit requirements.

[18 AAC 50.220(a) & 50.345(a) & (k)]

34. Operating Conditions. Unless otherwise specified by an applicable requirement or test method, the Permittee shall conduct source testing

[18 AAC 50.220(b)]

34.1. at a point or points that characterize the actual discharge into the ambient air; and

34.2. at the maximum rated burning or operating capacity of the emissions unit or another rate determined by the Department to characterize the actual discharge into the ambient air.

35. Reference Test Methods. The Permittee shall use the following test methods when conducting source testing for compliance with this permit:

35.1. Source testing for compliance with requirements adopted by reference in 18 AAC 50.040(a) must be conducted in accordance with the methods and procedures specified in 40 CFR 60.

[18 AAC 50.220(c)(1)(A) & 50.040(a)]
[40 CFR 60]

35.2. Source testing for compliance with requirements adopted by reference in 18 AAC 50.040(b) must be conducted in accordance with the methods and procedures specified in 40 CFR 61.

[18 AAC 50.220(c)(1)(A) & 50.040(a)]
[40 CFR 61]

35.3. Source testing for compliance with requirements adopted by reference in 18 AAC 50.040(c) must be conducted in accordance with the methods and procedures specified in 40 CFR 63.

[18 AAC 50.220(c)(1)(A) & 50.040(a)]
[40 CFR 63]

35.4. Source testing for the reduction in visibility through the exhaust effluent must be conducted in accordance with the procedures set out in Reference Method 9. The Permittee may use the form in Section 11 to record data.

[18 AAC 50.030 & 50.220(c)(1)(D)]

35.5. Source testing for emissions of total particulate matter, sulfur compounds, nitrogen compounds, carbon monoxide, lead, volatile organic compounds, fluorides, sulfuric acid mist, municipal waste combustor organics, metals, and acid gases must be conducted in accordance with the methods and procedures specified in 40 CFR 60, Appendix A.

[18 AAC 50.040(a)(3) & 50.220(c)(1)(E)]
[40 CFR 60, Appendix A]

35.6. Source testing for emissions of $PM_{2.5}$ and PM_{10} must be conducted in accordance with the procedures specified in 40 CFR 51, Appendix M, Methods 201 or 201A and 202.

[18 AAC 50.035(b)(2) & 50.220(c)(1)(F)]
[40 CFR 51, Appendix M]

35.7. Source testing for emissions of any pollutant may be determined using an alternative method approved by the Department in accordance with 40 CFR 63 Appendix A, Method 301.

[18 AAC 50.040(c)(32) & 50.220(c)(2)]
[40 CFR 63, Appendix A, Method 301]

36. Excess Air Requirements. To determine compliance with this permit, standard exhaust gas volumes must include only the volume of gases formed from the theoretical combustion of the fuel, plus the excess air volume normal for the specific emissions unit type, corrected to standard conditions (dry gas at 68° F and an absolute pressure of 760 millimeters of mercury).

[18 AAC 50.220(c)(3) & 50.990(102)]

37. Test Exemption. The Permittee is not required to comply with Conditions 39, 40 and 41 when the exhaust is observed for visible emissions by Method 9 Plan (Condition 2.1).

[18 AAC 50.345(a)]

38. Test Deadline Extension. The Permittee may request an extension to a source test deadline established by the Department. The Permittee may delay a source test beyond the original deadline only if the extension is approved in writing by the Department's appropriate division director or designee.

[18 AAC 50.345(a) & (l)]

39. Test Plans. Except as provided in Condition 37, before conducting any source tests, the Permittee shall submit a plan to the Department. The plan must include the methods and procedures to be used for sampling, testing, and quality assurance and must specify how the emissions unit will operate during the test and how the Permittee will document that operation. The Permittee shall submit a complete plan within 60 days after receiving a request under Condition 33 and at least 30 days before the scheduled date of any test unless the Department agrees in writing to some other time period. Retesting may be performed without resubmitting the plan.

[18 AAC 50.345(a) & (m)]

40. Test Notification. Except as provided in Condition 37, at least 10 days before conducting a source test, the Permittee shall give the Department written notice of the date and the time the source test will begin.

[18 AAC 50.345(a) & (n)]

41. Test Reports. Except as provided in Condition 37, within 60 days after completing a source test, the Permittee shall submit two copies of the results in the format set out in the Source Test Report Outline, adopted by reference in 18 AAC 50.030. The Permittee shall additionally certify the results in the manner set out in Condition 44. If requested in writing by the Department, the Permittee must provide preliminary results in a shorter period of time specified by the Department.

[18 AAC 50.345(a) & (o)]

42. Particulate Matter Calculations. In source testing for compliance with the particulate matter standards in Conditions 5 and 13.2, the three-hour average is determined using the average of three one-hour test runs.

[18 AAC 50.220(f)]

Section 7. General Recordkeeping and Reporting Requirements

Recordkeeping Requirements

43. The Permittee shall keep all records required by this permit for at least five years after the date of collection, including:

[18 AAC 50.326(j)]
[40 CFR 60.7(f), Subpart A, and 40 CFR 71.6(a)(3)(ii)(B)]

43.1. copies of all reports and certifications submitted pursuant to this section of the permit; and

43.2. records of all monitoring required by this permit, and information about the monitoring including:

a. the date, place, and time of sampling or measurements;

b. the date(s) analyses were performed;

c. the company or entity that performed the analyses;

d. the analytical techniques or methods used;

e. the results of such analyses; and,

f. the operating conditions as existing at the time of sampling or measurement.

Reporting Requirements

44. Certification. The Permittee shall certify any permit application, report, affirmation, or compliance certification submitted to the Department and required under the permit by including the signature of a responsible official for the permitted stationary source following the statement: *"Based on information and belief formed after reasonable inquiry, I certify that the statements and information in and attached to this document are true, accurate, and complete."* Excess emission reports must be certified either upon submittal or with an operating report required for the same reporting period. All other reports and other documents must be certified upon submittal.

44.1. The Department may accept an electronic signature on an electronic application or other electronic record required by the Department if

a. a certifying authority registered under AS 09.80.020 verifies that the electronic signature is authentic; and

b. the person providing the electronic signature has made an agreement, with the certifying authority described in Condition 44.1.a, that the person accepts or agrees to be bound by an electronic record executed or adopted with that signature.

[18 AAC 50.345(a) & (j), 50.205, & 50.326(j)]
[40 CFR 71.6(a)(3)(iii)(A)]

45. Submittals. Unless otherwise directed by the Department or this permit, the Permittee shall submit reports, compliance certifications, and other submittals required by this permit via the Department's AOS system at http://dec.alaska.gov/applications/air/airtoolsweb using the Permittee Portal option.

45.1. Alternatively, documents certified in accordance with Condition 44 may be submitted either by:

a. Email under a cover letter using dec.aq.airreports@alaska.gov; or

b. Certified mail to: ADEC, Air Permits Program, ATTN: Compliance Technician, 610 University Ave., Fairbanks, AK 99709-3643.

[18 AAC 50.326(j)]
[40 CFR 71.6(a)(3)(iii)(A)]

46. Information Requests. The Permittee shall furnish to the Department, within a reasonable time, any information the Department requests in writing to determine whether cause exists to modify, revoke and reissue, or terminate the permit or to determine compliance with the permit. Upon request, the Permittee shall furnish to the Department copies of records required to be kept by the permit. The Department may require the Permittee to furnish copies of those records directly to the federal Administrator.

[18 AAC 50.345(a) & (i), 50.200, & 50.326(a) & (j)]
[40 CFR 71.5(a)(2) & 71.6(a)(3)]

47. Excess Emissions and Permit Deviation Reports.

47.1. Except as provided in Condition 30, the Permittee shall report all emissions or operations that exceed or deviate from the requirements of this permit as follows:

a. In accordance with 18 AAC 50.240(c), as soon as possible after the event commences or is discovered, report

(i) emissions that present a potential threat to human health or safety; and

(ii) excess emissions that the Permittee believes to be unavoidable;

b. In accordance with 18 AAC 50.235(a), within two working days after the event commenced or was discovered, report an unavoidable emergency, malfunction, or non routine repair that causes emissions in excess of a technology based emission standard;

c. Report all other excess emissions and permit deviations

(i) within 30 days of the end of the month in which the emissions or deviation occurs, except as provided in Conditions 47.1.c(ii) and 47.1.c(iii);

(ii) if a continuous or recurring excess emissions is not corrected within 48 hours of discovery, within 72 hours of discovery unless the Department provides written permission to report under Condition 47.1.c(i); and

(iii) for failure to monitor, as required in other applicable conditions of this permit.

47.2. When reporting either excess emissions or permit deviations, the Permittee must report using either the Department's online form, which can be found at http://dec.alaska.gov/applications/air/airtoolsweb or if the Permittee prefers, the form contained in Section 13 of this permit. The Permittee must provide all information called for by the form that is used.

47.3. If requested by the Department, the Permittee shall provide a more detailed written report to follow up an excess emissions report.

[18 AAC 50.235(a)(2), 50.240(c), 50.326(j)(3), & 50.346(b)(2) & (3)]

48. Operating Reports. During the life of this permit[5], the Permittee shall submit to the Department an original and one copy of an operating report by August 1 for the period January 1 to June 30 of the current year and by February 1 for the period July 1 to December 31 of the previous year.

48.1. The operating report must include all information required to be in operating reports by other conditions of this permit. If excess emissions or permit deviations that occurred during the reporting period are not reported under Condition 48.1, either

a. The Permittee shall identify

(i) the date of the deviation;

(ii) the equipment involved;

(iii) the permit condition affected;

(iv) a description of the excess emissions or permit deviation; and

(v) any corrective action or preventive measures taken and the date of such actions; or

b. When excess emissions or permit deviations have already been reported under Condition 47 the Permittee shall cite the date or dates of those reports.

48.2. The operating report must include a listing of emissions monitored under Condition 2.1.e which triggers additional testing or monitoring, whether or not the emissions monitored exceed an emission standard. The Permittee shall include in the report.

a. the date of the emissions;

b. the equipment involved;

c. the permit condition affected; and

[5] *Life of this permit* is defined as the permit effective dates, including any periods of reporting obligations that extend beyond the permit effective dates. For example if a permit expires prior to the end of a calendar year, there is still a reporting obligation to provide operating reports for the periods when the permit was in effect.

d. the monitoring result which triggered the additional monitoring.

48.3. **Transition from expired to renewed permit**. For the first period of this renewed operating permit, also provide the previous permit's facility operating report elements covering that partial period immediately preceding the effective date of this renewed permit.

[18 AAC 50.346(a) & 50.326(j)]
[40 CFR 71.6(a)(3)(iii)(A)]

49. Annual Compliance Certification. Each year by March 31, the Permittee shall compile and submit to the Department an annual compliance certification report according to Condition 45.

49.1. Certify the compliance status of the stationary source over the preceding calendar year consistent with the monitoring required by this permit, as follows:

a. identify each term or condition set forth in Section 3 through Section 9, that is the basis of the certification;

b. briefly describe each method used to determine the compliance status;

c. state whether compliance is intermittent or continuous; and

d. identify each deviation and take it into account in the compliance certification;

49.2. **Transition from expired to renewed permit**. For the first period of this renewed operating permit, also provide the previous permit's annual compliance certification report elements covering that partial period immediately preceding the effective date of this renewed permit.

49.3. In addition, submit a copy of the report directly to EPA-Region 10, ATTN: Air Toxics and Enforcement Section, M/S 20-C04, 1200 Sixth Avenue, Suite 155, Seattle, WA 98101.

[18 AAC 50.205, 50.345(a) & (j), & 50.326(j)]
[40 CFR 71.6(c)(5)]

50. Emission Inventory Reporting. The Permittee shall submit to the Department reports of actual emissions, by emissions unit, of CO, NH_3, NO_X, PM_{10}, $PM_{2.5}$, SO_2, VOC and Lead (Pb) (and lead compounds) using the form in Section 14 of this permit, as follows:

50.1. Each year by March 31, if the stationary source's potential to emit emissions for the previous calendar year equals or exceeds:

a. 250 tons per year (tpy) of NH_3, PM_{10}, $PM_{2.5}$ or VOC; or

b. 2,500 tpy of CO, NO_X or SO_2

50.2. Every third year by March 31 if the stationary source's potential to emit (except actual emissions for Pb) for the previous calendar year equals or exceeds:

a. 0.5 tons per year of actual Pb; or

b. 1,000 tpy of CO; or

c. 100 tpy of SO_2, NH_3, PM_{10}, $PM_{2.5}$, NO_X or VOC.

50.3. For reporting under Condition 50.2, the Permittee shall report in 2021 for calendar year 2020, 2024 for calendar year 2023, etc., in accordance with the EPA schedule.

50.4. Include in the report required by this condition, the required data elements contained within the form in Section 14 or those contained in Tables 2a and 2b of Appendix A to Subpart A of 40 CFR 51 for each stack associated with an emissions unit.

[18 AAC 50.040(j)(4), 50.200, & 50.346(b)(8) & (9)]
[40 CFR 51.15, 51.30(a)(1) & (b)(1); & 40 CFR 51, Appendix A to Subpart A]

51. NSPS and NESHAP Reports. The Permittee shall comply with the following:

51.1. **Reports**: Except for previously submitted reports and federal reports and notices submitted through EPA's Central Data Exchange (CDX) and Compliance and Emissions Data Reporting Interface (CEDRI) online reporting system, attach to the operating report required by Condition 113 for the period covered by the report, a copy of any NSPS and NESHAPs reports submitted to EPA Region 10; and

51.2. **Waivers**: Upon request by the Department, provide a written copy of any EPA-granted alternative monitoring requirement, custom monitoring schedule or waiver of the federal emission standards, recordkeeping, monitoring, performance testing, or reporting requirements. The Permittee shall keep a copy of each U.S. EPA-issued monitoring waiver or custom monitoring schedule with the permit.

[18 AAC 50.326(j)(4) & 50.040(j)]
[40 CFR 60.13, 63.10(d) & (f) & 40 CFR 71.6(c)(6)]

Section 8. Permit Changes and Renewal

52. Permit Applications and Submittals. The Permittee shall comply with the following requirements for submitting application information to the EPA Region 10:

52.1. The Permittee shall provide a copy of each application for modification or renewal of this permit, including any compliance plan, or application addenda, at the time the application or addendum is submitted to the Department;

52.2. The information shall be submitted to EPA Region 10, ATTN: Air Permits and Toxics Branch, M/S 15-H13, 1200 Sixth Avenue, Suite 155, Seattle, WA 98101-3188.

52.3. To the extent practicable, the Permittee shall provide to EPA applications in portable document format (pdf); MS Word format (.doc); or other computer-readable format compatible with EPA's national database management system; and

52.4. The Permittee shall maintain records as necessary to demonstrate compliance with this condition.

[18 AAC 50.040(j)(7) & 50.326(a) & (j)(3), & 50.346(b)(7)]
[40 CFR 71.10(d)(1)]

53. Emissions Trading. No permit revision shall be required under any approved economic incentives, marketable permits, emissions trading and other similar programs or processes for changes that are provided for in the permit.

[18 AAC 50.040(j)(4) & 50.326(j)]
[40 CFR 71.6(a)(8)]

54. Off Permit Changes. The Permittee may make changes that are not addressed or prohibited by this permit other than those subject to the requirements of 40 CFR Part 72 through 78 or those that are modifications under any provision of Title I of the Act to be made without a permit revision, provided that the following requirements are met:

54.1. Each such change shall meet all applicable requirements and shall not violate any existing permit term or condition;

54.2. Provide contemporaneous written notice to EPA and the Department of each such change, except for changes that qualify as insignificant under 18 AAC 50.326(d) – (i). Such written notice shall describe each such change, including the date, any change in emissions, pollutants emitted, and any applicable requirement that would apply as a result of the change;

54.3. The change shall not qualify for the shield under 40 CFR 71.6(f);

54.4. The Permittee shall keep a record describing changes made at the source that result in emissions of a regulated air pollutant subject to an applicable requirement, but not otherwise regulated under the permit, and the emissions resulting from those changes.

[18 AAC 50.040(j)(4) & 50.326(j)]
[40 CFR 71.6(a)(12)]

55. Operational Flexibility. The Permittee may make CAA Section 502(b)(10)[6] changes within the permitted stationary source without requiring a permit revision if the changes are not modifications under any provision of Title I of the Act and the changes do not exceed the emissions allowable under this permit (whether expressed therein as a rate of emissions or in terms of total emissions):

55.1. The Permittee shall provide EPA and the Department with a notification no less than 7 days in advance of the proposed change.

55.2. For each such change, the written notification required above shall include a brief description of the change within the permitted stationary source, the date on which the change will occur, any change in emissions, and any permit term or condition that is no longer applicable as a result of the change.

55.3. The permit shield described in 40 CFR 71.6(f) shall not apply to any change made pursuant to Condition 55.

[18 AAC 50.040(j)(4) & 50.326(j)]
[40 CFR 71.6(a)(13)]

56. Permit Renewal. To renew this permit, the Permittee shall submit to the Department[7] an application under 18 AAC 50.326 no sooner than [18 months before the expiration date of this permit] and no later than [6 months before the expiration date of this permit]. The renewal application shall be complete before the permit expiration date listed on the cover page of this permit. Permit expiration terminates the source's right to operate unless a timely and complete renewal application has been submitted consistent with 40 CFR 71.7(b) and 71.5(a)(1)(iii).

[18 AAC 50.040(j)(3), 50.326(c) & (j)(2)]
[40 CFR 71.5(a)(1)(iii) & 71.7(b) & (c)(1)(ii)]

[6] As defined in 40 CFR 71.2, CAA Section 502(b)(10) changes are changes that contravene an express permit term. Such changes do not include changes that would violate applicable requirements or contravene federally enforceable permit terms and conditions that are monitoring (including test methods), recordkeeping, reporting, or compliance certification requirements.

[7] Submit permit applications to the Department's Anchorage office: Air Permit Intake Clerk, ADEC 555 Cordova Street, Anchorage, AK 99501.

Section 9. Compliance Requirements

General Compliance Requirements

57. Compliance with permit terms and conditions is considered to be compliance with those requirements that are

57.1. included and specifically identified in the permit; or

57.2. determined in writing in the permit to be inapplicable.

[18 AAC 50.326(j)(3) & 50.345(a) & (b)

58. The Permittee must comply with each permit term and condition. Noncompliance with a permit term or condition constitutes a violation of AS 46.14.120(c), 18 AAC 50, and, except for those terms or conditions designated in the permit as not federally enforceable, the Clean Air Act, and is grounds for

58.1. an enforcement action;

58.2. permit termination, revocation and reissuance, or modification in accordance with AS 46.14.280; or

58.3. denial of an operating permit renewal application.

[18 AAC 50.040(j), 50.326(j) & 50.345(a) & (c)]

59. For applicable requirements with which the stationary source is in compliance, the Permittee will continue to comply with such requirements

[18 AAC 50.040(j) & 50.326(j)]
[40 CFR 71.6(c)(3) & 71.5(c)(8)(iii)(A)]

60. It is not a defense in an enforcement action to claim that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with a permit term or condition.

[18 AAC 50.326(j)(3) & 50.345(a) & (d)]

61. The Permittee shall allow the Department or an inspector authorized by the Department, upon presentation of credentials and at reasonable times with the consent of the owner or operator to

61.1. enter upon the premises where a source subject to the permit is located or where records required by the permit are kept;

61.2. have access to and copy any records required by the permit;

61.3. inspect any stationary source, equipment, practices, or operations regulated by or referenced in the permit; and

61.4. sample or monitor substances or parameters to assure compliance with the permit or other applicable requirements.

[18 AAC 50.326(j)(3) & 50.345(a) & (h)]

62. For applicable requirements that will become effective during the permit term, the Permittee shall meet such requirements on a timely basis.

[18 AAC 50.040(j) & 50.326(j)]
[40 CFR 71.6(c)(3) & 71.5(c)(8)(iii)(B)]

Section 10. Permit As Shield from Inapplicable Requirements

In accordance with AS 46.14.290, and based on information supplied in the permit application, this section of the permit contains the requirements determined by the Department not to be applicable to the stationary source.

63. Nothing in this permit shall alter or affect the following:

63.1. The provisions of Section 303 of the Act (emergency orders), including the authority of the Administrator under that section; or

63.2. The liability of an owner or operator of a source for any violation of applicable requirements prior to or at the time of permit issuance.

[18 AAC 50.326(j)]
[40 CFR 71.6(f)(3)(i)) & (ii)]

64. Table B identifies the emissions units that are not subject to the specified requirements at the time of permit issuance. If any of the requirements listed in Table B becomes applicable during the permit term, the Permittee shall comply with such requirements on a timely basis including, but not limited to, providing appropriate notification to EPA, obtaining a construction permit and/or an operating permit revision.

[18 AAC 50.326(j)]
[40 CFR 71.6(f)(1)(ii)]

Table B - Permit Shields Granted

EU ID	Non-Applicable Requirements	Reason for Non-Applicability
4, 5, 6, 11, & 12	Numerical CO emission limitations specified in Table 2d of 40 CFR 63 Subpart ZZZZ	EU IDs 4 through 6, 11, and 12 are located at an area source of HAP that meets the criteria listed in 40 CFR 63.6603(b)(2).

[18 AAC 50.326(j)]
[40 CFR 71.6(f)(1)(ii)]

Section 11. Visible Emissions Forms

VISIBLE EMISSION OBSERVATION FORM

This form is designed to be used in conjunction with EPA Method 9, "Visual Determination of the Opacity of Emissions from Stationary Sources." Temporal changes in emission color, plume water droplet content, background color, sky conditions, observer position, etc. should be noted in the comments section adjacent to each minute of readings. Any information not dealt with elsewhere on the form should be noted under additional information. Following are brief descriptions of the type of information that needs to be entered on the form: for a more detailed discussion of each part of the form, refer to "Instructions for Use of Visible Emission Observation Form." (https://www3.epa.gov/ttnemc01/methods/webinar8.pdf)

- Source Name: full company name, parent company or division or subsidiary information, if necessary.
- Address: street (not mailing or home office) address of facility where visible emissions observation is being made.
- Phone (Key Contact): number for appropriate contact.
- Stationary Source ID Number: number from NEDS, agency file, etc.
- Process Equipment, Operating Mode: brief description of process equipment (include type of facility) and operating rate, % capacity, and/or mode (e.g. charging, tapping, shutdown).Note operating mode at end of observation in the Comments Section.
- Control Equipment, Operating Mode: specify type of control devices and % utilization, control efficiency.
- Describe Emission Point: for identification purposes, stack or emission point appearance, location, and geometry; and whether emissions are confined (have a specifically designed outlet) or unconfined (fugitive).
- Height Above Ground Level: stack or emission point height relative to ground level; can use engineering drawings, Abney level, or clinometer.
- Height Relative to Observer: indicate height of emission point relative to the observation point.
- Distance from Observer: distance to emission point; can use rangefinder or map.
- Direction from Observer: direction plume is traveling from observer.
- Describe Emissions and Color: include physical characteristics, plume behavior (e.g., looping, lacy, condensing, fumigating, secondary particle formation, distance plume visible, etc.), and color of emissions (gray, brown, white, red, black, etc.). Note color changes in comments section.
- Visible Water Vapor Present?: check "yes" if visible water vapor is present.
- If plume is present, note in comments section "attached" if water droplet plume forms prior to exiting stack, and "detached" if water droplet plume forms after exiting stack.
- Point in Plume at Which Opacity was Determined: describe physical location in plume where readings were made (e.g., 1 ft above stack exit or 10 ft. after dissipation of water plume).
- Describe Plume Background: object plume is read against, include texture and atmospheric conditions (e.g., hazy).
- Background Color: sky blue, gray-white, new leaf green, etc.
- Sky Conditions: indicate color of clouds and cloud cover by percentage or by description (clear, scattered, broken, overcast).
- Wind Speed: record wind speed; can use Beaufort wind scale or hand-held anemometer to estimate.
- Wind Direction From: direction from which wind is blowing; can use compass to estimate to eight points.
- Ambient Temperature: in degrees Fahrenheit or Celsius.
- Wet Bulb Temperature: can be measured using a sling psychrometer
- RH Percent: relative humidity measured using a sling psychrometer; use local US Weather Bureau measurements only if nearby.
- Source Layout Sketch: include wind direction, sun position, associated stacks, roads, and other landmarks to fully identify location of emission point and observer position.
- Draw North Arrow: to determine, point line of sight in direction of emission point, place compass beside circle, and draw in arrow parallel to compass needle.
- Sun's Location: point line of sight in direction of emission point, move pen upright along sun location line, mark location of sun when pen's shadow crosses the observer's position.
- Observation Date: date observations conducted.
- Start Time, End Time: beginning and end times of observation period (e.g., 1635 or 4:35 p.m.).
- Data Set: percent opacity to nearest 5%; enter from left to right starting in left column. Use a second (third, etc.) form, if readings continue beyond 30 minutes. Use dash (-) for readings not made; explain in adjacent comments section.
- Comments: note changing observation conditions, plume characteristics, and/or reasons for missed readings.
- Range of Opacity: note highest and lowest opacity number.
- Observer's Name: print in full.
- Observer's Signature, Date: sign and date after performing VE observation.
- Observer's Affiliation: observer's employer.
- Certifying Organization. Certified By, Date: name of "smoke school" certifying observer and date of most recent certification.

ALASKA DEPARTMENT OF ENVIRONMENTAL CONSERVATION
AIR PERMITS PROGRAM - VISIBLE EMISSIONS OBSERVATION FORM

Page No._____

Stationary Source Name		Type of Emission Unit		Observation Date		Start Time		End Time	
				Sec / Min	0	15	30	45	Comments
Emission Unit Location				1					
City	State	Zip		2					
Phone # (Key Contact)		Stationary Source ID Number		3					
Process Equipment		Operating Mode		4					
Control Equipment		Operating Mode		5					
Describe Emission Point/Location				6					
Height above ground level	Height relative to observer	Clinometer Reading		7					
Distance From Observer		Direction From Observer		8					
Start End		Start End							
Describe Emissions & Color				9					
Start		End							
Visible Water Vapor Present? If yes, determine approximate distance from the									
No Yes	stack exit to where the plume was read			10					
Point in Plume at Which Opacity Was Determined				11					
Describe Plume Background		Background Color		12					
Start		Start							
End		End		13					
Sky Conditions:									
				14					
Start		End							
Wind Speed		Wind Direction From		15					
Start End		Start End							
Ambient Temperature		Wet Bulb Temp	RH percent	16					
SOURCE LAYOUT SKETCH:	1Stack or Point Being Read	2 Wind Direction From		17					
3 Observer Location	4 Sun Location	5 North Arrow	6 Other Stacks						
				18					
				19					
				20					
				21					
				22					
				23					
				24					
				25					
				26					
				27					
				28					
				29					
				30					
				Range of Opacity					
				Minimum			Maximum		
I have received a copy of these opacity observations				Print Observer's Name					
Print Name:				Observer's Signature					Date
Signature:									Observer's Affiliation:
Title	Date			Certifying Organization					
				Certified By:				Date	

Data Reduction:

Duration of Observation Period (minutes):	Duration Required by Permit (minutes):
Number of Observations:	Highest Six–Minute Average Opacity (%):
Number of Observations exceeding 20%:	
In compliance with six-minute opacity limit? (Yes or No)	Highest 18-Consecutive –Minute Average Opacity (%)(engines and turbines only)

Average Opacity Summary:

Set Number	Time			Opacity		
	Start	End		Sum	Average	Comments

Section 12. SO_2 Material Balance Calculation

If a fuel shipment contains more than 0.75 percent sulfur by weight, calculate the three-hour exhaust concentration of SO_2 using the following equations:

A. = 31,200 x [**wt%S_{fuel}**] = 31,200 x _____ = _____

B. = 0.148 x [**wt%S_{fuel}**] = 0.148 x _____ = _____

C. = 0.396 x [**wt%C_{fuel}**] = 0.396 x _____ = _____

D. = 0.933 x [**wt%H_{fuel}**] = 0.933 x _____ = _____

E. = B + C + D = _____ + _____ + _____ = _____

F. = 20.9 – [**vol%$_{dry}O_{2,\ exhaust}$**] = 20.9 - _____ = _____

G. = [**vol%$_{dry}O_{2,\ exhaust}$**] ÷ F = _____ ÷ _____ = _____

H. = 1 + G = 1 + _____ = _____

I. = E x H = _____ x _____ = _____

SO_2 concentration = A ÷ I = _____ ÷ _____ = _____ ppm

The wt%S_{fuel}, wt%C_{fuel}, and wt%H_{fuel} are equal to the weight percents of sulfur, carbon, and hydrogen in the fuel. These percentages should total 100%.

The fuel weight percent of sulfur (wt%S_{fuel}) is obtained pursuant to Condition 10. The fuel weight percents of carbon and hydrogen are obtained from the fuel refiner.

The volume percent of oxygen in the exhaust (vol%$_{dry}O_2$, exhaust) is obtained from oxygen meters, manufacturer's data, or from the most recent analysis under 40 CFR 60, Appendix A-2, Method 3, adopted by reference in 18 AAC 50.040(a), at the same engine load used in the calculation.

Enter all of the data in percentages without dividing the percentages by 100. For example, if wt%S_{fuel}l = 1.0%, then enter 1.0 into the equations not 0.01 and if vol%$_{dry}O_2$, exhaust = 3.00%, then enter 3.00, not 0.03.

[18 AAC 50.346(c)]

Section 13. Notification Form

Valdez Diesel Plant	AQ0286TVP05
Stationary Source Name	**Air Quality Permit No.**
Copper Valley Electric Association, Inc.	
Company Name	**Date**

When did you discover the Excess Emissions/Permit Deviation?

Date: _____ / _____ / _____ Time: _____ :/ _____

When did the event/deviation occur?

Begin: Date: _____ / _____ / _____ Time: _____ : _____ (please use 24-hr clock.)

End: Date: _____ / _____ / _____ Time: _____ : _____ (please use 24-hr clock)

What was the duration of the event/deviation? ____ : ____ (hrs:min) or _____ days

(total # of hrs, min, or days, if intermittent then include only the duration of the actual emissions/deviation)

Reason for Notification: (please check only 1 box and go to the corresponding section)

☐ Excess Emissions – Complete Section 1 and Certify

☐ Deviation from Permit Condition – Complete Section 2 and Certify

☐ Deviations from COBC, CO, or Settlement Agreement – Complete Section 2 and Certify

Section 1. Excess Emissions

(a) **Was the exceedance**: ☐ Intermittent or ☐ Continuous

(b) **Cause of Event** (Check one that applies):

☐ Start Up/Shut Down ☐ Natural Cause (weather/earthquake/flood)

☐ Control Equipment Failure ☐ Schedule Maintenance/Equipment Adjustment

☐ Bad Fuel/Coal/Gas ☐ Upset Condition ☐ Other _____

(c) **Description**

Describe briefly, what happened and the cause. Include the parameters/operating conditions exceeded, limits, monitoring data and exceedance.

(d) **Emissions Units Involved**:
Identify the emissions unit involved in the event, using the same identification number and name as in the permit. Identify each emission standard potentially exceeded during the event and the exceedance.

EU ID	EU Name	Permit Condition Exceeded/Limit/Potential Exceedance

(e) **Type of Incident** (please check only one):

☐ Opacity _____ % ☐ Venting _____ gas/scf ☐ Control Equipment Down
☐ Fugitive Emissions ☐ Emission Limit Exceeded ☐ Recordkeeping Failure
☐ Marine Vessel Opacity ☐ Flaring ☐ Other _____

(f) **Unavoidable Emissions**:

Do you intend to assert that these excess emissions were unavoidable? ☐ Yes ☐ No

Do you intend to assert the affirmative defense of 18 AAC 50.235? ☐ Yes ☐ No

Certify Report (go to end of form.)

Section 2. Permit Deviations

(a) **Permit Deviation Type** (check only one box, corresponding with the section in the permit):

- ☐ Emission Unit-Specific
- ☐ Failure to Monitor/Report
- ☐ General Source Test/Monitoring Requirements
- ☐ Recording/Reporting/Compliance Certification
- ☐ Standard Conditions Not Included in the Permit
- ☐ Other Section: _____ (Title of section and section number of your permit).
- ☐ Generally Applicable Requirements
- ☐ Reporting/Monitoring for Diesel Engines
- ☐ Recordkeeping Failure
- ☐ Insignificant Emission Unit
- ☐ Stationary Source Wide

(b) **Emission Unit Involved**:

Identify the emissions unit involved in the event, using the same identification number and name as in the permit. List the corresponding permit conditions and the deviation.

EU ID	EU Name	Permit Condition/ Potential Deviation

(c) **Description of Potential Deviation**:
Describe briefly what happened and the cause. Include the parameters/operating conditions and the potential deviation.

(d) Corrective Actions:
Describe actions taken to correct the deviation or potential deviation and to prevent future recurrence.

Certification:

Based on information and belief formed after reasonable inquiry, I certify that the statements and information in and attached to this document are true, accurate, and complete.

Printed Name: _____ Title: _____ Date: _____

Signature: _____ Phone Number: _____

NOTE: *This document must be certified in accordance with 18 AAC 50.345(j)*

To submit this report:

1. Department's Air Online Services using the Permittee Portal option:
   http://dec.alaska.gov/applications/air/airtoolsweb
   If submitted online, report must be submitted by an authorized E-Signer for the stationary source.
   Or
2. Fax to: 907-451-2187
   Or
3. Email to: DEC.AQ.Airreports@alaska.gov
   Or
4. Mail to: ADEC
   Air Permits Program
   610 University Avenue
   Fairbanks, AK 99709-3643
   Or
5. Phone Notifications: 907-451-5173
   Phone notifications require a written follow-up report.

[18 AAC 50.346(b)(3)]

Section 14. Emission Inventory Form

Detailed instructions are available at the Department's Air Online Services (AOS): http://dec.alaska.gov/Applications/Air/airtoolsweb/PointSourceEmissionInventory by clicking the "Emission Inventory Instructions" button.

ADEC Reporting Form **Emission Inventory Reporting** State of Alaska Department of Environmental Conservation Division of Air Quality	**Emission Inventory Year- [ ]**

Mandatory information is highlighted in bright yellow. Make additional copies as needed.

Stationary Source Detail		
Inventory Start Date		
Inventory End Date		
ADEC ID or Permit Number		
EPA ID		
Census Area/Community		
Facility Name		
Facility Physical Location	**Address**	
	City, State, Zip Code	
	Latitude	**Longitude**
	Legal Description:	
Owner Name		
Owner Address		
Owner contact number		
Mailing Contact Information	**Address**	
	City, State, Zip Code	
Line of Business (NAICS)		
Facility Status		

Emissions Unit Data			
Specifications			
ID		Design Capacity	
Description			
Emissions Unit Status			
Manufacturer		Manufactured Year	
Model Number		Serial Number	
Regulations			
Regulation/Description			

Control Equipment (List All if applicable)			
ID			
System Description			
Equipment Type(s)			
Manufacturer			
Model			
Control Efficiency (%):			
Capture Efficiency (%)			
Pollutants Controlled		Reduction Efficiency (%)	
		Reduction Efficiency (%)	

Processes			
Process			
SCC Code			
Material Processed			
Period Start			
Period End			
Throughput (units):			
Summer %			
Fall %			
Winter %			
Spring %			
Operational Schedule			
Days/Week			
Hours/Day			
Weeks/Year			
Hours/Year			
Fuel Characteristics			
Heat Content	Elem. Sulfur Content (%)	H2S Sulfur Content	Ash Content (if applicable)
Heating			
Heat Input		Heat Output	Heat Values Convention

Emission Operating Type					
Pollutant	**Emission Factor**	**EF Numerator**	**EF Denominator**	**Emission Calculation Method**	**Tons**
Carbon Monoxide (CO)					
Nitrogen Oxides (NOx)					
PM10 Primary (PM10-PRI)					
PM2.5 Filterable (PM25-FIL)[8]					
PM Condensable (PM-CON)[9]					
Sulfur Dioxide (SO_2)					
NH3 (Ammonia)					
Lead and lead compounds					
Volatile Organic Compounds (VOC)					
Emissions' Release Point					
Release Point ID					
Apportion%					

[8] Report $PM_{2.5}$ filterable and PM condensable portions of the $PM_{2.5}$ Primary emissions, as applicable, in accordance with Federal Regulation 40 CFR 51.15(a)(1)(vi). Refer to EPA's May 2017 "Emissions Inventory Guidance for Implementation of Ozone and Particulate Matter National Ambient Air Quality Standards (NAAQS) and Regional Haze Regulations" (see Section 4.2.1) for guidance on the reporting of $PM_{2.5}$ filterable and condensable emissions.

[9] Please note on the inventory form if there is no available emission factor that can be used for an applicable condensable PM. For example, EPA AP-42 Table 3.3-1 does not contain a condensable PM emission factor for diesel engines smaller than 600 hp.

Process	Secondary Process (if applicable)
SCC Code	(ex. 20100201)
Material Processed	
Period Start	
Period End	
Throughput (units):	
Summer %	
Fall %	
Winter %	
Spring %	
Operational Schedule	
Days/Week	
Hours/Day	
Weeks/Year	
Hours/Year	

Fuel Characteristics

Heat Content	Elem. Sulfur Content	H2S Sulfur Content	Ash Content (if applicable)

Heating

Heat Input	Heat Output	Heat Values Convention

Emissions Operating Type:

Pollutant	Emission Factor	EF Numerator	EF Denominator	Emission Calculation Method	Tons
Carbon Monoxide (CO)					
Nitrogen Oxides (NOx)					
PM10 Primary (PM10-PRI)					
PM2.5 Primary (PM25-PRI)					
Sulfur Dioxide (SO2)					
Lead and Lead Compounds					
NH3 (Ammonia)					
Volatile Organic Compounds (VOC)					

Emissions' Release Point			
Release Point ID			
Apportion%			

Stack Detail (Release Point)	
> Specifications	
ID	
Type	
Description	
Stack Status	
> Stack Parameters	
Stack Height (ft)	
Stack Diameter (ft)	
Exit Gas Temp (F)	
Exit Gas Velocity (fps)	
Exit Gas Flow Rate (acfm)	
> Geographic Coordinate	
Latitude	
Longitude	
Datum	
Accuracy (meters)	
Base Elevation (meters)	

Certification:

Based on information and belief formed after reasonable inquiry, I certify that the statements and information in and attached to this document are true, accurate, and complete.

Printed Name:_____Title_____Date _____

Signature:_____ Phone number_____

NOTE: *This document must be certified in accordance with 18 AAC 50.345(j)*

To submit this report:

1. Electronically using the Air Online Services (AOS) Permittee Portal at http://dec.alaska.gov/Applications/Air/airtoolsweb/.

Or

2. Fax this form to: 907-269-7508

Or

3. E-mail to: DEC.AQ.airreports@alaska.gov

Or

4. Mail to: ADEC
   Air Permits Program
   ATTN: Emissions Inventory
   555 Cordova Street
   Anchorage, Alaska 99501

[18 AAC 50.346(b)(9)]