

GOP-009 Boiler Greater than or Equal to 10 MMBTU/hr and Less than 50 MMBTU/hr

Note: The system will log you out after 15 minutes of inactivity. If entering a large amount of data, please click on the Save button periodically to save data and reset the 15 minute timer. From the Certification page, you can use the menu on the left-hand side of the page to return to this screen and add additional data if necessary.

Section B: Reason for Applying

Click one of the following buttons to confirm that the proposed equipment meets the requirements of GOP-009:

- ☒ A single boiler currently Not Permitted in a facility's approved Title V Operating Permit, greater than or equal to 10 MMBTU/hr and less than 50 MMBTU/hr
- ☐ A single boiler currently Permitted in a facility's approved Title V Operating Permit, greater than or equal to 10 MMBTU/hr and less than 50 MMBTU/hr, that is a modification for the installation of a replacement burner or fuel switch to a cleaner fuel burner combusting natural gas

Section C: Inventories

Note: The Applicant does not need to complete the NJID fields but must fill out all required facility designations and descriptions. Required fields are indicated by an asterisk (*).

The Applicant may review the current list of Equipment (E) Numbers, Emission Unit (U) Numbers and Emission Point (PT) Numbers on record for the Facility and input a unique Number. If these fields are left blank, the Department will automatically assign the next available number.

Equipment Inventory

E NJID #	*Facility Designation	*Installation Date (mm/dd/yyyy)	Last Mod. Date (mm/dd/yyyy)	Equipment Type	*Equipment Make	*Equipment Manufacturer	*Equipment Model	*Max. Rated Heat Input (MMBTU/hr (HHV))	*Boiler Type
				Boiler					

Review Equipment

Boiler Usage

Is the Boiler using (check all that apply):

- ☐ Low NOx Burner Type:
- ☐ Staged Air Combustion
- ☐ Flue Gas Recirculation Amount: %

*Fuel Type

Select the Fuel Type associated with this piece of equipment from the options below:

Emission Point Inventory

PT NJID #	*Facility Designation	*Configuration	^*PT Equiv. Diam. (in.)	*Stack Height (ft.)	*Distance to Property Line (ft.)	*Exhaust Temp. (deg. F)	*Exhaust Vol. (acfm)	*Discharge Direction

Review Emission Points

^PT Equivalent Diameter Calculator

Use the calculator below to determine the PT Equivalent Diameter in the table above based on length and width measurements:

Length (in.)	Width (in.)	PT Equivalent Diameter (in.)
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Section D: Potential To Emit

PTE Calculations

PLEASE ENTER THE 'MAX. NATURAL GAS USAGE (MMSCF/YR)'. THE 'HOURS/YEAR NATURAL GAS' IS CALCULATED AUTOMATICALLY BASED ON THE 'MAX. NATURAL GAS USAGE (MMSCF/YR)' VALUE ENTERED, 'HEATING VALUE NATURAL GAS (BTU/SCF)' AND 'MAX. RATED HEAT INPUT (MMBTU/HR (HHV))'.

Max. Rated Heat Input (MMBTU/hr (HHV))	*Max. Natural Gas Usage (MMSCF/yr)	Hours/Year Natural Gas	Heating Value Natural Gas (BTU/scf)
		0	1020

PTE Calculation Results

THE 'EMISSION LIMITS' IN THIS TABLE ARE CALCULATED AUTOMATICALLY BASED ON 'EMISSION FACTORS (SOTA and USEPA AP-42)', 'MAX. RATED HEAT INPUT (MMBTU/HR (HHV))' AND 'MAX. NATURAL GAS USAGE (MMSCF/YR)' OPERATION.

Air Contaminant	VOC (lb/MMBTU)	NOx (lb/MMBTU)	CO (lb/MMBTU)	SO2 (lb/MMSCF)	TSP (lb/MMSCF)	PM-10 (lb/MMSCF)	PM-2.5 (lb/MMSCF)
Emission Factors	0.005	0.035	0.05	0.6	7.6	7.6	7.6

Emission Limits	VOC	NOx	CO	SO2 ¹	TSP	PM-10	PM-2.5
Pounds/Hour (lb/hr)	0.000	0.000	0.000	D	0.000	0.000	0.000
Tons/Year (tpy)	0.000	0.000	0.000	D	0.000	0.000	0.000

¹The 'D' in the lb/hr and tpy emission limits means the value is "de minimis." "De minimis" emissions are below the reporting threshold of 0.05 lb/hr in Appendix to N.J.A.C. 7:27-22.

HAPs	HAPs (Total)	Formaldehyde	Arsenic	Cadmium	Cobalt	7,12-Dimethyl benz(a) anthracene	Nickel
Emission Factors (lb/MMSCF)	N/A	0.075	0.0002	0.0011	0.000084	0.000016	0.0021
Reporting Threshold (tpy)	N/A	0.00175	0.000005	0.000005	0.0000025	0.00000035	0.0003

Emission Limits	**HAPs (Total)	Formaldehyde	Arsenic	Cadmium	Cobalt	7,12-Dimethyl benz(a) anthracene	Nickel
Pounds/Hour (lb/hr)	N/A	--	--	--	--	--	--
Tons/Year (tpy)	0.0000	--	--	--	--	--	--

**Only HAPs (Total) emissions above the Reporting Threshold (tpy) will be calculated.

Section E: Permitting Options

Note: This General Operating Permit covers a single Boiler.

The table below lists the appropriate Permitting Options based upon 'Max. Rated Heat Input' and 'Fuel Type' in Section C. The appropriate option will be selected once the corresponding values in the tables above are entered/selected.

Selected	Permitting Option	Description
GOP-009-1	A 'Fuel Totalizer' is required to monitor and record the total amount of fuel burned each month during operation, for any 12 consecutive months.	'Natural Gas Only', based on a maximum annual fuel limit.
GOP-009-2	A 'Fuel Totalizer' is required to monitor and record the total amount of fuel burned each month during operation, for any 12 consecutive months.	'Natural Gas with No. 2 Fuel Oil Emergency Only', based on a maximum annual fuel limit.