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For DAQ Use Only

## Form SS-PER-008-04: Flare Worksheet

Please see instructions on page 3 before filling out the form.

Supplemental	Information

IDENTI	FICATION				
IDENTIFICATION					
1. Source Name:	2. Source ID No.:				
3. Brief description of project:					
SPECIFICATIONS					
4. Manufacturer:					
5. Model No.:					
6. Serial No.:					
7. Date of manufacture:					
8. Flare type (check all that apply): ☐ Ground ☐ Elevated ☐ Open ☐ Partially enclosed ☐ Enclosed					
9. Emergency flare:  Yes  No					
10. Mixing method: ☐ Steam injected ☐ Compressed air ☐ Fuel gas ☐ Other (specify):					
11. Maximum design heat rate (in Btu/hr):					
12. Rated control efficiency (%): Pollutant controlled:					
13. Flare gas type:					
Higher heat value of flare gas (Btu / ft <sup>3</sup> ):	Maximum flare gas flow rate (ft <sup>3</sup> /hr):				
Flare gas fuel flow meter: ☐ Yes ☐ No	Sulfur content of flare gas (gr/100 ft <sup>3</sup> ):				
14. Pilot type: ☐ Intermittent ☐ Continuous ☐ Automatic Ignition System (flow sensing) ☐ Heat Sensing Ignition System					
Type of pilot gas fuel: ☐ Natural gas ☐ LPG/propane ☐ Methane ☐ Other (specify):					
Pilot fuel consumption (ft <sup>3</sup> /hr):	Pilot gas fuel flow meter: ☐ Yes ☐ No				
Sulfur content of pilot gas: (gr/100 ft <sup>3</sup> ):					
15. Emission unit(s) or source(s) of emissions vented to the flare:					
16. Flare tip height: ft above grade					
Flared gas temperature (°F):	Flared gas flow rate (ft <sup>3</sup> /min):				
Flare height if different from tip height (ft):	Flare diameter (ft):				
17. Maximum rated emissions concentrations (circle unit of measure: ppm, lb/hr, or lb/MMBtu):					
NO <sub>x</sub> SO <sub>2</sub> CO	PM/PM <sub>10</sub> VOC				
18. Source for emissions factor: ☐ Manufacturer's specifications ☐ Emissions source test ☐ AP-42 ☐ Other (specify):					

19. Gas stream composition:			
COMPONENT	VOL %, MOLE % or WEIGHT % (circle the one that applies)		

Attach manufacturer's specification sheet(s) for the flare. Include flare emissions in the PTE calculation.

All information above this line is required for this form to be considered complete. Duplicate sheet as needed.

The information in this section guides you to other forms that may have to accompany this worksheet.

- For emission control equipment, use the appropriate CONTROL EQUIPMENT form (Baghouse: SS-PER-008-01, Particulate
  Control Equipment: SS-PER-008-05, Scrubber: SS-PER-008-06) and duplicate as needed. Be sure to indicate the emission
  unit that the control equipment is affecting.
- Use the Engine form (SS-PER-007-03) if not operating on grid power and/or if there is an engine on-site.

## Form Instructions

Before filling out this worksheet, locate the **Supplemental Information** box at the top right.

- If submitting this worksheet with a permit application, do not check the box.
- If submitting this worksheet without a permit application, or in response to a DAQ request for supplemental/requested information, check the box.
- 1. Provide the source name as it appears on the application. If a permit already exists for this operation, the source name should match the name on the permit.
- 2. If the source is existing and already has a permit, provide the number as it appears on the permit. Otherwise, enter "New."
- 3. Provide a brief description of the proposed project as it appears on the permit application. Indicate whether the flare is being proposed as a new control device or being modified. If it is being modified, briefly describe the proposed changes.

## **USE ATTACHMENT IF ADDITIONAL SPACE IS REQUIRED.**

- 4–7. Specify the manufacturer, model number, serial number, and manufacture date of the flare.
- Specify the type of flare used.
- 9. Specify whether or not the flare is an emergency flare.
- 10. Specify the primary mixing method for the flare.
- 11. Specify the maximum design heat rate in Btu per hour.
- 12. Specify the rated control efficiency of the pollutant(s) involved and the target pollutants controlled by the flare.
- 13. Specify the primary fuel type of the flare gas higher heat value; the flow rate of the flare gas; whether the flare gas has a flow meter, and the sulfur content of the flare gas.
- 14. Specify the flare pilot type, the pilot fuel type, the consumption rate of the pilot fuel, whether the pilot fuel has a flow meter, and the sulfur content of the pilot gas.
- 15. Specify the emission units controlled by the flare.
- 16. Specify the height of the flare tip above grade; the temperature of the flared gas; the flow rate of the flared gas; the flow ra
- 17. Specify the maximum rated emissions concentrations for each pollutant from flare. Choose the units used for reporting emissions: parts per million, pounds per hour, or pounds per million Btu.
- 18. Specify the emissions factor source for #19.
- 19. List the components of the gas stream and each one's volume, mole, or weight percentage. (Circle the one applies.)