



Missouri Department of

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NATURAL RESOURCES

Eric R. Greitens, Governor

Carol S. Comer, Director

SEP 19 2017

Mr. Graham W. Bacon
Executive Vice President
Enterprise Refined Products Company LLC - Cape Girardeau Terminal
10653 State Highway N
Scott City, MO 63780

RE: New Source Review Temporary Permit Request - Project Number: 2017-08-041

Installation ID Number: 201-0018

Temporary Permit Number: **092017-006**

Expiration Date: January 1, 2018

Dear Mr. Bacon:

The Missouri Department of Natural Resources' Air Pollution Control Program has completed a review of your request to construct and temporarily operate (12) 18,768 gallon horizontal frac tanks that will be used to store denatured ethanol and one portable flare at Enterprise Refined Products Company LLC's Cape Girardeau Terminal, located in Scott City, Missouri. The Air Pollution Control Program is hereby granting your request to construct and operate these sources temporarily at this location in accordance with Missouri State Rule 10 CSR 10-6.060(3).

The Cape Girardeau Terminal will be taking internal floating roof Tank 1909 (reported under EP-1) containing denatured ethanol (ethanol denatured with up to 5% gasoline) out of service to conduct its scheduled 653 inspection. While Tank 1909 is offline, Enterprise Refined Products Company LLC is requesting to construct and temporarily operate 12 horizontal frac tanks which will contain denatured ethanol and will vent to a portable flare. The combined maximum denatured ethanol throughput of the 12 temporary frac tanks shall not exceed 8,100,000 gallons. Uncontrolled emissions from the frac tanks were determined to be 7.49 tons of VOC using TANKS 4.0.9d.

Enterprise Refined Products Company LLC has indicated that they will control emissions from the frac tanks using a portable nonsmoking flare. As uncontrolled VOC emissions from the frac tanks are less than 100 tons, a flare is not required to be operated. Operation of the flare results in emissions of VOC, CO, and NO_x; therefore, worst-case HAP emissions for the project are based on no flare usage while worst-case VOC, CO, and NO_x emissions are based on flare usage. Maximum propane combustion by the temporary flare shall not exceed 400,000 gallons. VOC,



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CO, and NO_x emissions were determined using emission factors obtained from AP-42 Section 13.5 “Industrial Flares” (December 2016). The flare is a nonsmoking flare; therefore, AP-42 Section 13.5 indicates that no particulates will be emitted.

Potential emissions, available in Table 1, are based on a maximum denatured ethanol throughput of 8,100,000 gallons and a maximum flare pilot gas combustion of 400,000 gallons of propane and are less than 100 tons per year for each pollutant as required by 10 CSR 10-6.060(3).

Table 1: Project PTE

Pollutant	Permitting Threshold¹ (tons)	Existing Potential Emissions² (tons per year)	Project PTE (tons) Scenario 1 – Tanks Uncontrolled, Flare not Operated	Project PTE (tons) Scenario 2 – Tanks Controlled by Flare
PM	100	N/D	N/A	N/A
PM ₁₀	100	0.15	N/A	N/A
PM _{2.5}	100	0.15	N/A	N/A
SO _x	100	0.14	N/A	N/A
NO _x	100	2.17	N/A	1.24
VOC	100	86.99	7.49	12.10
CO	100	0.47	N/A	5.65
HAPs	100	6.48	0.12	<0.01
Toluene (108-88-3)	100	2.04	0.06	<0.01
Benzene (71-43-2)	100	1.36	0.03	<0.01
Xylene (1330-20-7)	100	0.97	0.01	<0.01
Hexane (110-54-3)	100	0.27	0.01	<0.01

The Cape Girardeau Terminal shall not:

1. Exceed a denatured ethanol throughput from all 12 temporary frac tanks combined of 8,100,000 gallons.
2. Combust propane in excess of 400,000 gallons in the temporary flare.

The Cape Girardeau Terminal shall maintain the following records:

1. The monthly and project total amount of denatured ethanol put through the 12 temporary storage tanks (gallons).
2. The monthly and project total amount of propane combusted by the flare (gallons).

¹ 10 CSR 10-6.060(3).

² Obtained from the installation’s current Intermediate Operating Permit OP2014-017.

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The Cape Girardeau Terminal is required to include all of the denatured ethanol put through the 12 temporary storage tanks in their 550,000,000 gallons per year gasoline and denatured ethanol combined loading limit in Permit Condition PW002 of Intermediate Operating Permit OP2014-017.

The Cape Girardeau Terminal is required to notify the Air Pollution Control Program's Construction Permit Unit if either of the following occurs:

- Denatured ethanol put through the 12 storage tanks exceeds 8,100,000 gallons.
- Propane combustion by the flare exceeds 400,000 gallons.

You are still obligated to meet all applicable air pollution control rules, Department of Natural Resources' rules, or any other applicable federal, state, or local agency regulations.

A copy of this letter should be kept with the units and be made available to Department of Natural Resources' personnel upon verbal request. If you have any questions regarding this determination, please do not hesitate to contact Alana Hess at the departments' Air Pollution Control Program, P.O. Box 176, Jefferson City, MO 65102 or by telephone at (573) 75 1-4817. Thank you for your time and attention to this matter.

Sincerely,

AIR POLLUTION CONTROL PROGRAM



Kyra L. Moore
Director

KLM:ahj

c: PAMS File: 2017-08-041
Southeast Regional Office