

Emission Sources - Maximum Allowable Emission Rates

Permit Number 20601

This table lists the maximum allowable emission rates and all sources of air contaminants on the applicant's property covered by this permit. The emission rates shown are those derived from information submitted as part of the application for permit and are the maximum rates allowed for these facilities, sources, and related activities. Any proposed increase in emission rates may require an application for a modification of the facilities covered by this permit.

Air Contaminants Data

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs /hour	TPY (4)
CS2	Primary Boiler	VOC	0.04	0.19
		CO	0.65	2.84
		NO _x	0.77	3.38
		SO ₂	0.01	0.02
		PM	0.06	0.26
		PM ₁₀	0.06	0.26
		PM _{2.5}	0.06	0.26
CS3	K52 Hot Oil Unit	VOC	0.04	0.18
		CO	0.62	2.72
		NO _x	0.74	3.24
		SO ₂	0.01	0.02
		PM	0.06	0.25
		PM ₁₀	0.06	0.25
		PM _{2.5}	0.06	0.25
CS4	K57/K58 Hot Oil Unit	VOC	0.06	0.27
		CO	0.96	4.19
		NO _x	1.14	4.99
		SO ₂	0.01	0.03
		PM	0.09	0.38
		PM ₁₀	0.09	0.38
		PM _{2.5}	0.09	0.38
CS5	K54 Hot Oil Unit	VOC	0.08	0.34
		CO	1.18	5.17
		NO _x	1.41	6.16
		SO ₂	0.01	0.04

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		PM	0.11	0.47
		PM ₁₀	0.11	0.47
		PM _{2.5}	0.11	0.47
CS6	Emergency Generator No.1 (5) (75 HP)	VOC	0.19	0.05
		CO	0.50	0.13
		NO _x	2.33	0.58
		SO ₂	0.15	0.04
		PM	0.17	0.04
		PM ₁₀	0.17	0.04
		PM _{2.5}	0.17	0.04
CS7	Emergency Generator No. 2 (5) (375 HP)	VOC	0.93	0.23
		CO	2.51	0.63
		NO _x	11.63	2.91
		SO ₂	0.77	0.19
		PM	0.83	0.21
		PM ₁₀	0.83	0.21
		PM _{2.5}	0.83	0.21
CS9	Fire Pump No. 1 (South)	VOC	0.54	0.14
		CO	1.47	0.37
		NO _x	6.82	1.71
		SO ₂	0.45	0.11
		PM	0.48	0.12
		PM ₁₀	0.48	0.12
		PM _{2.5}	0.48	0.12
CS10	Fire Pump No. 2 (North)	VOC	0.54	0.14
		CO	1.47	0.37
		NO _x	6.82	1.71
		SO ₂	0.45	0.11
		PM	0.48	0.12

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		PM ₁₀	0.48	0.12
		PM _{2.5}	0.48	0.12
D1	Distillate Oil Tank No. 1	VOC	<0.01	<0.01
D2	Distillate Oil Tank No. 2	VOC	<0.01	<0.01
E5	Thermal Oxidizer	VOC	0.44	0.47
		CO	0.70	3.04
		NO _x	0.83	3.62
		SO ₂	0.01	0.02
		PM	0.06	0.28
		PM ₁₀	0.06	0.28
		PM _{2.5}	0.06	0.28
E5	Blend Tank No. 2 ST-6211	VOC	<0.01 (6)	<0.01 (6)
	PA Melt Storage Tank ST-6214	VOC	<0.01 (6)	<0.01 (6)
	Styrene Storage Tank ST-6215	VOC	<0.01 (6)	<0.01 (6)
	PA Melt Storage Tank ST-6515	VOC	0.01 (6)	0.01 (6)
E6	Carbon Adsorption System (7)	VOC	0.14	0.02
6210	Glycerin Tank No. 1	VOC	0.01	0.01
6211	Blend Tank No. 2 6211	PM	0.01	0.04
		PM ₁₀	0.01	0.04
		PM _{2.5}	0.01	0.04
6217	Neopentyl Glycol Tank	VOC	0.02	0.01
6501	Dipropylene Glycol Tank	VOC	0.08	0.01
6503	Ethylene Glycol Tank	VOC	0.05	0.01
6507	Tall Oil Fatty Acid Tank	VOC	0.01	0.01
6513	Propylene Glycol Tank	VOC	0.05	0.01
6514	Diethylene Glycol Tank	VOC	0.01	0.01

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F1	Fugitive Equipment Leaks (8)	VOC	6.02	26.20
EPLOAD	Loading	VOC	9.07	1.63
		PM	0.42	0.17
		PM ₁₀	0.20	0.08
		PM _{2.5}	0.03	0.01
FL1	PA Flake Hopper Loading (9)	PM	0.01	0.01
		PM ₁₀	0.01	0.01
		PM _{2.5}	0.01	0.01

- (1) Emission point identification - either specific equipment designation or emission point number from plot plan.
- (2) Specific point source name. For fugitive sources, use area name or fugitive source name.
- (3) VOC - volatile organic compounds as defined in Title 30 Texas Administrative Code § 101.1
 NO_x - total oxides of nitrogen
 SO₂ - sulfur dioxide
 PM - total particulate matter, suspended in the atmosphere, including PM₁₀ and PM_{2.5}, as represented
 PM₁₀ - total particulate matter equal to or less than 10 microns in diameter, including PM_{2.5}, as represented
 PM_{2.5} - particulate matter equal to or less than 2.5 microns in diameter
 CO - carbon monoxide
 HAP- hazardous air pollutant as listed in § 112(b) of the Federal Clear Air Act or Title 40 Code of Federal Regulations Part 63, Subpart C
- (4) Compliance with annual emission limits (tons per year) is based on a rolling 12-month period.
- (5) The operations of each generator are limited to a maximum of 500 hour per year for emergency use only.
- (6) VOC emissions represented from this tank are routed to the Thermal Oxidizer (EPN E5) and are represented in its authorized VOC emission rates. ST-6211 is a process blend tank, also listed separately as an EPN source of PM.
- (7) The carbon adsorption system shall be used during periods when the thermal oxidizer is out of service, not to exceed 224 hours/year.
- (8) Emission rate is an estimate and is enforceable through compliance with the applicable special condition(s) and permit application representations.
- (9) Existing particulate emissions are attributable to loading solid PA flake to the feed hopper upstream of the melter.

Date: December 19, 2019