Emission Sources - Maximum Allowable Emission Rates

Permit Number 24711

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 (1)	Source Name (2)	Air Contaminant (3)	Emission Rates	
			lbs/hour	TPY (4)
E-1	Tank Vent HCl Scrubber (6)	HCl	0.01	0.01
E-2 and E-3	Baghouse	(7)	0.19	0.83
E-4	Vent Scrubber NH_4Cl Stack (6)	HCl	0.53	1.40
		NH_3	0.37	0.85
		H_2SO_4	0.01	0.02
F-1	Fugitives (5)	HCl	0.03	0.14
		NH_3	0.05	0.23
		NH_4Cl	0.03	0.14
		$(NH_4)_2SO_4$	0.01	0.04
		H_2SO_4	0.01	0.06
B-2	Boiler	VOC	0.12	0.35
		NOx	2.10	6.31
		CO	1.76	5.30
		SO_2	0.01	0.04
		PM	0.16	0.48
		PM_{10}	0.16	0.48
		$PM_{2.5}$	0.16	0.48
T-1	Tank Vent	NH_4Cl	0.01	0.01
T-2	Tank Vent	NH_4Cl	0.01	0.01

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T-8	Tank Vent	NH_4Cl	0.01	0.01
T-10	Tank Vent	$(NH_4)_2SO_4$	0.01	0.01
T-14	Reactor Vent	NH_4Cl	0.01	0.01
T-15	Tank Vent	NH_4Cl	<0.01	<0.01
T-17	Tank Vent	VOC	0.01	0.01
		NH_3	0.01	0.01
T-19	Tank Vent	NH_4Cl	0.01	0.01
		NH_3	0.01	0.04
T-20	Tank Vent	NH_4Cl	0.01	0.01
		NH3	0.01	0.04
T-21	Tank Vent	NH_4Cl	0.01	0.01
		NH_3	0.02	0.02
T-22	Tank Vent	$(NH_4)_2SO_4$	<0.01	<0.01
T-23	H_2SO_4 Tank	H_2SO_4	0.01	0.01
T-24	Tank Vent	$(NH_4)_2SO_4$	0.01	0.01
T-25	Tank Vent	$(NH_4)_2SO_4$	0.01	0.01
Pit 1	Tank Vent	NH_4Cl	0.01	0.01
D-1	Parts Washer	VOC	0.25	0.25

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E-5	Lignin Dryer Scrubber Stack	VOC	0.05	0.22
		NOx	0.87	3.81
		CO	0.73	3.20
		SO_2	0.01	0.02
		PM	0.43	1.89
		PM_{10}	0.43	1.89
		$PM_{2.5}$	0.43	1.89
F-DRYER	Dryer Expansion Fugitive	VOC	0.01	0.02
BT-2010	Tank Vent	VOC	<0.01	0.01
BT-2011	Tank Vent	VOC	<0.01	0.01
FT-2018	Tank Vent	VOC	<0.01	0.01
MSS-RXN_TNKS	Tank Cleaning and Inspection	HCl	0.01	0.01
		NH_4Cl	0.01	0.01
		H_2SO_4	<0.01	<0.01
MSS-VACTRK	Vacuum Trucks	NH_4Cl	0.02	0.01
MSS-FUG	MSS Fugitives	NH_3	0.03	0.01
		HCl	0.06	0.01
		H_2SO_4	<0.01	<0.01
RMT-2014	Raw Material (Lignin) Tank	VOC	<0.01	0.01
RMT-2015	Raw Material (Lignin) Tank	VOC	<0.01	0.01
RW-2016	Raw Material (Lignin) Tank	VOC	<0.01	<0.01

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(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
SO_2 - sulfur dioxide
PM - total particulate matter, suspended in the atmosphere, including PM_{10} and $PM_{2.5}$
PM_{10} - particulate matter equal to or less than 10 microns in diameter, including $PM_{2.5}$
$PM_{2.5}$ - particulate matter equal to or less than 2.5 microns in diameter
CO - carbon monoxide
HCl - hydrogen chloride
H_2SO_4 - sulfuric acid
NH_4Cl - ammonium chloride
$(NH_4)_2SO_4$ - ammonium sulfate
NH_3 - anhydrous ammonia
(4) Compliance with annual emission limits (tons per year) is based on a 12 month rolling period.
(5) Emission rate is an estimate and is enforceable through compliance with the applicable special condition(s) and permit application representations.
(6) Planned maintenance, startup, and shutdown activities and emissions are included in this EPN.
(7) NH_4Cl or $(NH_4)_2SO_4$ depending on the product being made.

Date: December 7, 2018