Emission Sources - Maximum Allowable Emission Rates

Permit Numbers 123117 and PSDTX1460

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)
Turbine 1	Turbine 1 (5)	NO_x	5.42	25.80
		NO_X (MSS)	47.00	
		CO	6.60	38.78
		CO (MSS)	203.60	
		VOC	0.68	3.70
		VOC (MSS)	15.00	
		PM	6.98	30.58
		PM_{10}	6.98	30.58
		$PM_{2.5}$	6.98	30.58
		SO_2	0.07	0.31
		H_2SO_4	0.01	0.04
		NH_3	7.01	30.70
Turbine 2	Turbine 2 (5)	NO_x	5.42	25.80
		NO_X (MSS)	47.00	
		CO	6.60	38.78
		CO (MSS)	203.60	
		VOC	0.68	3.70
		VOC (MSS)	15.00	
		PM	6.98	30.58
		PM_{10}	6.98	30.58
		$PM_{2.5}$	6.98	30.58
		SO_2	0.07	0.31
		H_2SO_4	0.01	0.04
		NH_3	7.01	30.70
LUBE-VENT	Turbine 1 and 2 Lube Oil Vents	VOC	0.04	0.16
BLR1	Boiler 1 (5)	NO_x	4.17	18.59

Emission Sources - Maximum Allowable Emission Rates

		NO_X (MSS)	10.51	
		CO	15.22	66.65
		VOC	0.54	2.44
		VOC (MSS)	2.02	
		PM	1.95	8.53
		PM_{10}	1.95	8.53
		$PM_{2.5}$	1.95	8.53
		SO_2	0.05	0.20
		H_2SO_4	0.01	0.04
		NH_3	1.85	8.10
BLR2	Boiler 2 (5)	NO_x	4.17	18.59
		NO_X (MSS)	10.51	
		CO	15.22	66.65
		VOC	0.54	2.44
		VOC (MSS)	2.02	
		PM	1.95	8.53
		PM_{10}	1.95	8.53
		$PM_{2.5}$	1.95	8.53
		SO_2	0.05	0.20
		H_2SO_4	0.01	0.04
		NH_3	1.85	8.10
BLR3	Boiler 3 (5)	NO_x	4.17	18.59
		NO_X (MSS)	10.51	
		CO	15.22	66.65
		VOC	0.54	2.44
		VOC (MSS)	2.02	
		PM	1.95	8.53
		PM_{10}	1.95	8.53
		$PM_{2.5}$	1.95	8.53

Emission Sources - Maximum Allowable Emission Rates

		SO_2	0.05	0.20
		H_2SO_4	0.01	0.04
		NH_3	1.85	8.10
DP-HTR	Dew Point Heater (5)	NO_x	0.42	1.86
		CO	0.40	1.77
		VOC	0.20	0.88
		PM	0.03	0.13
		PM_{10}	0.03	0.13
		$PM_{2.5}$	0.03	0.13
		SO_2	0.01	0.01
CTWR1	Cooling Tower 1	PM	0.25	0.72
		PM_{10}	0.16	0.46
		$PM_{2.5}$	<0.01	<0.01
CTWR2	Cooling Tower 2	PM	0.25	0.72
		PM_{10}	0.16	0.46
		$PM_{2.5}$	<0.01	<0.01
EDG	Emergency Generator (5)	NO_x	2.21	0.11
		CO	11.47	0.57
		VOC	0.62	0.03
		PM	0.10	0.01
		PM_{10}	0.10	0.01
		$PM_{2.5}$	0.10	0.01
		SO_2	0.04	0.01
DTANK	Diesel Fuel Storage Tank	VOC	0.10	<0.01
LUBE-TANKS	Lube 1 & 2 Tanks	VOC	0.02	0.01
FUG-FUEL	Fuel Fugitives (6)	VOC	0.10	0.43
FUG-NH_3	Ammonia Fugitives (6)	NH_3	0.01	0.05

(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) NO_x - total oxides of nitrogen

Emission Sources - Maximum Allowable Emission Rates

CO	-	carbon monoxide
VOC	-	volatile organic compounds as defined in Title 30 Texas Administrative Code § 101.1
PM	-	total particulate matter, suspended in the atmosphere, including PM_{10} and $PM_{2.5}$
PM_{10}	-	total 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
SO_2	-	sulfur dioxide
H_2SO_4	-	sulfuric acid
NH_3	-	ammonia

(4) Compliance with annual emission limits (tons per year) is based on a 12 month rolling period.

(5) Planned maintenance, startup and shutdown (MSS) for all pollutants are authorized even if not specifically identified as MSS. During any clock hour that includes one or more minutes of planned MSS that pollutant's maximum hourly emission rate shall apply during that clock hour.

(6) Emission rate is an estimate and is enforceable through compliance with the applicable special condition(s) and permit application representations.

Date: February 10, 2017

Emission Sources - Maximum Allowable Emission Rates

Permit Number GHGPDTX135

This table lists the maximum allowable emission rates of greenhouse gas (GHG) emissions, as defined in Title 30 Texas Administrative Code § 101.1, for all sources of GHG air contaminants on the applicant's property that are authorized 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 authorized by this permit.

Air Contaminants Data

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
Turbine 1	Turbine 1	N_2O (5)	-	1
		CH_4 (5)	-	7
		CO_2 (5)	-	384,133
		CO_2e	-	384,530
Turbine 2	Turbine 2	N_2O (5)	-	1
		CH_4 (5)	-	7
		CO_2 (5)	-	384,133
		CO_2e	-	384,530
BLR1	Boiler 1	N_2O (5)	-	2
		CH_4 (5)	-	12
		CO_2 (5)	-	263,768
		CO_2e	-	264,791
BLR2	Boiler 2	N_2O (5)	-	2
		CH_4 (5)	-	12
		CO_2 (5)	-	263,768
		CO_2e	-	264,791
BLR3	Boiler 3	N_2O (5)	-	2
		CH_4 (5)	-	12
		CO_2 (5)	-	263,768
		CO_2e	-	264,791
DP-HTR	Dew Point Heater	N_2O (5)	-	<1
		CH_4 (5)	-	<1
		CO_2 (5)	-	2,048
		CO_2e	-	2,050

Emission Sources - Maximum Allowable Emission Rates

EDG	Emergency Generator	N_2O (5)	-	<1
		CH_4 (5)	-	<1
		CO_2 (5)	-	169
		CO_2e	-	169
FUG-FUEL	Fuel Fugitives	CH_4 (5)	-	20
		CO_2 (5)	-	<1
		CO_2e	-	498
FUG-SF_6	SF_6 Circuit Breakers	SF_6 (5)	-	<1
		CO_2e	-	102

(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) N_2O - nitrous oxide
CH_4 - methane
CO_2 - carbon dioxide
SF_6 - sulfur hexafluoride
CO_2e - carbon dioxide equivalents based on the following Global Warming Potentials (1/2015): CO_2 (1), N_2O (298), CH_4 (25), SF_6 (22,800).
(4) Compliance with annual emission limits (tons per year) is based on a 12 month rolling period. These rates include emissions from maintenance, startup, and shutdown.
(5) Emission rate is given for informational purposes only and does not constitute enforceable limit.

Date: February 10, 2017