

# EMISSION SOURCES - MAXIMUM ALLOWABLE EMISSION RATES

Permit Number 48455

This table lists the maximum allowable emission rates and all sources of air contaminants on the applicant's property covered by this permit. The emissions rates shown are those derived from information submitted as part of the application for permit and are the maximum rates allowed for these facilities. 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 *	
			lb/hr	TPY
5F	Bauxite Unloading (Marine Terminal) (4)	PM	165.00	173.33
		PM <sub>10</sub>	19.92	20.92
15B	Bauxite Supplemental Unloading Barge (4)	PM/PM <sub>10</sub>	3.00	6.57
15F	Bauxite Supplemental Unloading Bulkhead (4)	PM/PM <sub>10</sub>	3.00	6.57
12	Kiln 8 - ESP Stack	PM/PM <sub>10</sub>	9.76	33.01
		NO <sub>x</sub>	19.00	49.65
		CO	22.00	74.40
		SO <sub>2</sub>	0.23	0.78
		VOC	5.00	16.91
		Hg	0.0025	0.008
		HF	0.10	0.23
13	Facility 51 - Alumina Conveyor Baghouse	PM/PM <sub>10</sub>	1.63	7.14
14	Facility 51 - Alumina Conveyor Baghouse	PM/PM <sub>10</sub>	1.63	7.14
14F	Dock Conveyor (4)	PM	0.24	0.25
		PM <sub>10</sub>	0.11	0.12

## EMISSION SOURCES - MAXIMUM ALLOWABLE EMISSION RATES

## AIR CONTAMINANTS DATA

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates *	
			lb/hr	TPY
29	Kiln 9 - ESP Stack	PM/PM <sub>10</sub>	9.76	10.54
		NO <sub>x</sub>	9.64	10.41
		CO	22.00	23.76
		SO <sub>2</sub>	0.23	0.25
		VOC	5.00	5.40
		Hg	0.0025	0.003
30	South Railroad Track Baghouse Stack	PM/PM <sub>10</sub>	1.63	7.14
31	Alumina Ship Loader Conveyor Elevator Baghouse Stack	PM/PM <sub>10</sub>	1.29	5.64
32	Kiln 1- Hydrate Dryer - ESP Stack	PM/PM <sub>10</sub>	5.00	21.90
		NO <sub>x</sub>	1.00	4.38
		CO	0.50	2.19
		SO <sub>2</sub>	0.04	0.14
		VOC	2.20	4.69
		Hg	0.0008	0.003
34	Alumina Ship Loader Conveyor - Tunnel Baghouse Stack	PM/PM <sub>10</sub>	1.29	5.64
35	Alumina Ship Loader Conveyor - Tower Baghouse Stack	PM/PM <sub>10</sub>	1.20	5.26
53	Hydrate Loading Baghouse	PM/PM <sub>10</sub>	0.39	1.67
90F	90 Silo Fugitives (4)	PM/PM <sub>10</sub>	0.73	3.17
91F	Alumina Loading (4) (Marine Terminal)	PM/PM <sub>10</sub>	55.20	38.38
92	90 1-1 Silo Dust Collector	PM/PM <sub>10</sub>	0.43	1.88
93	90 2-1 Silo Dust Collector	PM/PM <sub>10</sub>	0.43	1.88
94	90 2-2 Silo Dust Collector	PM/PM <sub>10</sub>	0.43	1.88

## EMISSION SOURCES - MAXIMUM ALLOWABLE EMISSION RATES

## AIR CONTAMINANTS DATA

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates *	
			lb/hr	TPY
95	90 3-1 Silo Dust Collector	PM/PM <sub>10</sub>	0.43	1.88
96	90 3-2 Silo Dust Collector	PM/PM <sub>10</sub>	0.43	1.88
97	90 3-3 Silo Dust Collector	PM/PM <sub>10</sub>	0.43	1.88
98	90 3-4 Silo Dust Collector	PM/PM <sub>10</sub>	0.43	1.88
100A	Lime Silo 1 Vent Baghouse	PM/PM <sub>10</sub>	0.13	0.56
100B	Lime Silo 2 Vent Baghouse	PM/PM <sub>10</sub>	0.13	0.56
101	No. 1 Lime Slaker Baghouse	PM/PM <sub>10</sub>	0.13	0.56
102	No. 2 Lime Slaker Baghouse	PM/PM <sub>10</sub>	0.13	0.56
109	Belt Feeding Calciner No. 1 (4)(5)	PM/PM <sub>10</sub>	<0.01	<0.01
110	Belt Feeding Calciner No. 2 (4)(5)	PM/PM <sub>10</sub>	<0.01	<0.01
111	Scale Conveyor (4)(6)	PM/PM <sub>10</sub>	<0.01	<0.01
112	Conveyor Feeding Kiln No. 8 (4)(5)	PM/PM <sub>10</sub>	<0.01	<0.01
113	Conveyor Feeding Kiln No. 9 (4)(5)	PM/PM <sub>10</sub>	<0.01	<0.01

- (1) Emission point identification - either specific equipment designation or emission point number from a plot plan.
  - (2) Specific point source names. For fugitive sources, use an area name or fugitive source name.
  - (3) PM - particulate matter, suspended in the atmosphere, including PM<sub>10</sub>.  
PM<sub>10</sub> - particulate matter equal to or less than 10 microns in diameter.  
NO<sub>x</sub> - total oxides of nitrogen  
SO<sub>2</sub> - sulfur dioxide  
CO - carbon monoxide  
VOC - volatile organic compounds as defined in Title 30 Texas Administrative Code ' 101.1  
Hg - mercury  
HF - hydrogen fluoride
  - (4) Fugitive emissions are an estimate only.
  - (5) Minimal emissions due to 8 to 10 percent moisture in the material during normal operations.
  - (6) Minimal emissions because the material contains 10 to 15 percent free liquids entrained in the matrix.
- \* Refer to special conditions for throughput limitations and basis of emission rates.

Dated September 4, 2008