

# EMISSION SOURCES - MAXIMUM ALLOWABLE EMISSION RATES

Permit No. 20365/PSD-TX-785M-3

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. 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		Air Contaminant		<u>Emission Rates *</u>	
	Name (2)	Name (3)	lb/hr	TPY		
11	No. 2 Bleach Plant			ClO <sub>2</sub>	0.01	0.04
	ClO <sub>2</sub> Scrubber Stack					
70	No. 4 Bleach Plant			Cl <sub>2</sub>	1.60	7.00
	Scrubber Stack			ClO <sub>2</sub>	0.14	0.60
71	No. 4 Bleach Plant			Cl <sub>2</sub>	1.60	7.00
	Diffusion Washer Stack			ClO <sub>2</sub>	0.14	0.60
72	Monox-L Mixer Scrubber			Cl <sub>2</sub>	<0.01	<0.01
	Vent					
73	No. 5 Bleach Plant			VOC	2.33	10.20
	Diffusion Washer (E/O)					
	Stack					
74	No. 5 Bleach Plant			VOC	0.23	1.00
	Diffusion Washer (P)					
	Stack					
75	No. 5 Bleach Plant			VOC	2.33	10.20
	Scrubber Stack			ClO <sub>2</sub>	0.09	0.37
				Cl <sub>2</sub>	0.04	0.18
19	Bulk Starch Unloading			PM <sub>10</sub>	0.01	0.02
	Vent					
5a	No. 2 Smelt Dissolve			PM <sub>10</sub>	4.00	17.50
	Tank Vent			TRS	1.20	5.25
				SO <sub>2</sub>	5.00	21.90
5b	No. 3 Smelt Dissolve			PM <sub>10</sub>	4.00	17.50
	Tank Vent			TRS	1.20	5.25

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SO <sub>2</sub>	5.00	21.90
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Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	lb/hr	<u>Emission Rates *</u> TPY	
2	No. 2 Recovery Boiler Stack	PM <sub>10</sub>	60.00	262.80	
		VOC	8.00	35.00	
		NO <sub>x</sub>	62.78	275.00	
		SO <sub>2</sub>	495.00	1510.00	
		CO	251.37	1101.00	
		H <sub>2</sub> SO <sub>4</sub>	5.00	21.90	
		TRS	16.00	70.10	
3	No. 3 Recovery Boiler North Stack	PM <sub>10</sub>	38.90	168.19	
		VOC	4.00	17.50	
		NO <sub>x</sub>	30.00	131.40	
		SO <sub>2</sub>	39.38	172.50	
		CO	52.75	231.04	
		H <sub>2</sub> SO <sub>4</sub>	2.50	10.95	
		TRS	16.00	70.10	
4	No. 3 Recovery Boiler South Stack	PM <sub>10</sub>	38.40	168.19	
		VOC	4.00	17.50	
		NO <sub>x</sub>	30.00	131.40	
		SO <sub>2</sub>	39.38	172.50	
		CO	52.75	231.04	
		H <sub>2</sub> SO <sub>4</sub>	2.50	10.95	
		TRS	16.00	70.10	
26	No. 4 Recovery Boiler and Smelt Dissolve Tank Stack	PM <sub>10</sub>	50.00	219.00	
		VOC	16.60	72.83	
		NO <sub>x</sub>	159.30	697.91	
		SO <sub>2</sub>	121.90	534.17	
		CO	242.50	1062.03	
		H <sub>2</sub> SO <sub>4</sub>	2.40	10.05	

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		TRS	8.29	36.31
60	No. 1 NCG Incinerator** Stack	NO <sub>x</sub>	0.98	4.30
		SO <sub>2</sub>	4.50	19.71
		CO	0.46	2.00
		VOC	0.02	0.10
		TRS	0.09	0.40

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Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	lb/hr	Emission Rates * TPY
61	No. 2 NCG Incinerator Stack	NO <sub>x</sub>	0.98	4.30
		SO <sub>2</sub>	5.48	24.00
		CO	0.46	2.00
		VOC	0.02	0.10
		TRS	0.09	0.40
1	No. 1 Power Boiler Stack	PM <sub>10</sub>	1.14	5.01
		NO <sub>x</sub>	34.36	150.50
		SO <sub>2</sub>	0.14	0.60
		CO	9.14	40.03
		VOC	0.32	1.40
1	No. 2 Power Boiler Stack	PM <sub>10</sub>	55.00	240.90
		VOC	20.00	87.60
		NO <sub>x</sub>	268.00	1173.80
		SO <sub>2</sub>	2.30	10.10
		CO	190.00	832.20
50	No. 6 Power Boiler Stack	PM <sub>10</sub>	72.00	315.36
		NO <sub>x</sub>	190.40	823.00
		SO <sub>2</sub>	0.20	0.88
		CO	360.00	1555.00
		VOC	23.20	100.00
13	No. 4 Slaker Stack (4)	PM <sub>10</sub>	1.37	6.00

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14	No. 1 Slaker Stack (4)	PM <sub>10</sub>	1.37	6.00
15	No. 2 Slaker Stack (4)	PM <sub>10</sub>	1.37	6.00
16	No. 3 Slaker Stack (4)	PM <sub>10</sub>	1.37	6.00
16-A	No. 7 Slaker Stack (4)	PM <sub>10</sub>	1.37	6.00
43	No. 1 Lime Kiln Stack	PM <sub>10</sub>	10.00	43.80
		VOC	0.07	0.30
		NO <sub>x</sub>	48.00	206.00
		SO <sub>2</sub>	11.40	49.00
		CO	170.00	729.00
		TRS	1.76	7.70

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Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	lb/hr	Emission Rates * TPY
8	No. 2 Lime Kiln Stack	PM <sub>10</sub>	7.20	31.01
		VOC	0.06	0.26
		NO <sub>x</sub>	23.39	107.44
		SO <sub>2</sub>	12.00	52.20
		CO	175.00	766.50
		TRS	1.85	8.14
9	No. 3 Lime Kiln Stack	PM <sub>10</sub>	7.23	31.01
		VOC	0.07	0.31
		NO <sub>x</sub>	27.39	119.96
		SO <sub>2</sub>	12.50	54.80
		CO	180.00	788.40
		TRS	1.89	8.27
7	No. 4 Lime Kiln Stack	PM <sub>10</sub>	6.92	30.29
		VOC	8.01	35.10
		NO <sub>x</sub>	29.77	130.40
		SO <sub>2</sub>	7.14	31.28
		CO	36.23	158.70
		TRS	0.95	4.16

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48	Fresh Lime Handling (4)	PM <sub>10</sub>	0.07	0.30
	System, including:			
48a	Fresh Lime Silo No. 1 Vent Filter			
48b	Fugitive Dust Pickup Filter			
48c	Fresh Lime Silo No. 4 Vent Filter			
90	No. 5 Paper Machine	PM <sub>10</sub>	0.06	0.27
	Vents	NO <sub>x</sub>	3.19	13.97
		SO <sub>2</sub>	0.01	0.03
		CO	0.49	2.16
		VOC	0.02	0.08
1F	Road Dust (4)	TSP	-	21.66
		PM <sub>10</sub>	-	10.83
F100/101	Effluent Treatment System (4)	VOC	-	5.72

(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) TSP - particulate matter including PM<sub>10</sub>.

PM<sub>10</sub> - particulate matter less than 10 microns

VOC - volatile organic compounds as defined in General Rule 101.1

NO<sub>x</sub> - total oxides of nitrogen

SO<sub>2</sub> - sulfur dioxide

CO - carbon monoxide

TRS - total reduced sulfur

Cl<sub>2</sub> - chlorine

ClO<sub>2</sub> - chlorine dioxide

H<sub>2</sub>SO<sub>4</sub> - sulfuric acid

(4) Fugitive emissions are an estimate only and should not be considered as a maximum allowable emission rate.

\* Emission rates are based on and the facilities are limited by the following maximum operating schedule:

- Based on a maximum 12-month calendar year average throughput 2,400 tons per day of bleached air dry pulp.

EMISSION SOURCES - MAXIMUM ALLOWABLE EMISSION RATES

- Hrs/day 24 Days/week 7 Weeks/year 52 or Hrs/year 8,760

\*\* NCG Incinerator maximum allowable emission rates are effective after the Incinerator is relocated.

Revised \_\_\_\_\_