



WHEELABRATOR NORTH ANDOVER A WIN-WASTE INNOVATIONS COMPANY DRAFT - COMPLIANCE SUMMARY REPORT



Date 2/17/24

Plant Wheelabrator North Andover

NOTE: Emission & Process results may change after Startup, Shutdown, Malfunction data validation

Unit Unit 1
Source Outlet

Date	Hour	On-Line Minutes	O2		NOx		SO2					CO			Carbon Feed		FF Temp (deg F)		Steam KLbs/Hr		
			Out Vol % Dry	Status	Outlet ppm 7%O2	Status	Outlet ppm 7%O2	Status	Inlet ppm 7%O2	Status	Removal	Status	Outlet ppm 7%O2	Status	4 Hr Block	Status	Lbs/Hr Avg.	8 Hr Block	1 Hr Avg.	4 Hr Block	1 Hr Avg.
2/17/2024	0	60	10.7		142		17		15		0		0			13		310		169.6	
2/17/2024	1	60	10.5		140		17		7		0		1			13		309		169.6	
2/17/2024	2	60	10.5		142		15		6		0		0			13		309		169.6	
2/17/2024	3	60	10.5		140		18		9		0		1	1		13		310	310	169.6	169.6
2/17/2024	4	60	10.6		143		22		6		0		2			13		309		169.6	
2/17/2024	5	60	10.6		143		17		3		0		2			13		309		169.6	
2/17/2024	6	60	10.5		137		6		0		0		1			13		309		169.6	
2/17/2024	7	60	10.5		141		6		1		0		1	1		13	13	309	309	169.6	169.6
2/17/2024	8	60	11.1		137		3		0		0		2			13		308		169.6	
2/17/2024	9	60	11.1		141		4		0		0		2			13		310		169.6	
2/17/2024	10	60	10.8		141		8		1		0		2			13		310		169.6	
2/17/2024	11	60	10.6		142		18		1		0		1	2		13		310	309	169.6	169.6
2/17/2024	12	60	10.9		141		14		2		0		2			13		309		169.6	
2/17/2024	13	60	10.1		147		13		1		0		19			13		310		169.6	
2/17/2024	14	60	10.7		132		13		2		0		1			13		309		169.6	
2/17/2024	15	60	10.5		146		12		2		0		34	14		13	13	309	309	169.6	169.6
2/17/2024	16	60	10.0		135		6		1		0		1			13		309		169.6	
2/17/2024	17	60	10.0		141		10		2		0		0			13		310		169.6	
2/17/2024	18	60	10.5		139		12		4		0		0			13		309		169.6	
2/17/2024	19	60	10.4		141		22		12		0		0	1		13		309	309	169.6	169.6
2/17/2024	20	60	10.3		140		16		7		0		0			13		309		169.6	
2/17/2024	21	60	10.3		141		12		5		0		0			13		309		169.6	
2/17/2024	22	60	10.4		140		17		6		0		0			13		310		169.6	
2/17/2024	23	60	10.4		140		17		6		0		2	1		13	13	309	309	169.6	169.6

Average: Geometric Mean Average:	141	12	OR	0	see above	see above	see above	see above
Limit:	≤ 150 24-HR Block Avg.	≤ 29 24-HR Geometric Mean		≥ 80% Removal Efficiency	≤ 69 4-HR Block Average	≥ 12 8-HR. Block Average	≤ 345 °F 4-HR Block Average	≤ 173 4-HR Block Average

Status Flags

- I - Invalid
- B - Bad
- C - Calibration
- M - Maintenance
- F - Offline
- P - Purge
- T - Out of Control
- E - Excluded
- ^ - Startup
- * - Shutdown



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Unit Unit 2
Source Outlet

Date	Hour	On-Line Minutes	O2		NOx		SO2				CO			Carbon Feed		FF Temp (deg F)		Steam KLbs/Hr			
			Out Vol % Dry	Status	Outlet ppm 7%O2	Status	Outlet ppm 7%O2	Status	Inlet ppm 7%O2	Status	Removal	Status	Outlet ppm 7%O2	Status	4 Hr Block	Status	Lbs/Hr Avg.	8 Hr Block	1 Hr Avg.	4 Hr Block	1 Hr Avg.
2/17/2024	0	60	10.0		140		21		85		76		4			13		310		167.6	
2/17/2024	1	60	9.8		141		7		39		82		5			14		310		167.8	
2/17/2024	2	60	9.7		140		15		62		76		5			14		310		167.2	
2/17/2024	3	60	9.7		138		16		53		70		5	5		13		310	310	167.9	167.6
2/17/2024	4	60	9.8		138		18		53		66		4			13		310		166.5	
2/17/2024	5	60	9.8		138		13		46		72		4			13		310		167.7	
2/17/2024	6	60	9.6		139		1		7		82		4			14		310		167.3	
2/17/2024	7	60	9.6		142		1		13		95		5	4		15	14	310	310	166.9	167.1
2/17/2024	8	60	9.8		137		2		13		88		5			14		310		164.1	
2/17/2024	9	60	10.0		142		1		11		88		5			14		310		168.3	
2/17/2024	10	60	10.1		143		2		39		96		5			14		310		167.2	
2/17/2024	11	60	9.9		135		4		47		92		6	5		14		310	310	168.0	166.9
2/17/2024	12	60	9.8		140		3		46		94		6			14		309		167.3	
2/17/2024	13	60	9.6		140		4		50		91		5			14		310		167.4	
2/17/2024	14	60	9.8		139		7		51		87		4			14		310		167.0	
2/17/2024	15	60	9.9		141		6		48		88		4	5		13	14	310	310	167.2	167.2
2/17/2024	16	60	9.8		139		15		71		79		5			14		310		167.6	
2/17/2024	17	60	9.8		141		6		49		87		4			14		310		167.4	
2/17/2024	18	60	9.9		138		3		49		94		4			13		310		167.4	
2/17/2024	19	60	10.0		140		1		40		98		4	4		13		310	310	167.5	167.5
2/17/2024	20	60	9.9		139		3		52		94		5			13		310		167.5	
2/17/2024	21	60	10.0		140		3		45		93		4			14		310		167.3	
2/17/2024	22	60	10.1		140		4		49		92		6			14		310		167.9	
2/17/2024	23	60	10.1		138		7		57		88		7	5		13	14	310	310	168.0	167.7

Average: Geometric Mean Average:	139	4	89	OR	see above	see above	see above	see above
Limit:	≤ 150 24-HR Block Avg.	≤ 29 24-HR Geometric Mean	≥ 80% Removal Efficiency		≤ 69 ppmc 4-HR Block Average	≥ 12 lb/hr 8-HR. Block Average	≤ 345 °F 4-HR Block Average	≤ 173 klb/hr 4-HR Block Average

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WHEELABRATOR NORTH ANDOVER A WIN-WASTE INNOVATIONS COMPANY OPACITY REPORT



Date 17-Feb-2024

Plant Wheelabrator North Andover
Unit Unit 1
Source Outlet

Opacity is a measure of how much soot or smoke may be contained in stack emissions. The more smoke that is contained in the emissions the higher the level of opacity. Continuous opacity monitors located after all of the air pollution control equipment measure the opacity of the emissions from each boiler. Typically the human eye can not detect or see smoke that is less than 5% opacity. You won't see smoke from a modern trash-to-energy plant although in colder weather you will see water vapor condensation, similar to seeing your breath on a cold day. This is not considered opacity. We have a permit limit established by the Massachusetts Department of Environmental Protection of 10% opacity averaged every six (6) minutes.

Limit 10 %

Time (hr)	1-6 min	7-12 min	13-18 min	19-24 min	25-30 min	31-36 min	37-42 min	43-48 min	49-54 min	55-60 min	Average
0	0	0	0	0	0	0	0	0	0	0	0
1	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0	0
3	0	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0	0
5	0	0	0	0	0	0	0	0	0	0	0
6	0	IC	4	IC	0	0	0	0	0	0	1
7	0	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0	0
9	0	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0	0
11	0	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	0	0	0
13	0	0	0	0	0	0	0	0	0	0	0
14	0	0	0	0	0	0	0	0	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0	0
19	0	0	0	1	1	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0	0
21	0	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0	0
23	0	0	0	0	0	0	0	0	0	0	0

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Source Outlet

Opacity is a measure of how much soot or smoke may be contained in stack emissions. The more smoke that is contained in the emissions the higher the level of opacity. Continuous opacity monitors located after all of the air pollution control equipment measure the opacity of the emissions from each boiler. Typically the human eye can not detect or see smoke that is less than 5% opacity. You won't see smoke from a modern trash-to-energy plant although in colder weather you will see water vapor condensation, similar to seeing your breath on a cold day. This is not considered opacity. We have a permit limit established by the Massachusetts Department of Environmental Protection of 10% opacity averaged every six (6) minutes.

Limit 10 %

Time (hr)	1-6 min	7-12 min	13-18 min	19-24 min	25-30 min	31-36 min	37-42 min	43-48 min	49-54 min	55-60 min	Average
0	1	1	1	1	1	1	1	1	1	1	1
1	1	1	1	1	1	1	1	1	1	1	1
2	1	1	1	1	1	1	1	1	1	1	1
3	1	1	1	1	1	1	1	1	1	1	1
4	1	1	1	1	1	1	1	1	1	1	1
5	1	1	1	1	1	1	1	1	1	1	1
6	1	IC	5	IC	1	1	1	1	1	1	2
7	1	1	1	1	1	1	1	1	1	1	1
8	1	1	1	1	1	1	1	1	1	1	1
9	1	1	1	1	1	1	1	1	1	1	1
10	1	1	1	1	1	1	1	1	1	1	1
11	1	1	1	1	1	1	1	1	1	1	1
12	1	1	1	1	1	1	1	1	1	1	1
13	1	1	1	1	1	1	1	1	1	1	1
14	1	1	1	1	1	1	1	1	1	1	1
15	1	1	1	1	1	1	1	1	1	1	1
16	1	1	1	1	1	1	1	1	1	1	1
17	1	1	1	1	1	1	1	1	1	1	1
18	1	1	1	1	1	1	1	1	1	1	1
19	1	1	1	1	1	1	1	1	1	1	1
20	1	1	1	1	1	1	1	1	1	1	1
21	1	1	1	1	1	1	1	1	1	1	1
22	1	1	1	IB	1	1	1	1	1	1	1
23	1	1	1	1	1	1	1	1	IB	1	1

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