



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



Date 9/10/25

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.
9/10/2025	0	60	10.7		142		21		71		71		1			13		312		164.9	
9/10/2025	1	60	10.6		137		24		81		71		2			13		313		163.9	
9/10/2025	2	60	10.4		143		10		76		87		1			13		314		167.0	
9/10/2025	3	60	10.7		142		16		99		84		1	1		13		315	313	167.2	165.7
9/10/2025	4	60	11.1		124		0		45		100		1			13		314		168.0	
9/10/2025	5	60	11.6		133		0		36		100		2			13		314		164.1	
9/10/2025	6	60	11.3		136		0		37		100		3			13		315		157.3	
9/10/2025	7	60	10.7		143		3		65		96		1	2		13	13	314	314	166.9	164.1
9/10/2025	8	60	10.6		140		0		59		100		3			13		314		168.8	
9/10/2025	9	60	10.8		140		0		53		100		2			13		314		166.6	
9/10/2025	10	60	10.4		143		0		47		100		3			13		315		168.2	
9/10/2025	11	60	10.1		140		0		40		100		3	3		13		314	314	165.6	167.3
9/10/2025	12	60	10.8		137		0		45		100		2			13		314		168.2	
9/10/2025	13	60	10.9		139		0		54		100		2			12		315		166.9	
9/10/2025	14	60	10.7		142		2		61		97		1			13		315		169.2	
9/10/2025	15	60	10.4		141		0		46		100		3	2		13	13	314	314	167.0	167.8
9/10/2025	16	60	10.1		143		0		44		100		2			13		314		169.6	
9/10/2025	17	60	10.4		140		0		44		100		2			13		314		168.1	
9/10/2025	18	60	10.5		141		0		44		100		1			13		315		167.1	
9/10/2025	19	60	10.5		139		0		46		100		2	2		13		315	314	167.7	168.1
9/10/2025	20	60	10.7		139		0		49		100		2			13		314		167.5	
9/10/2025	21	60	11.1		136		0		37		100		2			13		314		164.9	
9/10/2025	22	60	10.6		142		0		46		100		2			13		315		164.3	
9/10/2025	23	60	10.6		140		0		41		100		1	2		13	13	314	314	168.6	166.3

Average:
Geometric Mean Average:

Limit:

139	0
≤ 150 24-HR Block Avg.	≤ 29 24-HR Geometric Mean

OR

100
≥ 80% Removal Efficiency

see above
≤ 69 ppmc 4-HR Block Average

see above
≥ 12 lb/hr 8-HR. Block Average

see above
≤ 345 °F 4-HR Block Average

see above
≤ 173 klb/hr 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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Date 9/10/25

Plant Wheelabrator North Andover

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

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.	4 Hr Block
9/10/2025	0	0	20.9	IF	3	IF	4	IF	0	IBF	0	IBF	0	IF		0		489		0.0		
9/10/2025	1	0	20.9	IF	3	IF	4	IF	0	IBF	0	IBF	0	IF		0		489		0.0		
9/10/2025	2	0	20.9	IF	3	IF	4	IF	0	IBF	0	IBF	0	IF		0		489		0.0		
9/10/2025	3	5	20.1	ICF	3	ICF	4	ICF	0	IBF	0	IBCF	1	ICF	1	ICF		489	489	0.0	0.0	
9/10/2025	4	11	17.5	IBCF	79	IBCF	61	IBCF	0	IBF	0	IBCF	570	IBCF		0		489		0.0		
9/10/2025	5	0	20.9	IF	3	IF	4	IF	145	IBCF	97	IBCF	0	IF		0		489		0.0		
9/10/2025	6	0	20.9	IF	3	IF	5	IF	0	IBF	0	IBF	0	IF		0		489		0.0		
9/10/2025	7	0	20.9	IF	3	IF	4	IF	0	IBF	0	IBF	0	IF	143	IBCF	0	0	489	489	0.0	0.0
9/10/2025	8	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		237		0.0		
9/10/2025	9	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	10	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	11	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF	0	IF	0	3	61	0.0	0.0	
9/10/2025	12	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	13	0	20.9	IF	5	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	14	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	15	0	20.9	IF	5	IF	4	IF	0	IBF	0	IBF	0	IF	0	IF	0	3	3	0.0	0.0	
9/10/2025	16	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	17	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	18	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	19	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF	0	IF	0	3	3	0.0	0.0	
9/10/2025	20	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	21	0	20.9	IF	4	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	22	0	20.9	IF	3	IF	4	IF	0	IBF	0	IBF	0	IF		0		3		0.0		
9/10/2025	23	0	20.9	IF	3	IF	4	IF	0	IBF	0	IBF	0	IF	0	IF	0	3	3	0.0	0.0	

Average:
Geometric Mean Average:

Limit:

7 IBCF
≤ 150 24-HR Block Avg.

OR

5 IBCF
≤ 29 24-HR Geometric Mean

0 IBCF
≥ 80% Removal Efficiency

see above
≤ 69 ppmc 4-HR Block Average

see above
≥ 12 lb/hr 8-HR. Block Average

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WHEELABRATOR NORTH ANDOVER A WIN-WASTE INNOVATIONS COMPANY OPACITY REPORT



Date 10-Sep-2025

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	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	2	IC	6	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	1	1	1	1	1	1	1	1
23	1	1	1	1	1	1	1	1	1	1	1

Status Flags

I - Invalid C - Calibration F - Offline T - Out of Control ^ - Startup
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WHEELABRATOR NORTH ANDOVER A WIN-WASTE INNOVATIONS COMPANY OPACITY REPORT



Date 10-Sep-2025

Plant Wheelabrator North Andover
Unit Unit 2
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	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2		
1	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	1	IF	1	IF	2	IF	1
2	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1
3	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1
4	1		1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1
5	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1	IF	1
6	2	ICF	23	ICF	1	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	4
7	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	1	IF	1	IF	1	IF	2	IF	2	IF	1
8	1	IF	2	IF	1	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	1
9	2	IF	1	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
10	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
11	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
12	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
13	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
14	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
15	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
16	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
17	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
18	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
19	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
20	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
21	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2
22	2	IF	1	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	1
23	2	IF	2	IF	2	IF	2	IF	2	IF	2	IF	1	IF	2	IF	2	IF	2	IF	2	IF	1

Status Flags

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