Madison Metropolitan Sewerage District

Sampling Highlights for Phase 4 (2024)

Posted October 2025

Find more information at madsewerpfasinitiative.org

NOTES

- J = estimated; when the value is below the level of detection and the established capabilities of the instrument, it is considered estimated.
- J+ = estimated with high bias.
- I = ion transition ratio did not meet acceptance limits
- <0.XX = non-detect. Value reported is at the detection limit

INFLUENT (INCOMING WASTEWATER)

This table shows the flow-weighted composite of all force main influent for PFOA and PFOS for each month sampled in 2024. A flow-weighted composite is a combined sample made up of influent from all force mains where the portion of the sample from each force main is proportional to the force main flow contribution.

	Jan 2024	Feb 2024	Mar 2024	April 2024	May 2024	June 2024	July 2024	Aug 2024	Sept 2024	Oct 2024	Nov 2024	Dec 2024	Mich. Influent Study
PFOA (ppt)	3.1	4.6	5.6	4.3	4.5	5.7J	6.1	4.9	4.0	5.3	7.0	4.9	4.6
PFOS (ppt)	2.8	6.6	7.8	<0.51	4.0	6.1J	8.1	<0.58	3.8	4.4	19	4.0	7.5

Michigan Influent Study data included for comparison.

EFFLUENT (OUTGOING WASTEWATER)

This table shows the effluent concentration for PFOA and PFOS for each month sampled in 2024. The effluent from the Nine Springs Wastewater Treatment Plant is discharged into waters that are not classified as a public water supply; therefore, the relevant PFOA surface water criterion is 95 ppt (or ng/L). The relevant criterion for PFOS is 8 ppt.

Surface water criteria criterion added to table for reference.

	01/24	02/24	03/24	03/24 Grab	04/24	04/24 Grab	05/24	05/24 Grab	06/24	06/24 Grab	07/24	07/24 Grab	08/24	08/24 Grab	09/24	10/24	11/24	12/24	Surface Water Criteria
PFOA (ppt)	6.5	8.4	7.7	7.5	7.2	6.5	7.7	8.2	10	9.3	9.4	9.1	8.3	8.3	6.6	7.7	9.2	6.5	95
PFOS (ppt)	3.4	3.4	3.8	3.2	4.8	4.9	4.1	3.6	5.8	5.6	7.3	7.2	6.1	5.9	3.6	3.8	17	3.6	8

BIOSOLIDS – CLASS A CAKE, 2022-2024

Table shows the Class A cake pile made in 2022, 2023, and 2024, showing data for each year that same pile was sampled over time

	2022		2023		2024	
Cake Pile (year generated)	**Range of PFOS+PFOA (ppb)**	**Median of PFOS+PFOA (ppb)**	**Range of PFOS+PFOA (ppb)**	**Median of PFOS+PFOA (ppb)**	**Range of PFOS+PFOA (ppb)**	**Median of PFOS+PFOA (ppb)**
2022 Class A Cake pile	11.4-45	38	6-29	18.1	35-51	43
2023 Class A Cake pile	-	-	2.7-23	15.1	20-66	29
2024 Class A Cake pile	-	-	-	-	20-32.6	29.5

BIOSOLIDS – CLASS A CAKE (2024 Pile)

This table shows results for the Class A cake pile made in 2024. The combined median was calculated based on the four sums of PFOA and PFOS from the four quarterly samples collected.

	May 2024	**June 2024**	**September 2024**	**December 2024**	**Combined Median of PFOS+PFOA**
PFOA (ppb)	23	19	6	17	-
PFOS (ppb)	9.6IJ	12	14IJ	11	-
Sum (PFOA + PFOS)	32.6	31	20	28	29.5

BIOSOLIDS – CLASS B METROGRO

This table shows results for the District's Class B biosolids, called Metrogro. The combined median was calculated based on the four sums of PFOA and PFOS from the four quarterly samples collected.

	March 2024	**June 2024**	**September 2024**	**December 2024**	**Combined median PFOA+PFOS**
PFOA (ppb)	1.4J	1.4J	<3.0	1.4J	
PFOS (ppb)	6.9	9.7	17	14IJ	
Sum (PFOA + PFOS)	8.3	11.1	17	15.4	13.3

For reference: Wisconsin Department of Natural Resources Interim Strategy For Land Application Of Biosolids And Industrial Sludges Containing PFAS, March 2024