

**2024 Consumer Confidence Report Data**  
**MAPLE BLUFF WATERWORKS, PWS ID: 11302346**

Este informe contiene información importante acerca de su agua potable. Haga que alguien lo traduzca para usted, o hable con alguien que lo entienda.

Dlaim ntawv tshaabzu nuav muaj lug tseemceeb heev nyob rua huv kws has txug cov dlej mej haus. Kuas ib tug paab txhais rua koj, los nrug ib tug kws paub lug thaam.

**General Water System Information**

If you would like to know more about the information contained in this report, please contact Public Works Water department at (608) 244-3048.

The **Village of Maple Bluff** primarily receives water from Well 7 and, to a lesser extent, Well 11. Similar to previous years, We have enclosed water quality data (inorganic and volatile organic test results) specific to these two wells. You will note that the tables show test results for some unregulated contaminants – hexavalent chromium, dioxane, and strontium, for example. Madison water utility continues to monitor these substances beyond state and federal requirements.

Madison Water Utility continues to routinely test all its drinking water wells for up to 30 PFAS (per- and polyfluoroalkyl substances). At least one PFAS was found in four Madison wells in 2024. All detections were below new federal Maximum Contaminant Levels and any Wisconsin health-based reference level. The enclosed PFAS data tables show all test results for Wells 7 and 11 between 2022 and 2024.

**Annual Water Quality Report**

***A SUMMARY OF WATER TESTING CONDUCTED IN 2024***

This annual report complies with federal and state drinking water rules, which require us to provide water quality information to our customers each year. Unless otherwise noted, results are based on testing conducted in 2024.

The rest of this report is what we receive directly from the City of Madison. The Village purchases all of its water through the City of Madison Water Utility department.

# MADISON WATER UTILITY

## Annual Water Quality Report

### A SUMMARY OF WATER TESTING CONDUCTED IN 2024

This annual report complies with federal and state drinking water rules, which require us to provide water quality information to our customers each year. Unless otherwise noted, results are based on testing conducted in 2024. **We are pleased to report that we continue to supply high-quality water that meets or exceeds all federal and state standards for health and safety. No violations of the Safe Drinking Water Act occurred in 2024. Test results are summarized inside this brochure.** Visit our website, [madisonwater.org](https://madisonwater.org), to learn more about our programs and projects.

### Quality & Reliability Since 1882

#### YOUR WATER SOURCE

Madison’s drinking water comes from a deep sandstone aquifer that sits hundreds of feet below the city. The water originates as rain or snow that slowly soaks into the ground and is filtered through layers of soil and rock. This natural filtration process produces excellent water for us to enjoy.

#### WHICH WELL SERVES MY ADDRESS?

The Madison water system consists of 20 active wells and over 920 miles of interconnected pipes. Most locations receive water from one to three wells. Our website has an application that can tell you which wells supply water to your home or business. There are links to detailed reports with the latest water quality test results. For more information, call the Water Utility or go to [madisonwater.org](https://madisonwater.org).

#### WHAT KEEPS OUR WATER SAFE?

The high-quality aquifer supplying our drinking water requires little treatment. Madison Water Utility disinfects the water with chlorine to reduce the risk of microbial contamination. A small amount of chlorine kills bacteria and viruses that can be present in groundwater. Chlorine also travels with the water and is ready to kill microbes that it might encounter in the system. Our goal is to maintain a chlorine residual above 0.1 milligrams per liter (mg/L) at all points in the distribution system. Typical levels range from 0.2 to 0.4 mg/L.

#### HOW ELSE IS MY WATER TREATED?

Fluoride is added to Madison drinking water to improve dental health and reduce tooth decay. The US Centers for Disease Control and Prevention (CDC) and Wisconsin Department of Health Services recommend maintaining an average fluoride level of 0.7 mg/L. Water from each well is tested daily to achieve this target. In 2024, the system-wide average of 6,638 tests was 0.68 mg/L.

To improve water clarity, three Madison wells have filters that remove more than 95% of the iron and manganese before it enters the piping system. These filters reduce the occurrence of rust-colored water at the customer tap. In 2025, a fourth iron-manganese filter will go on-line. Later this year, a PFAS-removal system will be operational at another well.

#### DO I NEED TO TAKE SPECIAL PRECAUTIONS?

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as those with cancer undergoing chemotherapy, persons who have undergone organ transplants,

people with HIV/AIDS or other immune system disorders, some elderly, and infants can be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. EPA/CDC guidelines on appropriate means to lessen the risk of infection by *Cryptosporidium* and other microbial contaminants are available from the Safe Drinking Water Hotline (**800-426-4791**) or EPA’s website [epa.gov/safewater](https://www.epa.gov/safewater).

*Cryptosporidium* and *Giardia*, organisms commonly linked to water-borne illness, are found primarily in surface waters such as lakes and rivers. Because Madison’s drinking water comes from a deep groundwater aquifer, these organisms do not pose a significant health risk in Madison tap water.

POTENTIAL CONTAMINANTS IN DRINKING WATER AND THEIR LIKELY SOURCES

Both tap water and bottled water come from rivers, lakes, streams, springs, and wells. As water travels over the surface of the land or through the ground, it dissolves naturally occurring minerals and, in some cases, radioactive material. The water can also pick up and transport substances resulting from the presence of animals or from human activity. These substances are also called contaminants.

Contaminants are any physical, chemical, biological, or radiological substance or matter in water. Contaminants that may be present in source water include:

- **Microbial contaminants**, such as viruses and bacteria, which may come from leaky sewer pipes, septic systems, agricultural livestock operations, and wildlife.
- **Inorganic contaminants**, such as salts, metals, minerals, and nutrients, which can occur naturally in the soil or groundwater or they may result from urban stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming.
- **Organic chemical contaminants**, including synthetic and volatile organic chemicals, which are by-products of industrial processes and petroleum production, and can also come from gas stations, urban stormwater runoff, and septic systems.
- **Pesticides and herbicides**, which may come from a variety of sources such as agriculture, urban stormwater runoff, and residential uses.
  - **Pesticide:** Generally, any substance or mixture of substances intended to prevent, destroy, repel, or mitigate any pest.
  - **Herbicide:** Any chemical(s) used to control undesirable vegetation.
- **Radioactive contaminants**, which can occur naturally in rock formations and groundwater or be the result of oil and gas production and mining.

To protect public health, the Environmental Protection Agency (EPA) prescribes regulations which limit the amount of certain contaminants in tap water provided by public water systems. Similarly, the Food and Drug Administration (FDA) regulations establish limits for contaminants in bottled water which must provide the same protection for public health. Routine testing helps to ensure that drinking water – tap and bottled – adhere to these regulatory limits.

MICROBIOLOGICAL TESTING

**Bacteria** – To ensure drinking water safety, routine bacteriological tests are conducted. Over 200 distribution samples are collected each month from representative locations. Samples are tested for coliform bacteria, indicators of potential contamination. In 2024, the Water Utility collected 3,103 routine distribution samples with a single sample testing positive for coliform bacteria. The low number of coliform positive samples reflects good source water quality and adequate disinfection maintained in the distribution system.

THE EPA ON DRINKING WATER CONTAMINANTS

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily mean that water poses a health risk. More information about contaminants and potential health effects can be obtained from the Environmental Protection Agency:

- Safe Drinking Water Hotline, **800-426-4791**
- EPA website, [epa.gov/safewater](https://www.epa.gov/safewater)

HOW TO READ THE WATER QUALITY DATA TABLE

The EPA and Wisconsin Department of Natural Resources (WDNR) establish the safe drinking water regulations that limit the amount of contaminants allowed in drinking water. The table shows the concentrations of detected substances in comparison to the regulatory limits. Substances not detected are not included in the table.

Maximum Contaminant Level (MCL)

The highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.

Maximum Contaminant Level Goal (MCLG)

The level of a contaminant in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety.

Action Level (AL)

The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a public water system shall follow.

Hazard Index (HI)

The Hazard Index is an approach that determines the health concerns associated with mixtures of certain PFAS in drinking water. Low levels of multiple PFAS that individually would not likely result in adverse health effects may pose health concerns when combined in a mixture. The Hazard Index MCL represents the maximum level for mixtures of PFHxS, PFNA, HFPO-DA, and/or PFBS allowed in water delivered by a public water system. A Hazard Index greater than 1 requires a system to take action.

Units in the Table

- o One milligram per liter (mg/L) equals one part per million (ppm)
- o One microgram per liter (µg/L) equals one part per billion (ppb)
- o One milligram per liter equals 1,000 micrograms per liter
- o One part per billion is equal to 1,000 parts per trillion (ppt)
- o One ppb is analogous to one second in 32 years
- o Picocurie per liter (pCi/L) is a measure of radioactivity
- o nd = not detected

**IMPORTANT NOTE ABOUT THE TABLE:** The table reports the maximum and minimum concentrations for each substance found in the water from at least one well. Several substances are found only in a few wells. Contaminant levels reported in the table may not be representative of the water quality at your home. Visit [madisonwater.org](https://www.madisonwater.org) or call **608-266-4654** to get more information about water quality for the well that serves your home or business.

LEAD AND COPPER

Madison’s landmark Lead Service Replacement Program helped our community remove or replace nearly 8,000 lead pipes between 1995 and 2011. Water quality tests conducted in 2023 (see table) continue to show that lead and copper corrosion has been minimized and test results from customer taps were all below action levels.

	Ideal Goal (MCLG)	Action Level (AL)	90th Percentile	Range	Samples Above AL
Lead (ppb)	zero	15	1.8	<0.5 – 5.8	0 of 50
Copper (ppb)	1300	1300	150	77 - 210	0 of 50

ADDITIONAL LEAD INFORMATION

Lead can cause serious health effects in people of all ages, especially pregnant people, infants (both formula- and breast-fed) and young children. Lead in drinking water is primarily from materials and parts used in service lines and in home plumbing. Madison Water Utility has removed all known lead service lines. The utility is responsible for providing high-quality drinking water but cannot control the variety of materials used in the plumbing in your home. Because lead levels may vary over time, lead exposure is possible even when your tap sampling results do not detect lead at one point in time.

You can help protect yourself and your family by identifying and removing lead materials within your home plumbing and taking steps to reduce your family’s risk. Using a filter, certified by an American National Standards Institute (ANSI) accredited certifier to reduce lead, is effective in reducing lead exposures. Follow instructions provided with the filter to ensure the filter is used properly. Use only cold water for drinking, cooking, and making baby formula. **Boiling water does not remove lead from water.**

Before using tap water for drinking, cooking, or making baby formula, flush your pipes for several minutes. You can do this by running your tap, taking a shower, doing laundry or a load of dishes. If you have a lead service line or galvanized requiring replacement service line, you may need to flush your pipes for a longer period. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available at <https://www.epa.gov/safewater/lead>.

If you are concerned about lead in your water and wish to have your water tested, contact a certified lab for lead testing information: **Public Health Madison & Dane County**, 608-266-4821; **WI State Laboratory of Hygiene**, 608-224-6202

LEAD TESTING WITHIN THE WATER SYSTEM

Corrosion of pipes, plumbing fittings, and fixtures may cause metals, including lead and copper, to enter drinking water. Rather than adding phosphorus-based chemicals to control corrosion, Madison Water Utility is committed to removing any newly discovered lead service line.

To assess corrosion of lead and copper, Madison Water Utility conducts tap sampling for lead and copper at selected sites [50] once every three years. Complete lead tap sampling data (from 2011 through 2023) is available on our website, [www.madisonwater.org/water-quality/lead-copper-in-water](http://www.madisonwater.org/water-quality/lead-copper-in-water).

WATER SERVICE LINE INVENTORY

To comply with the federal Lead and Copper Rule Revisions & Improvements, Madison Water Utility has developed an inventory of all water service lines in our system. The Utility has collected pipe material data for service lines based on permit records, water main tap cards, meter records, and maintenance, repair, and replacement work. As of December 31, 2024, there were no



known lead lines connected to the Madison water system. However, much of the service line pipe material data is based on historic records and, therefore, can present minor inaccuracies. As such, occasionally, previously unknown lead service lines may be newly discovered. The most up-to-date service line inventory can be accessed through the City of Madison Open Data Portal at:

- [madisonwater.org/water-quality/lead-copper-in-water/lead-service-line-inventory](https://madisonwater.org/water-quality/lead-copper-in-water/lead-service-line-inventory)

If you have a lead water service line, you may be eligible to receive a rebate covering half the cost of replacement up to \$3,000. Call our general administrative number at (608) 266-4651 or email [water@madisonwater.org](mailto:water@madisonwater.org) for more information.

PFAS TESTING

Madison wells are tested twice annually for up to 30 PFAS (per- and polyfluoroalkyl substances). The table summarizes the 2024 results – at least one PFAS was found in the water from four wells. US EPA now regulates six PFAS: PFOA, PFOS, PFBS, PFHxS, PFNA, and HPFO-DA (Gen-X). Water from all active Madison wells meets these new federal standards.

Source	PFAS	MCL	Range of Results
Well 6	PFHxS (ppt)	10	6.6-7.3
Well 9	PFBA (ppt)	--	36-47
Well 11	PFBA (ppt)	--	nd-4.0
Well 14	PFBA (ppt)	--	nd-3.2
Well 14	PFHxS (ppt)	10	3.7-4.8

PFAS are a large group of human-made chemicals widely used in industry and consumer goods. They are responsible for the waterproof, non-stick, and/or stain-resistant properties of many consumer products. PFAS do not break down in the environment and, because of their widespread use, they are commonly found in air, soil, and water as well as the blood of people and animals all over the world. PFAS get into groundwater from places that make or use PFAS, and the release from consumer products in landfills.

**Past Testing:** Over the last five years, regular testing has intermittently found PFAS at ten Madison wells. Except for PFBA and PFHxS at some wells [6, 9, 11, and 14], individual PFAS levels at a particular well are typically 2 parts per trillion (ppt) or lower – a level below which not every lab can reliably measure. Year-to-year variations in test results can stem from changing detection limits at a testing lab or the analytical method used. Each of the following PFAS was found at least once at one Madison well: PFBA, PFBS, PFPeA, PFPeS, PFHxA, PFHxS, PFHpA, PFOA, PFOS, and 6:2 FTS. Complete PFAS test results for 2020 through 2024 can be found on our website, [www.madisonwater.org](https://www.madisonwater.org).

Water Quality Data Table - Madison Water System as a Whole

2024 data unless otherwise noted

Substance Detected (units)	Ideal Goal (MCLG)	Highest Level Allowed (MCL)	Median Level Found	Range of Results	Violation (Yes/No)	Wells with Detections	Typical Source of Substance
Regulated Substances							
Atrazine (ppb) - 2023 data	3	3	non-detect	nd - 0.03	NO	11,13,14,16,25,29	Runoff from herbicide used on row crops
Barium (ppb)	2,000	2,000	21	7.2 - 69	NO	All wells	Erosion of natural deposits; Discharge from metal refineries
Chromium, Total (ppb)	100	100	non-detect	nd - 2.6	NO	11,14,20,25	Erosion of natural deposits; Discharge from steel and pulp mills
1,1-Dichloroethylene (ppb)	7	7	non-detect	nd - 0.2	NO	Well 18	Discharge from industrial chemical factories
1,2-Dichloroethylene, cis (ppb)	70	70	non-detect	nd - 0.5	NO	Wells 7 & 11	Discharge from industrial chemical factories; Biodegradation of PCE and TCE
Fluoride (ppm)	4	4	0.7	0.5 - 0.8	NO	All Wells	Erosion of natural deposits; Added to promote strong teeth
Nickel (ppb)	n/a	100	non-detect	nd - 2.5	NO	6,11,14,17,19,26,27,28	Erosion of natural deposits; Electroplating, stainless steel and alloy products
Nitrate (ppm)	10	10	0.9	nd - 4.1	NO	Thirteen wells	Fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
PFOA (ppt) - 2023 data	zero	4	non-detect	nd - 1.9	NO	6,7,9,11,13,14,16,26,27	Firefighting foam; Landfills, food packaging, clothing, fabrics, upholstery
PFOS (ppt) - 2023 data	zero	4	non-detect	nd - 1.6	NO	6,9,11,16,26	Firefighting foam; Landfills, food packaging, clothing, fabrics, upholstery
Selenium (ppb)	50	50	non-detect	nd - 1.5	NO	Wells 6, 9 and 14	Erosion of natural deposits; Petroleum and metal refineries
Tetrachloroethylene [PCE] (ppb)	zero	5	non-detect	nd - 3.1	NO	6,7,9,11,18	Discharge from factories, dry cleaners, and auto shops
Trichloroethylene [TCE] (ppb)	zero	5	non-detect	nd - 0.4	NO	Wells 7, 11 & 18	Discharge from metal degreasing sites, other factories
Radionuclides							
Gross Alpha (pCi/L) - 2023 data	zero	15	1.3	nd - 5.1	NO	7,19,24,28	Erosion of natural deposits
Radium, 226+228 (pCi/L)	zero	5	2.4	1.6 - 5.3	NO	7,19,24,27,28,30	Erosion of natural deposits
Disinfection By-Products (Distribution)							
Haloacetic Acids [HAA5] (ppb)	60	60	1.5	0.7 - 2.3	NO	n/a	By-product of drinking water chlorination
Total Trihalomethanes [TTHM] (ppb)	zero	80	5.5	0.5 - 10	NO	n/a	By-product of drinking water chlorination
Unregulated Substances							
Chromium, Hexavalent (ppb)	n/a	n/a	0.4	nd - 2.0	NO	Thirteen wells	Erosion of natural deposits; Chrome plating, leather tanning, wood preservation
1,1-Dichloroethane (ppb)	n/a	n/a	non-detect	nd - 0.1	NO	Well 9	Discharge from industrial chemical factories
1,4-Dioxane (ppb)	n/a	n/a	non-detect	nd - 0.4	NO	Wells 9, 11 & 18	Discharge from chemical factories; Cosmetics and detergents
Metolachlor (ppb) - 2023 data	n/a	n/a	non-detect	nd - 0.01	NO	Well 14	Runoff from herbicide used on row crops
Strontium (ppb)	n/a	n/a	82	49 - 100	NO	All Wells	Erosion of natural deposits
Trichlorofluoromethane (ppb)	n/a	n/a	non-detect	nd - 0.8	NO	Wells 9 & 11	Discharge from industrial chemical factories; Degreaser, propellant, refrigerant
Other Substances							
Aesthetic Goal							
Chloride (ppm)	250		16	1.6 - 210	NO	All Wells	Erosion of natural deposits; Road salt application
Iron (ppm)	0.3		non-detect	nd - 0.25	NO	7,17,19,24,27,28,30	Erosion of natural deposits
Manganese (ppb)	50		2.5	nd - 45	NO	Fourteen wells	Erosion of natural deposits
Silver (ppm) - 2023 data	0.1		non-detect	nd - 0.00	NO	Well 25	Discharge from industrial chemical factories
Sodium (ppm)	n/a		7.3	2.3 - 64	NO	All Wells	Erosion of natural deposits; Road salt application
Sulfate (ppm)	250		18	6.6 - 39	NO	All Wells	Erosion of natural deposits
Zinc (ppb)	5,000		3.8	nd - 8.8	NO	Sixteen wells	Erosion of natural deposits

PFAS [Perfluoroalkyl and Polyfluoroalkyl Substances]

PFAS	MCL	Range of Results	Source
PFBA (ppt)	--	36 - 47	Well 9
PFBA (ppt)	--	nd - 4.0	Well 11
PFBA (ppt)	--	nd - 3.2	Well 14
PFHxS (ppt)	10	6.6 - 7.3	Well 6
PFHxS (ppt)	10	3.7 - 4.8	Well 14

Over the last five years, regular testing has intermittently found PFAS at ten Madison wells. Except for PFBA and PFHxS at some wells [6, 9, 11, and 14], individual PFAS levels at a particular well are typically 2 parts per trillion (ppt) or lower - a level below which not every lab can reliably measure. Year-to-year variations in test results can stem from changing detection limits at a testing lab or the analytical method used. Each of the following PFAS was found at least once at one Madison well: PFBA, PFBS, PFPeA, PFPeS, PFHxA, PFHxS, PFHpA, PFOA, PFOS, and 6:2 FTS. Complete PFAS test results for 2020 through 2024 can be found on our website, [madisonwater.org](https://www.madisonwater.org).

INORGANIC CHEMICAL RESULTS - 2024

PARAMETER	Well 7	Well 11	UNITS <sup>1</sup>	EPA GUIDELINES			
				MCL <sup>2</sup>	MCLG <sup>3</sup>	SMCL <sup>4</sup>	HAL <sup>5</sup>
Antimony	ND	ND	ppb	6	6	--	--
Arsenic	ND	ND	ppb	10	0	--	--
Barium	35	21	ppb	2000	2000	--	--
Beryllium	ND	ND	ppb	4	4	--	--
Cadmium	ND	ND	ppb	5	5	--	--
Chloride	24	82	ppm	--	--	250	--
Chromium, Total	ND	2.0	ppb	100	100	--	--
Chromium, Hexavalent	ND	0.8	ppb	--	--	--	--
Fluoride	0.8	0.7	ppm	4	4	--	--
Iron	0.07	ND	ppm	--	--	0.3	--
Manganese	2.7	7.5	ppb	--	--	50	300
Mercury	ND	ND	ppb	2	2	--	--
Nickel	ND	1.2	ppb	100	--	--	--
Nitrate	ND	2.8	ppm	10	10	--	--
Nitrite	ND	ND	ppm	1	1	--	--
Radium (226+228)	2.5	1.3 (2020)	pCi/L	5	zero	--	--
Selenium	ND	ND	ppb	50	50	--	--
Silver	ND	ND	ppm	--	--	0.1	0.05
Sodium	10	27	ppm	--	--	--	--
Strontium	96	95	ppb	--	--	--	--
Sulfate	37	26	ppm	--	--	250	--
Thallium	ND	ND	ppb	2	0.5	--	--
Zinc	ND	4.0	ppb	--	--	5000	--

VOLATILE / SYNTHETIC ORGANIC COMPOUNDS - 2024

PARAMETER	Well 7	Well 11	UNITS <sup>1</sup>	EPA GUIDELINES	
				MCL <sup>2</sup>	MCLG <sup>3</sup>
Atrazine - 2023 data	ND	0.01	ppb	3	3
Bromodichloromethane*	0.7 - 1.5	ND	ppb	80	zero
Bromoform*	ND - 0.4	ND - 0.6	ppb	80	zero
Chloroform*	0.7 - 1.2	ND	ppb	80	--
Dibromochloromethane*	0.6 - 1.5	ND - 0.5	ppb	80	60
1,2-Dichloroethylene (cis)	ND - 0.4	0.2 - 0.5	ppb	70	70
1,4-Dioxane	ND	0.40	ppb	--	--
Tetrachloroethylene	1.0 - 1.3	0.7 - 0.9	ppb	5	zero
Trichloroethylene	ND - 0.2	ND - 0.2	ppb	5	zero
Trichlorofluoromethane	ND	0.5 - 0.8	ppb	--	--

<sup>1</sup> ppb = parts per billion = ug/l = micrograms per liter; ppm = parts per million = mg/l = milligrams per liter

<sup>2</sup> MCL - Maximum contaminant level = EPA's maximum allowable amount

<sup>3</sup> MCLG = Maximum contaminant level goal = EPA's public health goal

<sup>4</sup> SMCL = secondary maximum contaminant level; do not present health concerns but may pose aesthetic problems: taste, odor, or color

<sup>5</sup> HAL = Health Advisory Level = levels at which the contaminant presents a health risk

\* Disinfection By-Products

pCi/L = picocurie per liter; a measure of radioactivity

ND = not detected



Well 7 - PFAS Test Results, 2022 - 2024							
PFAS Compound	Sample Date						
	05/25/22	12/05/22	12/05/22	03/29/23	10/05/23	04/11/24	10/15/24
Perfluorooctanoic acid (PFOA)	<1.4	0.77 <sup>J</sup>	0.55 <sup>J</sup>	0.71	<4.0	<4.0	<1.9
Perfluorooctanesulfonic acid (PFOS)	<0.48	0.93 <sup>J</sup>	<0.53	<0.5	<4.0	<4.0	<1.9
Perfluorobutanoic acid (PFBA)	n/a	n/a	<0.5	n/a	5.0	<5.0	<1.9
Perfluoropentanoic acid (PFPeA)	n/a	n/a	<0.29	n/a	<5.0	<3.0	<1.9
Perfluorohexanoic acid (PFHxA)	<1.4	<0.62	<0.22	<0.5	3.0	<3.0	<1.9
Perfluoroheptanoic acid (PFHpA)	<1.4	<0.50	<0.41	<0.5	<3.0	<3.0	<1.9
Perfluorooctanesulfonamide (FOSA)	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Perfluorononanoic acid (PFNA)	<0.48	<0.48	<0.31	<0.4	4.0	<4.0	<1.9
Perfluorodecanoic acid (PFDA)	<0.48	0.27	0.20	<0.2	n/a	<3.0	<1.9
Perfluoroundecanoic acid (PFUdA)	<1.52	0.90	<0.72	<0.61	5.0	<2.0	<1.9
Perfluorododecanoic acid (PFDoA)	1.4	0.69	0.50	1.2	<3.0	<3.0	<1.9
Perfluorotridecanoic acid (PFTriDA)	<1.84	0.27	n/a	0.58	<6.5	<7.0	n/a
Perfluorotetradecanoic acid (PFTeDA)	<0.918	0.62	n/a	<0.63	<7.4	<8.0	n/a
Perfluoro-n-hexadecanoic acid (PFHxDA)	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Perfluoro-n-octadecanoic acid (PFODxA)	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Perfluorobutanesulfonic acid (PFBS)	<0.25	0.2	<0.06	<0.2	3.0	<3.0	<1.9
Perfluoropentane sulfonic acid (PFPeS)	n/a	n/a	<0.03	n/a	4.0	<4.0	<1.9
Perfluorohexanesulfonic acid (PFHxS)	0.959	0.91 <sup>J</sup>	0.95 <sup>J</sup>	1.0	<3.6	<3.0	<1.9
Perfluoroheptane sulfonic acid (PFHpS)	n/a	n/a	<0.78	n/a	1.0	<3.0	<1.9
Perfluorononane sulfonic acid (PFNS)	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Perfluorodecane sulfonic acid (PFDS)	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Perfluorododecanesulfonic acid (PFDoS)	n/a	n/a	n/a	n/a	n/a	n/a	n/a
N-Methyl perfluorooctane sulfonamide	n/a	n/a	n/a	n/a	n/a	n/a	n/a
N-Ethyl perfluorooctane sulfonamide	n/a	n/a	n/a	n/a	n/a	n/a	n/a
N-Methyl perfluorooctane sulfonamidoacetic acid	<0.918	0.59	n/a	0.60	5.6	<6.0	n/a
N-Ethyl perfluorooctane sulfonamidoacetic acid	0.918	<0.69	n/a	0.49	4.7	<5.0	n/a
N-Methyl perfluorooctane sulfonamidoethanol	n/a	n/a	n/a	n/a	n/a	n/a	n/a
N-Ethyl perfluorooctane sulfonamidoethanol	n/a	n/a	n/a	n/a	n/a	n/a	n/a
4:2 Fluorotelomer sulfonic acid	n/a	n/a	<0.5	n/a	3.0	<3.0	<1.9
6:2 Fluorotelomer sulfonic acid	n/a	n/a	3.5	n/a	<5.0	<5.0	<1.9
8:2 Fluorotelomer sulfonic acid	n/a	n/a	<0.25	n/a	<5.0	<5.0	<1.9
10:2 Fluorotelomer sulfonic acid	n/a	n/a	n/a	n/a	n/a	n/a	n/a
ADONA	<0.418	0.47	<0.42	0.47	5.0	<5.0	<1.9
F-53B Major	<0.075	0.04	<0.047	0.04	0.0	<2.0	<1.9
F-53B Minor	0.27	0.09	<0.49	<0.2	<5.0	<5.0	<1.9
HFPA-DA HFPO-DA GenX	<0.21	<0.4	<0.65	<0.09	8.0	<5.0	<1.9
NFDHA	n/a	n/a	<0.27	n/a	0.9	<20.0	<1.9
PFLSA	n/a	n/a	0.23	n/a	<3.0	<3.0	<1.9
PFMBA	n/a	n/a	0.25	n/a	5.0	<3.0	<1.9
PFMPA	n/a	n/a	0.21	n/a	4.0	<4.0	<1.9
PFOA+PFOS*	ND	1.7	0.6	0.7	ND	ND	ND
Combined PFAS*	1.0	2.6	1.5	1.7	ND	ND	ND

All results in ng/L or parts per trillion (ppt)  
Faded results with < indicate result was below detection limit  
Results with J indicate an estimated value due to being below reporting limit  
Varying results and levels of detection are due to differences in analytical methods and lab capabilities

\* - this is an estimate derived from the sum of estimated values  
n/a - not analyzed  
ND - none detected



