



Ann Arbor Charter Township Utilities Department

2024 Drinking Water Quality Report

Summary of Your Water from January 1 – December 31, 2024

A New Level of Excellence



Raising the bar is never easy, but the Ann Arbor Charter Township Utilities Department rises to the challenge year after year. Our experienced team continuously strives to improve, building on past achievements to deliver even better service. This report reflects the dedication and expertise of our staff in providing safe, reliable, and great-tasting water to our community.

This report offers a snapshot of the drinking water quality we provided in 2024. Inside, you'll find information about where your water comes from, what it contains, and how it measures up to Environmental Protection Agency (EPA) and state standards.

One of the most vital natural resources we often take for granted is the Huron River – the source of our drinking water and the foundation of life in our community. As stewards of this essential resource, we are proud to partner with the Huron River Watershed Council (HRWC) to protect and preserve it. Together, we work to ensure a sustainable, healthy water supply for today and future generations.

Our commitment to water quality is unwavering. While we are honored to be recognized for our great-tasting water, our top priority is delivering the highest quality water to every home and business in our service area. In collaboration with the City of Ann Arbor, our dedicated water professionals conduct more than 175,000 water quality tests each year to ensure compliance with – and often exceed – all state and federal drinking water standards.

Beyond testing, our team works tirelessly to maintain and improve our infrastructure. This includes a robust leak detection program, routine operation of primary valves, meter replacements to boost efficiency, and regular cross-connection inspections to prevent contamination.

We also go beyond regulatory requirements by participating in voluntary improvement programs and setting even stricter internal water quality goals. These efforts support not only public health but also sustainable economic development and a high quality of life in Ann Arbor Charter Township.

Thank you for taking the time to review this Drinking Water Quality Report. We are proud to serve you and remain committed to delivering safe, clean, and reliable water every day.

Sincerely,

Rick Judkins
Utilities Department Director



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Where Does Our Tap Water Come From?

Ann Arbor Charter Township receives its water supply from the City of Ann Arbor. The City of Ann Arbor's source water is comprised of both surface and ground water sources. About 85% of the water supply comes from the Huron River with the remaining 15% provided by multiple wells. The water from both the sources is blended at the water treatment plant. Since the City of Ann Arbor uses a surface water supply, the Huron River, USEPA and Michigan Department of Environmental Quality (DEQ) regulations require it to be treated, filtered, and disinfected to ensure that any harmful substances are removed. When the treatment is complete in the City of Ann Arbor, the water is pumped to Ann Arbor Charter Township, where we pump the water to homes, schools and businesses in Ann Arbor Charter Township and a portion of Superior Charter Township.



Do I Need to Take Any Special Precautions?

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as persons 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 and the Center for Disease Control guidelines on appropriate means to lessen the risk of infection by *Cryptosporidium* and other microbiological contaminants are available from the **Safe Water Drinking Hotline: (800) 426-4791**.



Source Water Assessment Program

Federal regulations require states to develop and implement Source Water Assessment Programs (SWAPs) to compile information about potential sources of contamination to their source water supplies. This information allows us to better protect our drinking water sources. In 2004, the State of Michigan performed a Source Water Assessment on Ann Arbor's system. To request a copy of the assessment, call (734) 794-6320.

The new SWAP provides a roadmap for source water management strategies that will be implemented over the coming years in collaboration with organizations such as the Huron River Watershed Council and nearby communities. Since Ann Arbor Township receives its water from the city, their SWAP applies to our system. If you have further questions about the city's SWAP, please visit the city's website at: <https://www.a2gov.org/water-treatment-plant/water-quality-data-and-education/source-water-protection/>

PUBLIC NOTICE

TO ANN ARBOR CHARTER TOWNSHIP PROPERTY OWNERS OR OCCUPANTS: If you experience an overflow or backup of the sewage disposal system or storm water system, you must file a written claim with Ann Arbor Charter Township within 45 days after the overflow or backup was discovered. Notice must be mailed to the Utilities Department Director at 3792 Pontiac Trail, Ann Arbor, Michigan 48105, (734) 663-3418. Failure to provide the required notice will prevent recovery of damages. Contact Ann Arbor Charter Township immediately upon discovery of an overflow or backup to obtain a claim form. While you do not need to use the Township's form to file a written claim, it should include your name and address, the address of the affected property, the dates of the overflow or backup, the date the backup or overflow was discovered, and a brief description of the overflow or backup.



HOW DO WE KEEP YOUR DRINKING WATER SAFE?

Over the years, Ann Arbor has invested in infrastructure to provide multiple lines of defense against contamination to produce high quality drinking water. For example, we use ozone, UV light, and chloramines to protect against microbial contamination; a softening process that can remove inorganic contaminants, radioactive contaminants, and particles; and a filtration process with granular activated carbon that can remove organic contaminants, pesticides, herbicides, particles, and microorganisms. We also monitor water quality parameters continuously before and after treatment to ensure our treatment processes are working successfully to produce high quality water. Not only do these treatment steps prove to be reliable year after year but we also have an exceptional group of employees who ensure safe, consistent water 24/7.

BEFORE TREATMENT, WHERE DOES THE WATER COME FROM?

Sources of drinking water include rivers, lakes, streams, ponds, reservoirs, springs, and wells (for both tap and bottled water). As water travels over the surface of the land or through the ground, it dissolves naturally occurring minerals and, in some cases, radioactive material or substances resulting from the presence of animals or from human activity. To ensure that tap water is safe to drink, U.S. EPA prescribes regulations that limit the levels of certain contaminants in the water provided by public water systems. The FDA regulations establish limits for contamination in bottled water which provide the same protection for public health. Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of these contaminants in water does not necessarily indicate that water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hotline at (800) 426-4791 or visiting www.epa.gov/safewater.

Contaminants that may be present in source water include:

- **Microbial contaminants**, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- **Inorganic contaminants**, such as salts and metals, which can be naturally occurring or result from urban stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming.
- **Pesticides and herbicides**, which may come from a variety of sources such as agriculture, urban stormwater runoff, and residential uses.
- **Radioactive contaminants**, which can be naturally occurring or be the result of oil and gas production and mining activities.
- **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.

Contaminants of Concern

Lead:

Lead can cause serious health effects in people of all ages, especially pregnant people, infants (both formula-fed and breastfed), and young children. Lead in drinking water is primarily from materials and parts used in service lines and home plumbing. Ann Arbor Township Utilities Department is responsible for providing high quality drinking water and removing lead pipes but cannot control the variety of materials used in 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 accredited certifier to reduce lead, is effective in reducing lead exposures. Follow the 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, and 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 at least 5 minutes to flush water from your home plumbing and service line. If you are concerned about lead in your water and wish to have your water tested, contact Ann Arbor Township Utilities Department at 734-663-8292 for available resources. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available at <http://www.epa.gov/safewater/lead>.

Cryptosporidium:

Cryptosporidium is a microbial pathogen found in surface water throughout the U.S. Although filtration removes *Cryptosporidium*, the most commonly-used filtration methods cannot guarantee 100% removal. Our monitoring indicates the presence of these organisms in our source water, but not in the finished water. Current test methods do not allow us to determine if the detected organisms in our source water are dead or if they are capable of causing disease. Ingestion of *Cryptosporidium* may cause cryptosporidiosis, an abdominal infection. Most healthy individuals can overcome the disease within a few weeks. Immunocompromised people, infants and small children, and the elderly are at greater risk of developing life-threatening illness and are encouraged to consult their doctor regarding appropriate precautions to take to avoid infection. *Cryptosporidium* must be ingested to cause disease, and it may be spread through means other than drinking water. To address the occurrence of *Cryptosporidium* in the Huron River, UV disinfection has been added to the water treatment process as of the summer of 2020 and is the best available technology to inactivate *Cryptosporidium*.

1,4-Dioxane:

Gelman Sciences (now Pall Corp., a division of Danaher Corp.) polluted groundwater in parts of Washtenaw County, including parts of the city as well as Ann Arbor and Scio Townships, when it improperly disposed of industrial solvents containing 1,4-dioxane between 1966 and 1986. That pollution has since spread through the surrounding groundwater. While cleanup of the site has been managed by the Michigan Department of Environment, Great Lakes, and Energy (EGLE) since the discovery of the contamination, local officials and stakeholders have advocated that the site be considered for federal assistance. The EPA completed a Site Assessment Report in November 2023, concluding that the site is a candidate for inclusion on the National Priorities List for high levels of 1,4-dioxane. Governor Whitmer signed a letter of concurrence in December 2023 transferring cleanup management to the EPA. As of December 2024, EPA was evaluating comments and generating a response.

Service Line Inventory Status

Year	# Lead Service Lines	Unknown Material Service Lines	Total Service Lines
2024	0	0	444

DEFINITIONS:

AL-Action Level: The concentration of a contaminant, which if exceeded, triggers treatment or other requirements a water system must follow.

GPG-Grains per Gallon: A unit of water hardness defined as 1 grain of calcium carbonate dissolved in 1 US gallon of water.

J: Estimated concentration above the method detection limit and below the reporting limit.

MCL-Maximum Contaminant Level: The level of a contaminant that is allowed in drinking water. They are set as close to the MCLG's as feasible.

MCLG-Maximum Contaminant Level Goal: The level of a contaminant in drinking water below which there is no known or expected risk to health.

MRDL-Maximum Residual Disinfectant Level: The highest level of disinfectant allowed in drinking water.

MRDLG-Maximum Residual Disinfectant Level Goal: The level of a drinking water disinfectant below which there is no known or expected risk to health.

n/a: not applicable

ND: Not detected

NTU-Nephelometric Turbidity Units: A measure of cloudiness of water

pCi/L: picocuries per liter (a measure of radioactivity)

ppm: parts per million or milligrams per liter - or one ounce in 7,350 gallons of water.

ppb: parts per billion or micrograms per liter - or one ounce in 7,350,000 gallons of water.

ppt: parts per trillion or micrograms per liter - or one ounce in 7,350,000,000 gallons of water.

TT-Treatment Technique: A required process intended to reduce the level of a contaminant in drinking water.

Ann Arbor Charter Township, in coordination with the City of Ann Arbor, ensures excellent water quality through regular monitoring for contaminants, federal and state standards, and conducting additional tests. This report covers all detected regulated drinking water parameters for 2024. Contaminants' presence does not always mean a health risk. The State of Michigan permits less frequent monitoring for some contaminants due to expected concentration stability. The data reflects water quality, though some may be over a year old if otherwise specified.

REGULATED CONTAMINANTS DETECTED

Parameter Detected	Your Water Results		Regulatory Requirements		Typical Source of Contamination
	Highest Level Detected	Results Range	EPA/EGLE Limit MCL, TT, or MRDL	EPA Goal MCLG or MRDLG	
Disinfection By-products, Disinfectant Residuals, and Disinfection Byproduct Precursors					
Bromate	5.0 ppb ¹	<1.0 – 12.0 ppb	10 ppb	0 ppb	By-product of ozone disinfection
Chloramines ²	2.5 ppm ¹	0.4 – 3.4 ppm	(MRDL) 4 ppm	(MRDLG) 4 ppm	Disinfectant added at water plant
Haloacetic Acids (HAA5) ^{2,3}	14 ppb ³	3.1 – 14 ppb	60 ppb	n/a	By-product of drinking water disinfection
Total Organic Carbon (TOC)	61.64% Removed ⁴	55.30% - 67.40% removed	(TT) 25% minimum removal	n/a	Naturally present in the environment
Total Trihalomethanes (TTHM) ^{2,3}	7.4 ppb ³	1.8 – 7.4 ppb	80 ppb	n/a	By-product of drinking water disinfection
Radioactive Contaminants (tested in 2020)					
Gross Alpha	3.75 ± 2.21 pCi/L	n/a	15 pCi/L	0 pCi/L	Erosion of natural deposits
Radium 226 & 228	2.0 ± 0.85 pCi/L	n/a	5 pCi/L	0 pCi/L	Erosion of natural deposits
Inorganic Contaminants					
Barium	<50 ppb	n/a	2000 ppb	2000 ppb	Erosion of natural deposits; Discharge of drilling wastes; Discharge of metal refineries
Fluoride	1.2 ppm	0.47 – 1.2 ppm	4 ppm	4 ppm	Erosion of natural deposits; water additive which promotes strong teeth; Discharge from fertilizer and aluminum factories
Nitrate	1.1 ppm	0.2 – 1.1 ppm	10 ppm	1 ppm	Run-off from fertilizer use; leaching from septic tanks & sewage; natural deposit
Nitrite	0.41 ppm	<0.10 – 0.410 ppm	1 ppm	1 ppm	Run-off from fertilizer use; leaching from septic tanks and sewage

¹ highest running annual average

² measured in the Distribution System

³ highest locational running annual average

⁴ average percent removal

REGULATED CONTAMINANTS DETECTED (continued)

Microbiological Contaminants					
Turbidity	0.44 NTU	99.995% of samples ≤0.3 NTU	1 NTU and 95% of samples ≤0.3 NTU	n/a	Naturally present in the environment
2024 Lead and Copper Results from Customer Faucets (Lead and Cooper are regulated by action levels)					
Parameter	Customer Taps 90 th Percentile	Customer Taps Range	Action Level	MCLG	Typical Source of Contamination
Copper – 2024	100 ppb	0-100 ppb	1,300 ppb	1,300 ppb	Corrosion of household plumbing systems; Erosion of natural deposits
Lead – 2024	1 ppb	0 – 2 ppb	15 ppb	0 ppb	Lead service lines, corrosion of household plumbing including fittings and fixtures; erosion of natural deposits

2024 SPECIAL MONITORING

Detected Contaminants	Your Water Results		Likely Source of Contamination
	Average Level Detected	Range	
1,4-Dioxane	<0.07 ppb	<0.07 ppb	Groundwater contamination from manufacturing process and landfills
N-Nitrosodimethylamine (NDMA)	<2.0 ppb	n/a	By-product of disinfection
Perchlorate	0.25 ppb ¹	n/a	Nitrate fertilizer runoff; contamination from industrial manufacturing process
Sodium	70 ppm	53 – 100 ppm	Erosion of natural deposits
Perfluorooctanoic Acid (PFOA), Perfluorohexane Sulfonic Acid (PFHxS), Hexafluoropropylene Oxide Dimer Acid (HFPO-DA), Perfluorononanoic Acid (PFNA), Perfluorobutane Sulfonic Acid (PFBS), Perfluorohexanic Acid (PFHxA) ¹	<2.0 ppt	<2.0 ppt	Firefighting foam; discharge and waste from industrial facilities; discharge from electroplating facilities; stain-resistant treatments
Perfluoropentanoic Acid (PFPeA) ²	<2.7 ppt	<2.9 – 4.7 ppt	
Perfluorobutanoic Acid (PFBA) ²	< 1.5 ppt	< 5.0 – 6.1 ppt	
Perfluorohexanic Acid (PFHxA) ²	<0.9 ppt	<2.9 – 3.5 ppt	

¹ PFAs samples analyzed for regulatory compliance by the EGLE approved method are included here. See a2gov.org/PFAS for more data.

² Results of the 2023 Unregulated Contaminant Monitoring are included here are available at a2gov.org/PFAS and are available upon request. Unregulated contaminants are those for which the United States EPA has not established drinking water standards. Monitoring helps the U.S. EPA determine where certain contaminants occur and whether regulation of those contaminants is needed.

OTHER WATER QUALITY PARAMETERS OF INTEREST

Parameter	Your Water Results	
	Average Level Detected	Range
Alkalinity, total as CaCO ₃	92.5 ppm	50 - 130 ppm
Aluminum ¹	<0.050 ppm	n/a
Ammonia as N	<0.10 ppm	<0.10–0.13 ppm
Arsenic	<2.2 ppb	n/a
Calcium	42.375 ppm	25 –51 ppm
Chloride	133.75 ppm	110 – 220 ppm
Chromium (total)	<5.0 ppm	n/a
Conductivity (units μmhos/cm)	656	539 – 731
Hardness (CaCO ₃)	135 ppm	90 – 216 ppm
	7.9 gpm	5.3 – 12.6 gpm
Iron	<0.20 ppm	n/a
Lead (at Water Treatment Plant tap)	<3.0 ppb	n/a

¹ Analyzed in 2023

Parameter	Your Water Results	
	Average Level Detected	Range
Magnesium	11 ppm	5 – 19 ppm
Manganese	<0.020 ppm	<0.020 ppm
Mercury	<0.20 ppb	n/a
Non-Carbonate Hardness	58 ppm	0 – 107 ppm
pH	9.3 S.U.	9.0 – 9.5 S.U.
Phosphorus, total	0.27 ppm	0.11-0.32 ppm
Potassium ¹	3.3 ppm	n/a
Sulfate	44.625 ppm	37 – 56 ppm
Temperature	16.1 °C	6.2 – 25.5 °C
Total Solids	369 ppm	350 – 420 ppm
Zinc	<10 ppb	n/a
Nitrite in distribution	0.026 ppm	<0.10 – 0.220 ppm



Stay Informed and Provide Input



The USEPA requires water utilities departments to provide certain information within this report. That information is generic and may or may not apply to the drinking water in Ann Arbor Charter Township. It is very important to us that this report is clear, easy to understand and provides information that our customers find useful. Therefore, your input is appreciated. If you have any comments or ideas, we will welcome them. You may contact us at (734) 663-3418 or email rjudkins@aatwp.org

PFAS

Per- and polyfluoroalkyl substances (PFAS), are a group of chemicals that have been classified by the EPA as an emerging contaminant. PFAS have been around since the 1950s, but we did not know much about their effects until the early 2000s when scientists began releasing data on PFAS health impacts and their persistence in the environment. For decades, they have been used in many industrial applications and consumer products such as carpeting, waterproof clothing, upholstery, food paper wrappings, fire-fighting foams, and metal plating. They are still widely used today. PFAS have been found at low levels both in the environment and in blood samples of the general U.S. population. PFAS are persistent, which means they do not break down in the environment. They also bioaccumulate, meaning the amount builds up over time in the blood and organs.

Currently, granular activated carbon (GAC) filtration is the best available technology for removing PFAS in drinking water. Use of this technology has allowed us to supply you with water with PFAS concentrations significantly below all Maximum Contaminant Levels (MCLs) adopted by the state of Michigan in 2020. On April 10, 2024, the US EPA proposed drinking water regulations for PFAs. We continue to meet all PFAS regulations in our finished drinking water. We continue to monitor both regulated PFAS compounds and unregulated PFAS compounds in source water and drinking water and remain committed to providing safe drinking water that is better quality than regulatory guidelines require. Samples collected by the Township are analyzed by an independent lab each month, with data available for review. We also continue to lobby at the state and federal level to hold polluters accountable and stop PFAS at its source. Measures like these better protect our source and help keep our water affordable.

Get Involved



The Utilities Director regularly attends the scheduled Board of Trustees meetings where the water system is occasionally discussed. The public is welcome and encouraged to attend to learn more about their water system or to discuss any concerns they may have.

The Ann Arbor Charter Township Board of Trustees meets on the third Monday of each month. The meetings are open to the public, and unless announced otherwise, are at 7:30 PM in the Ann Arbor Charter Township Hall located at 3792 Pontiac Trail or via Zoom video conferencing. Contact clerk@aatwp.org for more information.

Automatic Utility Bill Payment Program

Ann Arbor Charter Township is offering a convenient, new option to pay your sewer and/or water bills. Should you choose this option, no more writing checks for your quarterly utility payments!

If signed up, you will get your statement as before. Under this option, we debit the balance owed from your savings or checking account on the due date. If the due date falls on a weekend or holiday, your payment will be debited on the next business day. This is a routine banking process, and most people consider it safer than sending checks.

If interested in applying for this service, please e-mail treasurer@aatwp.org to receive an application form.

Additional Information and Contacts

To receive additional copies of this report or if you have any questions about this report or would like to know anything further about your water and/or water utilities, please feel free to call us:

Rick Judkins
Utilities Director
(734) 663-3418
rjudkins@aatwp.org

In the event of an emergency, such as water main breaks, emergency water turn-offs and sanitary or storm sewer back-ups, please call:

DURING NORMAL BUSINESS HOURS: (734) 663-3418

AFTER HOURS EMERGENCY: (734) 663-0995

<http://www.aatwp.org>