

Drinking Water Consumer Confidence Report for 2022

The TWIN CITY WATER DISTRICT has prepared the following report to provide information to you, the consumer, on the quality of our drinking water. Included within this report is general health information, water quality test results, how to participate in decisions concerning your drinking water and water system contacts. We were issued an unconditioned license to operate our water system in 2022.

Source Water Information

The well plant is located at 4194 Indian Hill Road, Uhrichsville. The facility has three wells capable of pumping approximately 2,250,000 gallons of water per day from a sand and gravel aquifer (water-rich zone) within the Tuscarawas River buried valley aquifer system (the system currently produces 1.150,000 gallons of water per day). The aquifer is covered by less than 10 feet of low-permeability material, which provides minimal protection from contamination. Depth to water in this aquifer is less than 10 feet below the ground surface. Soils in the area are sandy loams which are well-drained, meaning that much of the rainfall and snowmelt will infiltrate into the soil, instead of running off or ponding. The topography is generally flat. Ground water in this area is replenished by the gradual flow of water underground from higher to lower elevations and by approximately 10 inches per year of precipitation that infiltrates through the soil. At the Twin City Water & Sewer District well field, ground water flows generally toward the south.

What are the sources of contamination to drinking water?

The sources of drinking water, both tap water and bottled water, include rivers, lakes, streams, ponds, reservoirs, 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, and can pick up substances resulting from the presence of animals or from human activity. For the purposes of source water assessments, in Ohio, all surface waters are considered to be susceptible to contamination. By their nature, surface waters are readily accessible and can be contaminated by chemicals and pathogens which may arrive at the public water intake with little warning or time to prepare. The Twin City Water District public water system treats the water to meet drinking quality standards, but no single treatment technique can address all potential contaminants. The potential for water quality impacts can be further decreased by implementing measures to protect the wellfield and Stillwater Creek. More detailed information is provided in the Twin City Water District's Drinking Water Source Assessment report, which can be obtained by calling the Superintendent at (740) 922-1460.

OhioEPA recently completed a study of Twin City Water & Sewer District's source of drinking water, to identify potential contaminant sources and provide guidance on protecting the drinking water source. According to this study, the aquifer (water-rich zone) that supplies water to Twin City Water & Sewer District has a high susceptibility to contamination. This determination is based on the following:

- Presence of a relatively thin protective layer of clay overlying the aquifer
- Shallow depth (less than 10 feet below ground surface) of the aquifer
- And the presence of significant potential contaminant sources in the protection area

This susceptibility means that under currently existing conditions, the likelihood of the aquifer becoming contaminated is relatively high. This likelihood can be minimized by implementing appropriate protective measures. A Source Water Protection Plan with information on protective strategies to reduce the risk of specific contaminant sources is on file at the Twin City Water Plant. More information about the source water assessment or what consumers can do to help protect the aquifer is available by calling (740) 922-1460.

Contaminants that may be present in source water include: (A) Microbial contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations and wildlife; (B) Inorganic contaminants, such as salts and metals, which can be naturally-occurring or result from urban storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming; (C) Pesticides and herbicides, which may come from a variety of sources such as agriculture, urban storm water runoff, and residential uses; (D) 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 storm water runoff, and septic systems; (E) Radioactive contaminants, which can be naturally-occurring or be the result of oil and gas production and mining activities.

In order to ensure that tap water is safe to drink, EPA prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. FDA regulations establish limits for contaminants in bottled water which must provide the same protection for public health.

Drinking water, including bottled water, may reasonably be expected to contain at least a small amount of some contaminants. The presence of contaminants does not necessarily indicate that water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline at (1-800-426-4791).

Who needs to take 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 infection. 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 (1-800-426-4791).

About your drinking water.

The EPA requires regular sampling to ensure drinking water safety. The Twin City Water District conducted sampling for (bacteria, inorganic, synthetic, organic and volatile organic) contaminant sampling during 2022. Samples were collected for a number of contaminants, most of which were not detected in our water supply. The OhioEPA required us to monitor for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of our data, though accurate, are more than a year old. Listed below is information on those contaminants that were found in the Twin City Water District drinking water.

Lead and Copper Monitoring

Lead and copper monitoring for 2020 was also done. The results were found as follows: Lead 90th % ppb equaled 2.52 ppb. The action level of 15 ppb was not exceeded. Zero out of 20 samples exceeded the action level of 15 ppb for lead and zero out of 20 samples exceeded the action level of 1.3 ppm for copper. Copper 90th % ppm equaled 0.178 ppm. The action level of 1.3 ppm was not exceeded.

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. Twin City Water District is responsible for providing high quality drinking water, but cannot control the variety of materials used in plumbing components. When your water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap for 30 seconds to 2 minutes before

using water for drinking or cooking. If you are concerned about lead in your water, you may wish to have your water tested. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline at: <http://www.epa.gov/safewater/lead>.

Information of interest: The Twin City Water District treated 329,095,000 gallons of water for consumers use during the year 2022.

Twin City Water Well Treatment Plant at 4194 Indian Hill Road

Contaminants (units)	MCLG	MCL	Level Found	Range of Detections	Violations	Sample Year	Typical Source of Contaminants
Inorganic Contaminants							
Lead 90% (ppb)	0	15	2.52	NA	No	2020	Lead solder and lead service lines
Copper 90% ppm	1.3	1.3	0.178	NA	No	2020	Service lines and house plumbing
Barium ppm	2	2	0.029	0.029-0.029	No	2022	Discharge of drilling wastes & metal refineries. Erosion of natural deposits
Alpha Emitters (pci/l)	0	15	3.11 pCi/L	NA	No	2019	Erosion of natural deposits
Combined Radium (pci/l)	0	5	0.144 pCi/L	NA	No	2019	Erosion of natural deposits
Total Chlorine (ppm)	MRDL=4	MRDL=4	.82	.74 - .91	No	2022	Water additive used to control microbes
Volatile Organic Contaminants							
TTHM's (ppb) (Total Trihalomethane)	NA	80	22	27.5	No	2022	By-product of drinking water chlorination
HAA5 (Haloacetic Acids) (ppb)	NA	60	7.6	7.76	No	2022	By-product of drinking water chlorination

How do I participate in decisions concerning my drinking water?

Public participation and comment are encouraged at regular meetings of the Water & Sewer Board, which meets on the 3rd Thursday of each month at 6:00pm at the District's sewer office located at 1580 Boyd Street, Uhrichsville.

For more information on your drinking water, contact the Superintendent at (740) 922-1460

Definition of some terms contained within this report.

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

Maximum Contaminant Level (MCL): The highest level of contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.

Parts per Million (ppm) or Milligrams per Liter (mg/l) are units of measure for concentration of a contaminant. A part per million corresponds to one second in a little over 11.5 days.

Parts per Billion (ppb) or Micrograms per Liter (ug/l) are units of measure for concentration of a contaminant. A part per billion corresponds to one second in 31.7 years.

Maximum Residual Disinfectant Level (MRDL): The highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.

Maximum Residual Disinfectant Level Goal (MRDLG): The level of drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of the use of disinfectants to control microbial contaminants.

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

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

The < symbol: A symbol which means less than. A result of <5 means that the lowest level that could be detected was 5, and the contaminant in that sample was not detected.

Million Fiber per Liter (MFL): Measure of the presence of asbestos fibers that are longer than 10 micrometers.