

Annual Drinking Water Quality Report for 2021
Minerva Water District
Town of Minerva
PO Box 937, Minerva, NY 12851
(Public Water Supply ID#1500286)

INTRODUCTION

To comply with State regulations, we issue an annual report describing the quality of your drinking water. The purpose of this report is to raise your understanding of drinking water and awareness of the need to protect our drinking water sources. Last year, your tap water met all State drinking water health standards. We are proud to report that our system did not violate a maximum contaminant level or any other water quality standard. This report provides an overview of last year's water quality. Included are details about where your water comes from, what it contains, and how it compares to State standards.

If you have any questions about this report or concerning your drinking water, please contact Jon Fish at (518) 251-3373 or the New York State Department of Health Saranac Lake District Office at 518-891-1800. We want you to be informed about your drinking water. If you want to learn more, please attend any of our regularly scheduled town board meetings that are held the first and third Thursdays of every month at 7:00 p.m. in the Town Hall.

WHERE DOES OUR WATER COME FROM?

In general, 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 activities. Contaminants that may be present in source water include microbial contaminants, inorganic contaminants, pesticides and herbicides, organic chemical contaminants, and radioactive contaminants. In order to ensure that tap water is safe to drink, the State and the EPA prescribe regulations which limit the amount of certain contaminants in water provided by public water systems. The State Health Department's and the FDA's regulations establish limits for contaminants in bottled water which must provide the same protection for public health.

The Minerva Water District serves the hamlets of Minerva and Olmstedville. Our water source consists of two drilled wells. Water from both wells is disinfected with sodium hypochlorite before it enters the distribution system. The system serves approximately 800 people through 320 service connections.

NYSDOH completed a source water assessment of our wells and has rated these wells as having an elevated susceptibility. No significant sources of contamination were identified. The wells draw water from an unconfined aquifer and overlying soils are not known to provide adequate protection from potential contamination. Please note that our water supply is disinfected to ensure that the finished water delivered to your home meets the New York State's drinking water standards for microbiological contamination. The health department will use this information to direct future source water protection activities. These may include water quality monitoring, resource management, planning, and education programs.

ARE THERE CONTAMINANTS IN OUR DRINKING WATER?

As the State regulations require, we routinely test your drinking water for numerous contaminants. These contaminants include total coliform, turbidity, inorganic compounds, nitrate, nitrite, lead and copper, volatile organic compounds, total trihalomethanes, haloacetic acids, radiological and synthetic organic compounds. The table presented below depicts which compounds were detected in your drinking water. The State allows us to test for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of our data, though representative, are more than one year old.

It should be noted that all drinking water, including bottled drinking water, may be reasonably expected to contain at least small amounts 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 EPA's Safe Drinking Water Hotline (800-426-4791) or the New York State Health Department at 518-891-1800.

During 2021, we started to sample our drinking water for the per-fluorinated compounds PFAS and PFOS. We collected samples during the first and second quarter of 2021 and the results were below the detection limit for the two parameters. We will collect PFAS and PFOS again during the third quarter of 2022.

Table of Detected Contaminants							
Contaminant	Violation Yes/No	Date of Sample	Level Detected	Unit Measurement	MCLG	Regulatory Limit (MCL, TT or AL)	Likely Source of Contamination
Inorganic Contaminants							
Copper	No	2019	0.180 ¹ .0403 - .261	mg/L	1.3	1.3 (AL)	Corrosion of household plumbing systems.
Lead	No	2019	0.0058 ² ND - 0.0216	mg/L	0	0.015 (AL)	Corrosion of household plumbing systems.
Barium	No	2019	0.052	mg/L	2	2 (MCL)	Erosion of natural deposits.
Zinc	No	2019	0.025	mg/L	n/a	5 (MCL)	
Chloride	No	2019	136	mg/L	n/a	250 (MCL)	Naturally occurring or indicative of road salt contamination
Sulfate	No	2019	109	mg/L	n/a	250 (MCL)	Naturally Occurring
Sodium ³	No	2021	59	mg/L	n/a		Naturally occurring; Road Salt; Water Softeners; Animal Wastes
Nitrate	No	2021	0.16	mg/L	10	10 (MCL)	Runoff from fertilizer use; Leaching from septic tanks, sewage; erosion of natural deposits.
Disinfection Byproducts							
Total Haloacetic Acids (HAA5s)	No	2020	0.0	ug/L	n/a	60 (MCL)	Byproduct of drinking water chlorination
Total Trihalomethanes (TTHMs)	No	2020	8.2	ug/L	n/a	80 (MCL)	Byproduct of drinking water chlorination
Radioactive Contaminants							
Radium 228	No	2017	0.33	pCi/L	0	5 (MCL)	Erosion of natural deposits
Gross Alpha	No	2017	<1.1	pCi/L	0	15 (MCL)	Erosion of natural deposits.

Notes:

1 – The level presented represents the 90th percentile of the 10 sites tested. A percentile is a value on a scale of 100 that indicates the percent of a distribution that is equal to or below it. The 90th percentile is equal to or greater than 90% of the copper values detected at your water system. In this case, ten samples were collected at your water system and the 90th percentile value was the second highest value. The action level for copper was not exceeded at any of the sites tested.

2 – The level presented represents the 90th percentile of the ten samples collected. The action level for lead was exceeded at one of the sites tested.

3 – Sodium is naturally occurring but can also be associated with road salt contamination or water softener use. Water containing more than 20 mg/l of sodium should not be used for drinking by people on severely restricted sodium diets. Water containing more than 270 mg/l of sodium should not be used for drinking by people on moderately restricted sodium diets.

Definitions:

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.

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.

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 a 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 contamination.

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

Non-Detects (ND): Laboratory analysis indicates that the constituent is not present.

Milligrams per liter (mg/l): Corresponds to one part of liquid in one million parts of liquid (parts per million - ppm).

Micrograms per liter (ug/l): Corresponds to one part of liquid in one billion parts of liquid (parts per billion - ppb).

Picocuries per liter (pCi/L): A measure of the radioactivity in water.

WHAT DOES THIS INFORMATION MEAN?

As you can see by the table, our system had no violations. We have learned through our testing that some contaminants have been detected; however, these contaminants were detected below the level allowed by the State. One of our lead sampling sites exceeded the Action Level in 2019. This homeowner was notified of the results.

IS OUR WATER SYSTEM MEETING OTHER RULES THAT GOVERN OPERATIONS?

During 2021, our system was in compliance with applicable State drinking water operating, monitoring and reporting requirements. It should be noted that the action level for lead was exceeded at one of your sampling locations in 2019. The concentration of lead at the remaining 9 stations that were sampled was below the action level for lead. We are required to present the following information on lead in drinking water. If present, elevated levels of lead can cause serious health problems, especially for pregnant women, infants, and young children. It is possible that lead levels at your home may be higher than at other homes in the community as a result of materials used in your home's plumbing. The Minerva 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 (1-800-426-4791) or at <http://www.epa.gov/safewater/lead>.

DO I NEED TO TAKE SPECIAL PRECAUTIONS?

Although our drinking water met or exceeded state and federal regulations, some people may be more vulnerable to disease causing microorganisms or pathogens 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 from their health care provider about their drinking water. EPA/CDC guidelines on appropriate means to lessen the risk of infection by Cryptosporidium, Giardia and other microbial pathogens are available from the Safe Drinking Water Hotline (800-426-4791).

WHY SAVE WATER AND HOW TO AVOID WASTING IT?

Although our system has an adequate amount of water to meet present and future demands, there are a number of reasons why it is important to conserve water:

- ◆ Saving water saves energy and some of the costs associated with both of these necessities of life;
- ◆ Saving water reduces the cost of energy required to pump water and the need to construct costly new wells, pumping systems and water towers; and
- ◆ Saving water lessens the strain on the water system during a dry spell or drought, helping to avoid severe water use restrictions so that essential firefighting needs are met.

You can play a role in conserving water by becoming conscious of the amount of water your household is using, and by looking for ways to use less whenever you can. It is not hard to conserve water. Conservation tips include:

- ◆ Automatic dishwashers use 15 gallons for every cycle, regardless of how many dishes are loaded. So get a run for your money and load it to capacity.
- ◆ Turn off the tap when brushing your teeth.
- ◆ Check every faucet in your home for leaks. Just a slow drip can waste 15 to 20 gallons a day. Fix it and you can save almost 6,000 gallons per year.
- ◆ Check your toilets for leaks by putting a few drops of food coloring in the tank, watch for a few minutes to see if the color shows up in the bowl. It is not uncommon to lose up to 100 gallons a day from one of these otherwise invisible toilet leaks. Fix it and you save more than 30,000 gallons a year.

CLOSING

Thank you for allowing us to continue to provide your family with quality drinking water this year. In order to maintain a safe and dependable water supply we sometimes need to make improvements that will benefit all of our customers. Rate adjustments may be necessary in order to address improvements projects that are necessary to maintain our water system. We ask that all our customers help us protect our water sources, which are the heart of our community. Please call our office if you have questions.