Annual Drinking Water Quality Report for 2023
Village Of Wilson
375 Lake Street, Wilson, NY 14172-0596
Public Water Supply ID# NY3100586
April 30, 2024

INTRODUCTION

To comply with State regulations, Village of Wilson, will be annually issuing a 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 in 2023 our system did not violate a maximum contaminant level. 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 Joseph Evans, Superintendent of Public Works, (716)751-9431 . We want you to be informed about your drinking water. If you want to learn more, please attend any of our regularly scheduled village board meetings. The meetings are held every third Thursday of every month at the Wilson Town Hall, 375 Lake Street, Wilson, NY 14172 at 7:00pm.

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 number of certain contaminants in water provided by public water systems. The State Health Departments and the FDA's regulations establish limits for contaminants in bottled water which must provide the same protection for public health.

Our water system serves 1305 people through 542 service connections. Our water source is located in the west branch of the Niagara River. The treatment plant uses pre-chlorination, coagulation, rapid mix, flocculation, sedimentation, and filtration processes to ensure the quality of the water. The NCWD also uses chlorination for disinfection. The water treatment plant has been approved as a direct filtration plant; however, water is treated using conventional filtration including all of the processes described above. In addition, fluoride and a corrosion inhibitor are added to the potable water prior to distribution.

The New York State Department of Health recently completed a draft Source Water Assessment of the **raw water source** under the State's Source Water Assessment Program (SWAP). The purpose of this program is to compile, organize, and evaluate information regarding possible and

Table 1: Table of Detected Contaminants								
Contaminant	**Violation Yes/No**	**Date of Sample**	**Level Detected (Avg. / Max.) (Range)**	**Unit of Measure -ment**	**MCLG**	**Regulatory Limit**	**Likely Source of Contamination**	**Health Effects**
Inorganic Contaminants								
Barium	No	2/23	0.0218	mg/L	2.00	MCL=2.00	Discharge of drilling wastes and from metal refineries; Erosion of natural deposits.	Some people who drink water containing barium in excess of the MCL over many years could experience an increase in their blood pressure.
Copper[1] (in distribution system)	No	6/23-9/23	0.145 (0.141-0.252)	mg/L	1.3	AL=1.3	Corrosion of galvanized pipes; Erosion of natural deposits.	Copper is an essential nutrient, but some people who drink water containing copper in excess of the action level over a relatively short amount of time could experience gastrointestinal distress. Some people who drink water containing copper in excess of the action level over many years could suffer liver or kidney damage. People with Wilson's Disease should consult their personal doctor.
Fluoride	No	1/23 – 12/23	0.68 (0.67-0.70)	mg/L	N/A	MCL=2.2	Erosion of natural deposits; Water additive that promotes strong teeth	Some people who drink water containing fluoride in excess of the MCL over many years could get bone disease, including pain and tenderness of the bones. Children may get mottled teeth.
Lead[1] (in distribution system)	No	6/23-9/23	5.8 (5.75-11.6)	ug/L	0	AL=15	Corrosion of household plumbing systems; Erosion of natural deposits.	Infants and children who drink water containing lead in excess of the action level could experience delays in their physical or mental development. Children could show slight deficits in attention span and learning abilities. Adults who drink this water over many years could develop kidney problems or high blood pressure.
Total Organic Carbon (TOC) Source	No	1/23-12/23	2.2 (2.07 –2.51)	mg/L	NA	NA	Naturally occurring organic materials from decaying leaves and plants.	Total organic carbon (TOC) has no health effects. However, total organic carbon provides a medium for the formation of disinfection byproducts. These byproducts include trihalomethanes (THMs) and haloacetic acids (HAAs). Drinking water containing these byproducts in excess of the MCL may lead to adverse health effects, liver or kidney problems, or nervous system effects, and may lead to an increased risk of getting cancer.
Total Organic Carbon (TOC) Treated	No	1/23-12/23	1.7 (1.63-1.89)	mg/L	TT	TT	Source same as above, treated samples measure the effectiveness of our water treatment process.	
Sodium	No	2/23	10.20	mg/L	N/A	AL=20	Erosion of natural deposits. Use of road salt, discharges from water softeners.	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.
Entry Point Chlorine Residual	No	1/23 - 12/23	1.15 (1.07– 1.22)	mg/L	MRDL 4.0	MRDLG 4.0	Added for disinfection.	Some people who use water containing chlorine well in excess of the MRDL could experience irritating effects to their eyes and nose. Some people who drink water containing chlorine well in excess of the MRDL could experience stomach discomfort.

Table 1: Table of Detected Contaminants								
Contaminant	**Violation Yes/No**	**Date of Sample**	**Level Detected (Avg. / Max.) (Range)**	**Unit of Measure -ment**	**MCLG**	**Regulatory Limit**	**Likely Source of Contamination**	**Health Effects**
and 5 NTU in the distribution system. The regulations require that 95% of the turbidity samples collected have measurements below 0.3 NTU. All samples collected in 2023 were below the treatment technique level and do not constitute a violation.								
[3]The values were below Lab Reporting Limit (RL) but were above the (MDL) minimum detection level and all PFOS and PFOA results were below MCL (Maximum Contaminant Level) of 10.0 ng/L.								
[4]There was a lab detection on the triple blank of 4.87 ng/L which should be ND.								

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.

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

Level 1 Assessment: A Level 1 assessment is an evaluation of the water system to identify potential problems and determine, if possible, why total coliform bacteria have been found in our water system.

Level 2 Assessment: A Level 2 assessment is an evaluation of the water system to identify potential problems and determine, if possible, why an E. coli MCL violation has occurred and/or why total coliform bacteria have been found in our water system on multiple occasions.

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

Nephelometric Turbidity Unit (NTU): A measure of the clarity of water. Turbidity in excess of 5 NTU is just noticeable to the average person.

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).

Nanograms per liter (ng/l): Corresponds to one part of liquid to one trillion parts of liquid (parts per trillion - ppt).

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

Millirems per year (mrem/yr): A measure of radiation absorbed by the body.

Million Fibers per Liter (MFL): A measure of the presence of asbestos fibers that are longer than 10 micrometers.

WHAT DOES THIS INFORMATION MEAN?

We have learned through our testing that some contaminants have been detected; however, these contaminants were detected below the level allowed by New York State. It should be noted that the action level for lead was not exceeded in the 50 samples collected in 2020. However, we provide the following information on lead in drinking water for those concerned:

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 Niagara County 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

IS OUR WATER SYSTEM MEETING OTHER RULES THAT GOVERN OPERATIONS?

During 2022, our system was in compliance with applicable State drinking water operating, monitoring and reporting requirements.

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