ANNUAL DRINKING WATER QUALITY REPORT FOR 2024
Village of Ballston Spa
66 Front Street, Ballston Spa, New York, 12021
(Public Water Supply ID# NY4500162)

INTRODUCTION

In compliance with Section 5-1.72 of the New York State Sanitary Code (10 NYCRR), the Village of Ballston Spa publishes an Annual Drinking Water Quality Report to inform the public about the quality of the village's drinking water. This report details any vulnerabilities or susceptibilities of source water to contamination, provides an overview of modifications or improvements made to the water distribution system in 2024, makes public the results of testing/sampling that occurred in 2024, and compares testing results to New York State standards. The intent of this report is to raise public understanding and awareness of the overall quality of the village's drinking water and to convey the importance of preventative measures, such as source protection, that ensure a safe drinking water supply.

Last year, the village's drinking water was tested for numerous contaminants and was determined to meet all drinking water health standards; the village's potable water supply did not violate a maximum contaminant level or any other water quality standard.

Any questions about this report or concerns about drinking water quality can be directed to the Village Water Department which can be reached by phone at: (518) 885-6211. Alternatively, questions, comments, and/or concerns can be raised at Village Board Meetings held at the Village of Ballston Spa Public Library on the second and fourth Mondays of each month at 7:00 pm.

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 United States Environmental Protection Agency (EPA) prescribe regulations which limit the amount of certain contaminants in water provided by public water systems. New York State Department of Health (NYSDOH) and United States Food and Drug Administration (FDA) regulations also establish limits for contaminants in bottled water which must provide the same protection for public health.

The Village of Ballston Spa sources drinking water from five (5) groundwater wells located in the Town of Milton. Two (2) of the wells are located on Geyser Road and three (3) are located on Rowland Street. The wells vary in depth from 50 to 200-feet. During 2024, there were no restrictions on the village's water source.

Groundwater is pumped from the wells to the Rowland Street Pump Station where it is disinfected using chlorine gas and subsequently dosed with fluoride prior to distribution. The village is among the many municipalities in New York State that add a low level of fluoride to drinking water in order to provide consumer dental health protection. Chlorine and fluoride residuals are tested daily in the water system, averaging 1.2 mg/l and 0.5 mg/l respectively in 2024. Additionally, water samples from multiple locations are tested for coliform, culminating in a total of seven samples per month.

SOURCE WATER PROTECTION PROGRAM

To emphasize the protection of surface and groundwater sources used for public drinking water, Congress amended the Safe Drinking Water Act (SDWA) in 1996. The amendments require the New York State Department of Health's Bureau of Public Water Supply Protection to ensure that individual Source Water Assessments (SWAs) are completed for all of New York's public water systems.

An SWA provides information on the potential contaminant threats to public drinking water sources. Each SWA will:

- Determine where water used for public drinking water comes from (delineate the source areas).
- Inventory potential sources of contamination that may impact public drinking water sources.
- Assess the likelihood of a source water area becoming potentially contaminated.

The NYSDOH has completed an SWA for the village in which potential and actual threats to the source groundwater were evaluated. The SWA established a susceptibility rating based on several factors including types of potential contaminants, contaminant mobility, and health risks posed by any potential contaminant. Note that the rating is an estimate of the potential for source water contamination and does not indicate that the water delivered to consumers is or will become contaminated. The village's water sources were rated as having an elevated susceptibility to microbials and nitrates. The primary rationale behind this determination is twofold; the source water wells lay in proximity to permitted discharge facilities and concern exists that the overlying soils may not provide adequate protection from potential contamination. While the assessment determined the village's wells to be susceptible to microbials, note that the public water supply is disinfected to ensure that that the finished and distributed water meets New York State's drinking water standards for microbial contamination.

The SWA provides resource managers with additional information for protecting source waters into the future and can be used by the NYSDOH to direct future source water protection activities. A copy of the SWA can be obtained by contacting the Village Water Department. See Section "Are There Contaminants in Our Drinking Water?" for a comprehensive list of the contaminants that have been detected in the source water.

FACTS AND FIGURES

In 2024, the Village of Ballston Spa provided water service to approximately 6,500 people through 2,481 service connections. The total volume of source water extracted and treated in 2024 was 257,483,124 gallons, for an average of 705,433 gallons per day (gpd). Of the total volume extracted, 187,601,730 gallons (or approximately 73%) was delivered and billed to customers. The remaining 69,881,394 gallons (approximately 27% of the total volume extracted) was used to fight fires, flush hydrants, fill the village swimming pool and ice-skating rink, and includes losses such as leakage and/or water main breaks. The highest single day demand was 1,722,046 gallons. In 2024, the average cost per 1,000 gallons for customers within the village was $2.44 and the annual average water charge per user was $184.45.

ARE THERE CONTAMINANTS IN OUR DRINKING WATER?

The village routinely tests the drinking water supply for a myriad of contaminants in accordance with the NYSDOH Sanitary Code Part 5. The contaminants that the village tests for include total coliform bacteria, inorganic compounds, nitrate, lead and copper, disinfection byproducts, synthetic organic compounds, radiologicals and principal organic compounds. The table presented below summarizes the test results for 2024 (contaminants tested for but not detected are not shown). Note that the state allows

the village to test for some contaminants less frequently than once per year; these contaminants are known to exhibit stable concentrations that vary infrequently. Some of the data, though representative, is 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 Saratoga County Department of Health at (518) 584-7460.

TABLE OF DETECTED CONTAMINANTS						
Contaminant	**Violation Yes/No**	**Date of Sample**	**Detected Level (avg/max) (range)**	**MCLG OR HEALTH ADVISORY LEVEL[4,5]**	**NYSDOH Limits or Guidelines (MCL, or AL)**	**Likely Sources of Contamination**
INORGANICS						
Chloride	No	6/18/24	110 mg/L	N/A	250 mg/L (MCL)	Naturally occurring or indicative of road salt contamination
Barium	No	6/17/24	0.059 mg/L	2 mg/L	2 mg/L (MCL)	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits.
Fluoride	No	6/17/24	0.96 mg/L	N/A	2.2 mg/L (MCL)	Erosion of natural deposits; Water additive that promotes strong teeth
Manganese	No	6/18/24	12 ug/L	N/A	300 ug/L (MCL)	Naturally occurring; Indicative of landfill contamination
Nickel	No	6/17/24	6.3 ug/L	N/A	N/A	Erosion of natural deposits
Nitrate	No	10/28/24	1.2 mg/L	10 mg/L	10 mg/L (MCL)	Runoff from fertilizer use; Erosion of natural deposits; Leaching from septic tank, Sewage
Sodium	No	6/18/24	71 mg/L	N/A	N/A[1]	Naturally occurring; Road salt; Water softeners; Animal waste
Sulfate	No	6/18/24	26 mg/L	N/A	250 mg/L (MCL)	Naturally Occurring
Color	No	6/18/24	5 units	N/A	15 units (MCL)	
LEAD AND COPPER						
Lead	No	9/11/24	2.7[2] ND-8.6[3] ug/L	0	15 ug/L (AL)	Corrosion of household plumbing systems; Erosion of natural deposits.
Copper	No	9/11/24	0.2[2] mg/L 0.026-0.37[3] mg/L	1.3 mg/L	1.3 mg/L (AL)	Corrosion of household plumbing systems; Erosion of natural deposits; leaching
DISINFECTION BY PRODUCTS (STAGE 2)						

TABLE OF DETECTED CONTAMINANTS						
Contaminant	**Violation Yes/No**	**Date of Sample**	**Detected Level (avg/max) (range)**	**MCLG OR HEALTH ADVISORY LEVEL[4,5]**	**NYSDOH Limits or Guidelines (MCL, or AL)**	**Likely Sources of Contamination**
Total Trihalomethanes (TTHM)	No	8/27/24	34.2 ug/l	N/A	80 ug/L (MCL)	By-product of drinking water chlorination needed to kill harmful organisms. TTHMs are formed when source water contains large amounts of organic matter.
Haloacetic Acids (HAA5)	No	8/27/24	1 ug/L	N/A	60 ug/L (MCL)	By-product of drinking water disinfection needed to kill harmful organisms.
MICROBIOLOGICAL CONTAMINANTS						
Total Coliform Bacteria	No	Seven times monthly	None	0	TT = 2 or more positive samples.	Naturally present in the environment

Notes:

1. 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.
2. The level presented represents the 90th percentile of the 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 lead and copper values detected for the water system.
3. The level presented is the range of sample results from the sites that were tested.
4. USEPA Health Advisory Levels identify the concentration of a contaminant in drinking water at which adverse health effects and/or aesthetic effects are not anticipated to occur over specific exposure durations. Health Advisory Levels are not to be construed as legally enforceable federal standards and are subject to change as new information becomes available.
5. All perfluoroalkyl substances, besides PFOA and PFOS, are considered Unspecified Organic Contaminants (UOC) which have an MCL = 0.05 mg/L.

Definitions:

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

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.

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

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

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

N/A*:* Not applicable.

T.O.N.: Threshold odor number.

In October 2024 the village conducted testing and analysis for the following:
Perfluorooctanoic Acid (PFOA), and Perfluorooctanesulfonic Acid (PFOS).
All samples tested were below the detection level, and the MCL as specified by the state.

WHAT DOES THIS INFORMATION MEAN?

As is evidenced by the above table, the village had no violations. We have learned through our testing that some contaminants have been detected; however, these contaminants were detected below the maximum level allowed by the state.

It should be noted that the action level for lead was not exceeded in the last test completed in 2024; however, we are required to present the following information on lead in drinking water:

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. The Village is responsible for providing high quality drinking water and removing lead pipes, but cannot control the variety of materials used in plumbing components in your home. You share the responsibility for protecting yourself and your family from the lead in your home plumbing. You can take responsibility by identifying and removing lead materials within your home plumbing and taking steps to reduce your family's risk. Before drinking tap water, flush your pipes for several minutes by running your tap, taking a shower, doing laundry or a load of dishes. You can also use a filter certified by an American National Standards Institute accredited certifier to reduce lead in drinking water. If you are concerned about lead in your water and wish to have your water tested, contact the Village Water Department which can be reached by phone at: (518) 885-6211. 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*.

IS OUR WATER SYSTEM MEETING OTHER RULES THAT GOVERN OPERATIONS?

During 2024, the system was in compliance with applicable state operating, monitoring, and reporting requirements.

INFORMATION ON FLUORIDE ADDITION

The village's water system is one of many in New York State that adds a low level of fluoride to drinking water in order to promote consumer dental health protection. According to the United States Centers for Disease Control (CDC), fluoride is very effective in preventing cavities when present in drinking water at a properly controlled level. To ensure that the fluoride supplement in your water provides optimal dental protection, fluoride levels are monitored on a daily basis to ensure fluoride is maintained at a target level of approximately 1 mg/l. During 2024, monitoring showed fluoride levels averaged 0.5 mg/l. None of the monitoring results showed a concentration that approaches the 2.2 mg/l MCL for fluoride.

INFORMATION ON LEAD SERVICE LINE INVENTORY

A Lead Service Line (LSL) is defined as any portion of pipe that is made of lead which connects the water main to the building inlet. An LSL may be owned by the water system, owned by the property owner, or both. The inventory includes both potable and non-potable SLs within a system. In accordance with the federal Lead and Copper Rule Revisions (LCRR) our system has prepared a lead service line inventory and have made it publicly accessible by going to https://health.data.ny.gov or contacting the Village of Ballston Spa at (518) 885-6211.

DO I NEED TO TAKE SPECIAL PRECAUTIONS?

Although the village's 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 the village has an adequate supply 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.
- Use your water meter to detect hidden leaks. Simply turn off all taps and water using appliances, then check the meter after 15 minutes. If it moved, you have a leak.

SYSTEM IMPROVEMENTS

In 2024, system improvements included the rehabilitation of wells 3B and 4A, optimizing overall well production.

FLUSHING SCHEDULE

Once a year the village flushes water out of the system to ensure that there are no points of stagnation that may affect water quality. During this time, consumers may experience discolored water for a short time period. Typically, flushing of the water system is conducted in the spring. Notices are published in the local paper prior to commencing the system flushing.

CLOSING

Thank you for allowing us to continue to provide your family with quality drinking water this year. 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.