

Annual Drinking Water Quality Report for 2016
Ashford West Valley Town Water District
PO Box 306, West Valley, NY 14171
(Public Water Supply ID# NY0430123)

INTRODUCTION

To comply with State regulations, the Ashford West Valley Town Water District will be issuing a report annually 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 water resources. 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, please contact the town hall at 942-6016. 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. The meetings are held on the second Wednesday of each month at 7:30 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 EPA prescribe regulations which limit the amount of certain contaminants in water provided by public water systems. The State Health Department and the FDA regulations establish limits for contaminants in bottled water, which must provide the same protection for public health as tap water.

The Town secured grant and loan financing through the NYS Drinking Water Revolving Loan Fund and completed the process of building a completely new water system which utilizes well water and allows abandonment of the unfiltered springs. Construction was substantially completed in 2016 and restoration work will be performed in Spring 2017.

For the majority of 2016 our water was obtained from the old spring collection areas located generally to the south and east of the Hamlet of West Valley. The only treatment provided was disinfection by liquid chlorine solution. This occurred at the reservoir and then the treated water flowed by gravity into the distribution system.

By September 2016 we also started using well #1 (school well). This water is treated with an ortho/polyphosphate product to sequester natural iron minerals and then disinfected with chlorine before it goes to the new 153,000 gallon steel ground storage tank that is located on Felton Hill Road. Water from the storage tank then flows by gravity into the distribution system. We will also begin using well #2 (fire dept.) in 2017 which will similarly be disinfected with chlorine before it goes into the distribution system. As soon as well #2 is placed into full service the unfiltered springs will be officially abandoned.

Our water system serves approximately 410 residents through 220 service connections.

In 2003, the NYS DOH completed a source water assessment for the spring water system, based on available information. Possible and actual threats to the drinking waters sources were evaluated. The source water assessment includes a susceptibility rating based on the risk posed by each potential source of contamination and how easily contaminants can move through the subsurface to the springs. The susceptibility rating is an estimate of the potential contamination of the source water. It does not mean that the water delivered to consumers is, or will become contaminated. The source water assessments provide resource managers with additional information for protecting source waters into the future.

All of the utilized springs were rated as "medium" for susceptibility to pesticides or microbials due to their proximity to agricultural land. A copy of this source water assessment, including a map of the assessment area is available for viewing at the town hall.

ARE THERE CONTAMINANTS IN OUR DRINKING WATER?

As the State regulations require, we routinely test your drinking water for numerous contaminants. These contaminants include: coliform bacteria, turbidity, inorganic compounds, nitrate, 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, 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 Cattaraugus County Health Dept. at (716) 701-3386.

Table of Detected Contaminants							
Contaminant	Violation Yes/No	Date of Sample	Level Detected (Avg/Max) (Range)	Unit Measurement	MCLG	Regulatory Limit (MCL, TT or AL)	Likely Source of Contamination
Disinfectants							
Chlorine Residual	No	2016	Avg. = .51 (0.17 – 1.1)	mg/l	N/A	MRDL = 4	Water additive used to control microbes.
Microbiological Contaminants							
Entry Point Turbidity ¹	No	11/16	Highest Monthly Avg. = 0.71	NTU	N/A	TT = <1 NTU	Soil runoff.
Distribution Point Turbidity ²	No	10/16	Highest Monthly Avg. = 0.69	NTU	N/A	TT = <5 NTU	Pipe sediments/corrosion.
Inorganic Contaminants							
Barium - School Well	No	9/6/16	617	µg/l	2,000	MCL = 2,000	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits.
- Springs	No	1/27/15	105				
Copper ³	No	9/15/15	960 (ND – 960)	µg/l	1,300	AL = 1,300	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives.
Lead ⁴	No	9/15/15	4.5 (ND – 4.6)	µg/l	0	AL = 15	Corrosion of household plumbing; erosion of natural deposits.
Nitrate - School Well	No	2016	High = 1.18 (1.06 – 1.18)	mg/l	10	MCL = 10	Run off from fertilizer; leaching from septic tanks, sewage; erosion from natural deposits.
Volatile Organic Contaminants							
Chloromethane - School Well	No	9/6/16	0.8	ug/l	n/a	MCL = 5	Used in organic chemistry; used as an extractant for greases, oils, and resins; as a solvent in the rubber industry; as a refrigerant, blowing agent and propellant in polystyrene foam production; as an anesthetic; as an intermediate in drug manufacturing; as a food additive, a fumigant and a fire extinguisher.
Disinfection Byproducts							
Haloacetic Acids	No	8/8/16	7.67	µg/l	N/A	MCL = 60	By-product of drinking water disinfection needed to kill harmful organisms.
Total Trihalomethanes	No	8/8/16	1.23	µg/l	N/A	MCL = 80	By-product of drinking water disinfection needed to kill harmful organisms. TTHMs are formed when source water contains large amounts of organic matter.

Notes:

1 – Turbidity is a measure of the cloudiness of the water. We measure it because it is a good indicator of water quality. High turbidity can hinder the effectiveness of disinfectants. Our highest average monthly turbidity measurement of 0.71 NTU occurred in November 2016. The MCL is 1 NTU (monthly average).

2 – Our highest average monthly distribution turbidity measurement of 0.69 NTU occurred in October 2016. This value is below the turbidity standard of 5 NTU assigned to our system.

3 – 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 960 ug/l. The action level for copper was not exceeded at any of the sites tested.

4 – The level presented, 4.5 ug/l, represents the 90th percentile of the ten samples collected for lead. The action level for lead was not exceeded at any of the 10 sites tested.

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.

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

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

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

Not Detected (ND): Laboratory analysis indicates that the constituent was not present.

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

WHAT DOES THIS INFORMATION MEAN?

As you can see by the table, our system had no violations, but we have learned through our testing that some compounds are present in very low concentrations. However, these contaminants were detected below state and federal drinking water limits.

Also, even though we did not exceed the action level for lead, we are required to provide 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 Town of Ashford is responsible for providing high quality drinking water, but cannot control the variety of materials used in old 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 private plumbing, 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?

The old spring supply system was in violation of the Surface Water Treatment Rule and consequently that is why we switched our water sources to new groundwater wells. Since we were still using unfiltered spring water in 2016, we are required to include the following statement in this report: "Inadequately treated water may contain disease-causing organisms. These organisms include bacteria, viruses and parasites, which can cause symptoms such as nausea, cramps, diarrhea and associated headaches."

On February 16, 2017, we were issued a violation from the Cattaugus County Health Department for failure to monitor for Total Organic Carbon (TOC) during the fourth quarter of 2016. Although this is not an emergency, as our customers, you have a right to know what happened and what we did to correct this situation.

We are required to monitor your drinking water for specific contaminants on a regular basis. Results of regular monitoring are an indicator of whether or not your drinking water meets health standards. During 10/1/16 – 12/31/16 we failed to sample for TOC and therefore cannot prove what the TOC content was during that time. However, the next routine TOC sample was collected on 1/3/17 and the result was below the established level allowed, as expected.

There is nothing you need to do at this time. If a situation was to ever arise where the water is no longer safe to drink, you would be notified immediately.

DO I NEED TO TAKE SPECIAL PRECAUTIONS?

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 expanded facilities;
- ◆ 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 fire fighting 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 provide your family with quality drinking water this past year. In order to maintain a safe and dependable water supply we need to make major improvements that will benefit all of our customers. The costs of these improvements will be reflected in the rate structure. Rate adjustments are necessary in order to address such improvements and repairs. We ask that all customers help us protect our water sources, which are the heart of the community, our way of life, and our children's future. Please call the town hall at 942-6016 if you have questions.