

Annual Drinking Water Quality Report for 2018
Livingston County Water & Sewer Authority
1997 D'Angelo Drive, Lakeville, New York 14480
www.co.livingston.state.ny.us/lcwsa.htm

Federal ID Numbers

LCWSA District:	NY2501019
Village of Livonia District	NY2501022
Town of Geneseo District 3	NY2530023

INTRODUCTION

To comply with State and Federal regulations, the Livingston County Water & Sewer Authority (LCWSA) annually issues 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, we conducted over 157 tests for bacteriological contamination. 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 Mark Kosakowski, Director of Operations, at (585) 346-3523. We want you to be informed about your drinking water. If you want to learn more, please attend any of our regularly scheduled LCWSA board meetings. The meeting times, dates and locations can be obtained by calling the LCWSA office at (585) 346-3523 or on our website at:

<https://livingstoncounty.us/DocumentCenter/View/8973/2019-Meeting-Schedule>.

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 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 that must provide the same protection for public health.

The LCWSA water supply is obtained from the City of Rochester and is delivered through a connection to the City transmission main located just north of Big Tree Road in Hemlock. This water originates in the Hemlock and Canadice Lakes watersheds and is treated at the City of Rochester's Hemlock Lake Water Treatment Facility located on Rix Hill Road in Hemlock. The water is treated at the Hemlock Lake Plant using coagulation, filtration, disinfection, and fluoridation. The City of Rochester's 2018 Annual Water Quality Report is available on-line at: <https://www.cityofrochester.gov/waterquality/> and is also posted on the LCWSA's website at: <https://www.livingstoncounty.us/550/Operations-Development>.

In addition, LCWSA re-chlorinates in South Livonia, Lakeville, Conesus, Groveland Station Lower Tank, East Lake Road and Scottsburg to maintain adequate disinfection, and free chlorine residuals throughout the entire distribution system. Water consumed by the Town of Geneseo Water District 3 is purchased from LCWSA (see attached report). The Village of Geneseo also purchases water wholesale from LCWSA, which is being supplied to the Village from a master meter pit located on West Lake Road in the vicinity of the Livonia/Geneseo Town Line. The Village in turn supplies this water to a portion of the Town of Geneseo Water District 2, located between the Town Line and the Village's Water Treatment Plant, on Blue Heron Drive. Information regarding Town of Geneseo Water District 2 can be found in the Village of Geneseo's 2018 Annual Water Quality Report, which is posted on-line at: <https://geneseony.org/village/index.asp##> (under "Special Reports") and is also posted on the LCWSA's website at: <https://www.livingstoncounty.us/550/Operations-Development>.

During 2018, our system did not experience any restriction of our water source.

FACTS AND FIGURES

The Consolidated water system serves a population of about 8015 people through 3206 service connections. The Livonia Village water system serves a population of about 1302 people through 521 service connections.

The total water purchased in 2018 from the City of Rochester was approximately 288,917,000 gallons, which is broken down as follows: 274,185,000 gallons for LCWSA District & Village of Livonia District, 546,000 gallons for Town of Geneseo Water District 3 and 14,186,000 gallons for (portion of) Town of Geneseo Water District 2. The amount of water delivered to LCWSA customers (LCWSA District & Village of Livonia District) was approximately 165,913,000 gallons. This leaves an unaccounted for total of 108,272,000 gallons (39.5% of the total amount purchased). This water was used to flush hydrants, fight fires and for fire drills, and normal flushing of mains. All other unaccounted for water was a result of: four (4) water main breaks, slowed retail meters, un-metered water, and leakage. Over 83 retail meters were replaced throughout all service areas, as a result of our meter replacement program. In 2018, most water customers were charged \$3.50 per 1,000 gallons of water with an annual minimum water charge per connection of \$148 per year.

ARE THERE CONTAMINANTS IN OUR DRINKING WATER?

As the State regulations require, the LCWSA routinely tests your drinking water for Total Coliform Bacteria, Asbestos and Disinfection By-products (Total Trihalomethanes - TTHM, Haloacetic Acids - HAA).

In April 2018, the LCWSA stopped purchasing water from the Town of Geneseo for the Town of Groveland West Lake Road Water District and the Town of Conesus West Lake Road Water District, and these customers became part of the LCWSA’s Consolidated water system.

In 2018, the LCWSA took 117 Total Coliform Bacteria samples in the Consolidated water system. On July 17, 2018 and July 19, 2018, a total of two (2) samples tested positive for Total Coliform Bacteria and E. coli Bacteria on West Lake Road. Between July 20, 2018 and July 22, 2018, a total of five (5) samples tested positive for Total Coliform Bacteria on West Lake Road. A Boil Water Notice was issued on July 20, 2018. This section of West Lake Road was isolated from the remainder of the system and the LCWSA began temporarily supplying this area with water from the Town of Geneseo, beginning July 22, 2018. The Boil Water Notice was lifted on July 25, 2018, once additional water samples were collected and laboratory analysis results were reviewed by the Livingston County Department of Health, which determined that the water was safe for human consumption. On August 9, 2018, the LCWSA resumed supplying this section of West Lake Road with water from the LCWSA water supply (City of Rochester).

In 2018, the LCWSA took 24 total Total Coliform Bacteria samples in the Village of Livonia District. Of these samples, 0 tested positive for coliform bacteria.

In November 2018, the LCWSA violated the MCL for TTHM levels at the Groveland Station Upper Tank (7161 Groveland Hill Rd) sample location. In response to this, the LCWSA adjusted its chlorination operations and increased its flushing activities.

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 Safe Drinking Water Hotline (800-426-4791) or the Livingston County Health Department at (585) 243-7280.

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
Microbiological Contaminants							
Total Coliform ¹	Yes	7/17/2018, 7/19/2018, 7/20/2018, 7/21/2018, 7/22/2018,	7 positive samples	N/A	0	TT=2 or more positive samples in 1 month	Naturally present in the environment
E. coli Bacteria ²	Yes	7/17/2018, 7/19/2018	2 positive samples	N/A	0	One or more positive samples in 1 month	Human and animal fecal waste
Chlorine Residual	No	Daily (Entry Point – City of Rochester water supply) Monthly (Measured throughout distribution system)	Range (0.4 -1.5) Range (0.02-1.71)	mg/l	N/A	MRDL= 4.0	Water additive to control Microbes

Stage 2 Disinfection Byproducts - LCWSA Consolidated District ³							
Contaminant	Violation Yes/No	Date of Samples	Level Detected (Range)	Unit Measurement	MCLG	Regulatory Limit (MCL, TT or AL)	Likely Source of Contamination
TTHM - Site 1 7161 Groveland Hill Rd	Yes	5/17/17 8/15/17 11/21/17 2/14/18 5/9/18 8/17/18 11/14/18	81.25 ⁴ (63-100)	ug/L	N/A	80.0	Byproduct of drinking water chlorination needed to kill harmful organisms. TTHMs are formed when source water contains organic matter.
TTHM - Site 2 6170 East Lake Rd	No	5/17/17 8/15/17 11/21/17 2/14/18 5/9/18 8/17/18 11/14/18	60.00 (42-85)				
HAA - Site 1 7161 Groveland Hill Rd	No	5/17/17 8/15/17 11/21/17 2/14/18 5/9/18 8/17/18 11/14/18	26.75 (10-40)	ug/L	N/A	60.0	Byproduct of drinking water disinfection needed to kill harmful organisms.
HAA - Site 2 Site 2 6170 East Lake Rd	No	5/17/17 8/15/17 11/21/17 2/14/18 5/9/18 8/17/18 11/14/18	18.5 (15-23)				

Stage 2 Disinfection Byproducts - Village of Livonia Sites ³							
TTHM - Site 1 Livonia Fire Department	No	5/17/17 8/15/17 11/21/17 2/14/18 5/9/18 8/17/18 11/14/18	60 (46-89)	ug/L	N/A	80.0	Byproduct of drinking water chlorination needed to kill harmful organisms. TTHMs are formed when source water contains organic matter.
HAA - Site 2 51 Washington St.	No	5/17/17 8/15/17 11/21/17 2/14/18 5/9/18 8/17/18 11/14/18	25 (16-33)	ug/L	N/A	60.0	Byproduct of drinking water disinfection needed to kill harmful organisms.

Contaminant	Date of Sample	Detection Level Based on 90 th Percentile Sample	Unit Measured	AL	Likely Source
Lead ⁵	Jun 1-Sept 30, 2018	7.6 (ND-63)	ug/L/ug/L	15	Corrosion of household plumbing
Copper ⁶	Jun 1-Sept 30, 2018	0.63 (ND-630)	ug/L	1300	Corrosion of household plumbing

Notes:

1- Coliforms are bacteria that are naturally present in the environment and are used as an indicator that other, potentially harmful waterborne pathogens may be present or that a potential pathway exists through which contamination may enter the drinking water distribution system. We found coliforms indicating the need to look for potential problems in water treatment or distribution.

Notes (cont'd):

- 2 - E. coli are bacteria whose presence indicates that the water may be contaminated with human or animal wastes. Microbes in these wastes can cause short-term effects, such as diarrhea, cramps, nausea, headaches, or other symptoms. They may pose a special health risk for infants, young children, and people with severely compromised immune systems.
- 3 - Stage 2 TTHM and HAA samples were collected quarterly. This represents the highest running annual quarterly average calculated from data collected.
- 4 - Some people who drink water containing trihalomethanes in excess of the MCL over many years may experience problems with their liver, kidneys, or central nervous systems, and may have an increased risk of getting cancer.
- 5 - Lead and Copper: 90% of samples must be less than the Action Level (AL) 90th percentile. The City of Rochester collected 63 samples. Six out of 63 samples tested exceeded the Lead AL. Zero out of 63 samples exceeded the Copper AL. 5 of the 63 samples were collected from homes in the LCWSA Consolidated System and the Village of Livonia. None of those samples exceeded the AL for lead or copper.

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.

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.

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).

TTHM: Total Trihalomethanes (chloroform, bromodichloromethane, dibromochloromethane and bromoform)

HAA: Haloacetic Acids (mono-, di- and trichloroacetic acid, and mono- and di-bromoacetic acid)

WHAT DOES THIS INFORMATION MEAN?

The table shows that our system uncovered some problems this year. The MCLs for total coliform and E.coli contaminants were exceeded in the West Lake Road area of the Consolidated System from 7/17-7/22/18 resulting in a Boil Water Notice. In addition, the MCL for TTHMs was exceeded in the 4th quarter of 2018 resulting in public notification and corrective action. Both incidents were described previously in this report.

IS OUR WATER SYSTEM MEETING ALL RULES THAT GOVERN OPERATIONS? During 2018, our system was in compliance with applicable State drinking water operation, monitoring and reporting requirements.

We are required to provide the following information regarding 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 LCWSA, along with The City of Rochester Water Treatment Plant, 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 it for drinking or cooking. If you are concerned about lead in your drinking 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 www.epa.gov/your-drinking-water/basic-information-about-lead-drinking-water.

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).

INFORMATION FOR NON-ENGLISH SPEAKING RESIDENTS

This report contains important information about your drinking water. Translate it, or speak with someone who understands it.

Spanish

Este informe contiene información muy importante sobre su agua beber. Tradúzcalo ó hable con alguien que lo entienda bien.

HOW CAN I SAVE MONEY ON WATER?

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 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.
- ◆ 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.

For more information, log on to <http://www.dec.ny.gov/lands/5009.html>.

SYSTEM IMPROVEMENTS

The LCWSA operates & maintains the Village of Livonia district via an agreement with the Village of Livonia. The remainder of the service areas are leased/owned and operated by the LCWSA. The following improvements were completed in 2018:

- Numerous curb boxes were replaced;
- Chlorine analyzers are maintained on a semi-annual basis by HACH Instruments;
- At least four (4) major leaks were discovered and repaired, along with two (2) service lines that were repaired.
- Backflow Prevention program implemented for LCWSA customers.
- Water Main Extension from Conesus to the Groveland Correctional Facility was completed.

The following projects are in-progress and/or scheduled for completion in 2019:

- Leak detection will be on-going;
- Hydrant and Valve maintenance will take place in all service areas;
- Curb box replacements will be take place in all service areas.

BULK WATER AVAILABILITY

Water fill stations are located at the Town of Livonia Highway Department (50 Commercial St) and at the Town of Sparta Community Center (7351 Route 256).

CLOSING

Thank you for allowing us to continue providing your family with clean, quality water this year. In order to maintain a safe and dependable water supply, additional improvements may be necessary in the future. We will keep you informed of any significant changes in services. Please call LCWSA at (585) 346-3523 if you have any questions. In case of an Emergency, please call the LCWSA at (585) 346-3523. Questions regarding water billing should be directed to the LCWSA at (585) 346-3523 between the hours of 8:00am and 4:00pm (Monday - Friday).

*Annual Drinking Water Quality Report for 2018
Town of Geneseo Water District #3
(Public Water Supply ID# NY2530023)*

WHERE DOES OUR WATER COME FROM?

Water consumed by the Town of Geneseo Water District 3 is purchased from Livingston County Water and Sewer Authority (LCWSA). In 2018, the Town of Geneseo District 3 had 72 active service connections and served water to a population of 187. The total amount of water purchased was 617,000 gallons. As part of routine maintenance, the Town of Geneseo flushed approximately 21,000 gallons of water. The Town Water District rate was \$4.50 per 1,000 gallons plus a \$30.00 per quarter water service fee.

DO THE WATER DISTRICTS TEST OUR WATER?

The Town of Geneseo Water District also routinely monitors the drinking water for Total Coliform, Asbestos, Total Trihalomethanes (TTHM) and Haloacetic Acids (HAA5) in compliance with State and Federal drinking water standards. In 2018, the Town took 12 “at the tap” samples for the presence of coliform bacteria. Of these samples, 0 tested positive for coliform bacteria. The annual TTHM and HAA5 samples were not collected in August 2018. The missed sample is a violation of the Stage 2 Disinfection Byproducts Rule (DBPR).

Town of Geneseo, District 3							
Contaminant	Violation Yes/No	Date of Sample	Level Detected	Unit of Measure	MCLG or MRDLG	Regulatory Limit (MCL or MRDL)	Likely Source of Contamination
Chlorine Residuals Measured in Distribution							
Chlorine Residual	No	Monthly	Range (0.05-0.07)	mg/l	N/A	4.0	Water additive used to control microbes
Stage 2 Disinfection Byproducts							
Total Trihalomethanes (TTHMs)	No	8/15/17 ¹	62	ug/L	N/A	80	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	8/15/17 ¹	24	ug/L	N/A	60	By-product of drinking water disinfection.
Inorganics							
Asbestos	No	10/16/18	2	MFL	7	7	Decay of asbestos cement water mains and erosion of natural deposits.

Notes:

1 - The 2018 Disinfection by product samples were missed. Therefore, only the 2017 sample data is used for compliance.

DEFINITIONS

Maximum Contaminant Level (MCL) means the maximum permissible level of a contaminant in water, which is delivered to any user of a public water system.

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

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

Total Trihalomethane (TTHM) means the sum of the concentration of trichloromethane (chloroform), dibromochloromethane, bromodichloromethane and tribromomethane (bromoform).

Haloacetic acids (five) (HAA5) mean the sum of the concentrations in milligrams per liter of five specific haloacetic acid compounds.

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

Maximum Residual Disinfection Level (MRDL) is the level of disinfectant added for water treatment that may not be

exceeded at the customer's tap without an unacceptable possibility of adverse health effects.

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)

IS OUR WATER SYSTEM MEETING OTHER RULES THAT GOVERN OPERATIONS?

In 2018, the Town of Geneseo Water District 3 was in violation of the Stage 2 Disinfection Byproducts Rule (DBPR) because the August 2018 TTHM and HAA5 samples were missed. It should be noted that levels detected in 2017 were below the MCL. During 2018, our system was in compliance with all other applicable State drinking water operating, monitoring and reporting requirements. The Town of Geneseo Water District and LCDOH will continue to closely monitor the water system to ensure that the water quality is acceptable for all individuals being served.

BULK WATER AVAILABILITY:

The Town operates a water tank fill station at the storage tank site on Burbank Drive. This water is purchased from the Village of Geneseo Public Water Supply. This is a coin operated “water-salesman”. Currently rates for this bulk water are \$10.00 per 1000 gallons (\$.25 per 25 gallons).

Need More Information?

The Town of Geneseo Water Department can be reached at (585)243-1544 Monday through Thursday between 6AM and 4:30PM, for any questions regarding water service. In case of Emergency please call the Livingston County Water & Sewer Authority at (585)346-3523. Questions regarding water billing should be directed to the Livingston County Water & Sewer Authority at (585)346-3523 between the hours of 8:00AM and 4:00 PM.