2019 Water Quality Report for Lockport Township Water

This report covers the drinking water qualify for Lockport Township Water for the 2019 calendar year. This information is a snapshot of the quality of the water that we provided to you in 2019. Included are details about where your water comes from, what it contains, and how it compares to United States Environmental Protection Agency (U.S. EPA) and state standards.

Your water comes from two groundwater wells. Well #2 is 10" diameter and is 49 feet deep and is located on Arrowhead Drive. Well #3 is 12" diameter and is 51 feet deep and is located on Buckhorn Road. The State performed an assessment of our source water to determine the susceptibility or the relative potential of contamination. The susceptibility rating is on a seven-tiered scale from "very-low" to "very-high" based on geologic sensitivity, well construction, water chemistry and contamination sources. The susceptibility of source at well two is moderately high and well three is high.

There are no significant sources of contamination in our water supply.

The water quality report describing the source and quality of your drinking water is available at www.lockporttwp.com. To receive a paper copy in the mail, contact us at rhondawright49093@gmail.com or (269) 273-8593. Copies are also available at the Lockport Township Hall, 58982 Holtom Road, Three Rivers.

Additional Information:

Contaminants and their presence in water: Drinking water, including bottled water, may reasonably be 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 U.S. EPA's Safe Drinking Water Hotline (800-426-4791).

Sources of drinking water: The sources of drinking water (both tap water and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs, and wells. Our water comes from 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 activity.

Contaminants that may be present in source water include:

 Microbial contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations and wildlife.

- Inorganic contaminants, such as salts and metals, which can be naturally-occurring or result from urban stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining or farming.
- Pesticides and herbicides, which may come from a variety of sources such as agriculture, urban stormwater runoff and residential uses.
- Radioactive contaminants, which can be naturally occurring or be the result of oil and gas production and mining activities.
- Organic chemical contaminants, including synthetic and volatile organic chemicals, which are byproducts of industrial processes and petroleum production, and can also come from gas stations,
 urban stormwater runoff, and septic systems.

In order to ensure that tap water is safe to drink, the U.S. EPA prescribes regulations that limit the levels of certain contaminants in water provided by public water systems. Federal Food and Drug Administration regulations establish limits for contaminants in bottled water which provide the same protection for public health.

Vulnerability of sub-populations: Some people may be more vulnerable to contaminants 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 systems disorders, some elderly, and infants can be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. U.S. EPA/Center for Disease Control guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants are available from the Safe Drinking Water Hotline (800-426-4791).

Nitrate if detected: Nitrate in drinking water at levels above 10ppm is a health risk to infants of less than six months of age. High nitrate levels in drinking water can cause blue baby syndrome. Nitrate levels may rise quickly for short periods of time because of rainfall or agricultural activity. If you caring for an infant you should ask advice from your health care provider.

Educational information about lead: If present, elevated levels of 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. Lockport Township Water 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 at 1-800-426-4791 or at http://water.epa.gov/drink/info/lead/index.cfm.

Water Quality Data: The tables attached lists all the drinking water contaminants that we detected during the 2019 calendar year. The presence of these contaminants in the water does not necessarily indicate that the water poses a health risk. Unless otherwise noted, the data presented in this table is from testing done January 1 through December 31, 2019. The State allows us to monitor for certain contaminants less than once per year because the concentrations of these contaminants are not

expected to vary significantly from year to year. All the data is representative of the water quality, but some are more than one year old.

Service Lines: Lockport Township Water does not have any lead service lines, nor service lines of unknown material. There are 720 services lines on our system all of copper material.

Definitions:

- 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 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 using the best available treatment technology.
- N/A: Not applicable
- ND: not detectable at testing limit
- ppb: parts per billion or micrograms per liter
- ppm: parts per million or milligrams per liter
- <u>pCi/l</u>: picocuries per liter (a measure of radioactivity).
- Action Level (AL): The concentration of a contaminant which, if exceeded, triggers treatment or other requirements that a water system must follow.
- <u>Maximum residual disinfectant level goal (MRDLG)</u>: 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 contaminants.
- 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.
- Treatment Technique: A required process intended to reduce the level of a contaminant in drinking water.

Monitoring and Reporting to the Department of Environment, Great Lakes and Energy (EGLE), The State of Michigan and the U.S. EPA require us to test our water on a regular basis to ensure its safety. We met all the monitoring and reporting requirements for 2019.

We will update this report annually and will keep you informed of any problems that may occur throughout the year, as they happen. The water quality report describing the source and quality of your drinking water is available at www.lockporttwp.com. To receive a copy in the mail, contact us at (269) 273-8593 or e mail rhondawright49093@gmail.com. Copies are also available at the Lockport Township Hall, 58982 Holtom Road, Three Rivers This report will not be sent to you.

We invite public participation in decisions that affect drinking water quality. The Lockport Township Water Department meets the first Tuesday of each month at 6:00 pm at 58982 Holtom Road, Three Rivers unless otherwise posted. For more information about your water, or the contents of this report,

¹Sodium is not a regulated contaminant.

²Ninety (90) percent of the samples collected were at or below the level reported for our water.

contact Scott King at (269) 464-9528. For more information about safe drinking water, visit the U.S. EPA at http://www.epa.gov/safewater/lead.

Well #2							
Regulated Contaminant	MCL, TT,	MCLG or	Level Detected Range	Range	Year Sampled Violation	d Violation	Typical Source of Contaminant
	or MRDL	MRDLG				Yes/No	
Barium (ppm)	2	2	0.03		2011	ON	Discharge of drilling wastes; Discharge of metal refineries; Erosion of natural deposits
Nitrate (ppm)	10	6.4	4.6		4/16/19	ON	Runoff from fertilizer use;leaching from septic tanks, sewage; Erosion of natural deposits
Special Monitoring and Unregulated Contaminant***			Level	Sample Date			Typical Source of Contaminant
Sodium¹ (ppm)	N/A	N/A	s		4/16/2019	Q.	Erosion of natural deposits
Sulfate	80	N/A	36		4/16/2019	O _N	Byproduct of drinking water disinfection
Analyte	Method	Reg Limit	Range	Result			
Combined radium (pCi/L)	Calc	'n	0.73 =/-0.44	1.05 +-	4/11/2019	ON	Erosion of natural deposits
Inorganic Contaminant Subject Action to Action Levels (AL)	Action Level	MCLG	Your Water ²	Range of Results	Year Sampled	Number of Sames above AL	Typical Source of Contaminant
Lead (ppb)	15		4 PPB		2015	ON	Lead service lines, corrosion of household plumbing including fittings and fixtures; Erosion of natural deposits
Copper (ppm)	1300		30 PPB		2015	ON	Corrosion of household plumbing systems, Erosion of natural deposits
E Coli			NOT DETECTED		MONTHLY	NO N	
Arsenic			NOT DETECTED		MONTHLY	ON	

Well #3	34.0						
Regulated Contaminant	or MRDL	MCLG or MRDLG	Level Detected Range	d Range	Year Sampled Violation Yes/No	Violation Yes/No	Typical Source of Contaminant
Barium (ppm)	2	2	0.03		2011	ON	Discharge of drilling wastes; Discharge of metal refineries; Erosion of natural deposits
Nitrate (ppm)	10	4.0	4.6	7.8 5.7 3.8 6.8	1/1/2019 7.8 4/1/2019 5.7 7/1/2019 3.8 10/1/2019 6.8	NO 8	Runoff from fertilizer use;leaching from septic tanks, sewage; Erosion of natural deposits
Special Monitoring and Unregulated Contaminant***			Level	Sample Date			Typical Source of Contaminant
Sodium¹ (ppm)	N/A	N/A	∞		4/16/2019	ON	Erosion of natural deposits
Sulfate	80	N/A	41		4/16/2019	ON.	Byproduct of drinking water disinfection
Analyte	Method	Reg Limit	Range	Result			
Combined radium (pCi/L)	Calc	IJ.		1.05 +-			Erosion of natural deposits
Inorganic Contaminant Subject Action to Action Levels (AL)	Action Level	MCLG	Your Water ²	Range of Results	Year Sampled	Number of Sames above AL	Typical Source of Contaminant
Lead (ppb)	15	4 PPB			2015	ON	Lead service lines, corrosion of household plumbing including fittings and fixtures; Erosion of natural deposits
Copper (ppm)	1300	300 PPB			2015	ON	Corrosion of household plumbing systems; Erosion of natural deposits
E Coli			NOT DETECTED		MONTHLY	ON ON	
Arsenic			NOT DETECTED		MONTHLY	ON	