2016 Annual Quality Drinking Water Report
City of Otsego, Michigan
July 1, 2017

The City of Otsego is very pleased to provide you with this year's Annual Quality Water Report. We want to keep you informed about the excellent water and services we have delivered to you over the past year. Our goal is and always has been to provide to you a safe and dependable supply of drinking water. Our water source is obtained from groundwater wells located in Brookside Park. We have three wells that draw from an alluvial glacial drift aquifer. As the water is pumped from the ground, fluoride is added to aid in the prevention of tooth decay, phosphate is added for iron treatment, and chlorine is used as a disinfectant to kill viruses and bacteria. The clean water is then pumped into the distribution system.

The State performed an assessment of our source water in 2003 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 primarily on geologic sensitivity, water chemistry and contaminant sources. The susceptibility of our source is moderately high for each well.

Significant potential sources of contamination include the closed Otsego Township Landfill and the Otsego/Alamo Drain. We are making efforts to protect our sources by participation in the Wellhead Protection Program.

A copy of the report can be obtained by making a request to Otsego City Hall, 117 E. Orleans Street, Otsego, Michigan, 49078 or contact Luke Keyzer at 269-694-9194.

The City of Otsego is pleased to report that our drinking water is safe and meets all federal and state requirements. The charts contained in this report show that any contaminants detected in your water are within Environmental Protection Agency (EPA) guidelines.

We routinely monitor for various constituents in your drinking water according to Federal and State laws. The water quality table in this report is for the period of January 1 to December 31, 2016.

As water travels over the land or underground, it can pick up substances or contaminants such as microbes, inorganic and organic chemicals, and radioactive substances. All drinking water, including bottled drinking water, may be reasonably expected to contain at least small amounts of some constituents. It is important to realize that the presence of these constituents does not necessarily pose 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).**

MCL's are set at very stringent levels. To understand the possible health effects described for many regulated constituents, a person would have to drink 2 liters of water every day at the MCL level for a lifetime to have a one-in-a-million chance of having the described health effect.

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as 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. EPA/CDC 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).**

To help you better understand the terms and abbreviations in this report we have provided the following definitions.

Non-detects (ND) - laboratory analysis indicates that the constituent is not present.

Parts per million (ppm) or Milligrams per liter (mg/l) - one part per million corresponds to one minute in two years or a single penny in $10,000.

Parts per billion (ppb) or Micrograms per liter - one part per billion corresponds to one minute in 2,000 years or a single penny in $10,000,000.

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 - The "Maximum Allowed" (MCL) is the highest level of a contaminant that is allowed in drinking water. MCL's are set as close to the MCLG's as feasible using the best available treatment technology.

Maximum Contaminant Level Goal - The "Goal"(MCLG) is the level of a contaminant in drinking water below which there is no known or expected risk to health. MCLG's allow for a margin of safety.

Running Annual Average (RAA) - For most contaminants, the RAA is calculated quarterly.

Maximum Residual Disinfectant Level (MRDL) - Highest level of disinfectant allowed in drinking water; there is convincing evidence that use of a disinfectant is necessary to control microbial.

Maximum Residual Disinfectant Level Goal (MRGDL) - Level of drinking water disinfectant below which there is no known or expected risk to health. MRGDL's do not reflect the benefits of the use of disinfectants to control microbial contaminants.

OTSEGO 2016 WATER QUALITY DATA

REGULATED SUBSTANCES

Substance	Violation	Range Detected	Highest Level Detected	Unit of Measurement	MCLG	MCL	Likely Source of Contamination
Nitrate (as Nitrogen)	No	0-1.1	1.1	ppm	10	10	Erosion of natural deposits
Fluoride	No	0.13-0.62	0.62	ppm	4	4	Water Treatment
Barium (test date 07/13/2009)	No	0.10-0.12	0.12	ppm	2	2	Erosion of natural deposits
Arsenic (test date 08/23/2012)	No			ppb	0*	10*	Erosion of natural deposits

Substance	Violation	Highest RAA	Range Detected	Highest level Detected	Unit of Measurement	MRDL	MCL	Likely Source of Contaminate
Total Trihalomethanes	No	11.3	11.3	13.7	ppb		80	Disinfection By Products
Total Halo Acetic Acid	No	2	2	6	ppb		60	Disinfection By Products
Chlorine Residual	No	0.44	0.21 - 0.60	0.60	ppm	4.0		Water Treatment

REGULATED AT CUSTOMER TAP

Copper and Lead	Violation	90th Percentile Detected	Units	No. of sites above AL	MCLG	Action Level	Likely Source
Copper (September 2015)	No	.418	ppm	0	1.3	AL= 1.3ppm	Corrosion of household plumbing
Lead (September 2015)	No	0	ppb	0	0	AL= 15.0ppb	Corrosion of household plumbing

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. The City Of Otsego 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 or at http://www.epa.gov/safewater/lead.

SPECIAL & UNREGULATED MONITORING

Substance	Average Level Detected	Range of Values Detected
Sulfate	31 ppm	28-34 ppm
Hardness(as CaCO3)	260 ppm or 15.2 grains hardness	251-268 ppm
Sodium	30 ppm	26-37 ppm

The City of Otsego is committed to providing you safe, reliable, and healthy water. We appreciate the opportunity to provide this report to you to keep you fully informed about your water. This report will be provided to you annually on July 1. For more information about your water, or the contents of this report please contact Luke Keyzer **(269) 694-9194** or City Hall **(269) 692-3391.** You are encouraged to attend our regularly scheduled City Commission meetings which are held on the first and third Monday of each month at 7p.m. at the **Otsego City Hall.**