

2017 Water Quality Report for WATERSMEET TOWNSHIP

This report covers the drinking water quality for the Watersmeet Township water supply for the calendar year 2017. Included are details about where your water comes from, what it contains, and how it compares to Environmental Protection Agency (EPA) and state standards.

Your water is supplied from three groundwater wells located north of town on the west side of US-45 and one well located on the east side of US-45. Well depths are, well 1-60', well 2-102', well 3-95', and well 4-61'

To discuss this report, contact us at the Watersmeet Township office located at N4689 1st street or call (906) 358-4501 Monday through Friday 7:00 am to 3:00 pm c.s.t.

- **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 **EPA's Safe Drinking Water Hotline (800-426-4791)**.
- **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. 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).
- **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 and residential uses.
- **Radioactive contaminants**, which are 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 by-products of industrial processes and petroleum production, and can also come from gas stations, urban stormwater runoff, and septic systems.

STATEMENT 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. Watersmeet Township 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>.

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

Water Quality Data

The table below lists all the drinking water contaminants that we detected during the 2017 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 – December 31, 2017. 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 of the data is representative of the water quality, but some are more than one year old.

Terms and abbreviations used below:

- **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 **pCi/l:** picocuries per liter (a measure of radioactivity).

Regulated Contaminant	MCL	MCLG	Level Detected	Sampled	Violation	Typical Source of Contaminant
Flouride (ppm)	4	4	0.17	9/17	N	Erosion of natural deposits.
Nitrate (ppm)	10	10	0.86	9/17	N	Erosion of natural deposit; leaching from septic tanks; fertilizer runoff.
Arsenic (ppb)	10	0	0.5	2016	N	Erosion of natural deposits
Nickel (ppb)	N/A	N/A	0.9	2016	N	Erosion of natural deposits
Barium (ppm)	2	2	0.91	2016	N	Erosion of natural deposits
Unregulated Contaminant *			Level Detect	Sampled	Violation	
Sodium (ppm)			31	9/17	No	Erosion of natural deposits.
Contaminant Subject to AL	Action Level	90% of Samples ≤ This Level	Sampled	Number of Samples Above AL	Typical Source of Contaminant	
Lead (ppb)	15	1	2016	0	Corrosion of household plumbing systems; Erosion of natural deposits.	
Copper (ppb)	1300	288	2016	0	Corrosion of household plumbing systems; Erosion of natural deposits.	

*Unregulated contaminants are those for which EPA has not established drinking water standards. Monitoring helps EPA to determine where certain contaminants occur and whether it needs to regulate those contaminants.

Microbial Contaminants	MCL	MCLG	Number Detected	Violation Yes / No	Typical Source of Contaminant
Total Coliform Bacteria	N/A	N/A	2	No	Naturally present in the environment.

Coliforms are a 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. When this occurs, we are required to conduct assessment(s) to identify problems and to correct the problems that were found during these assessments.

During the monitoring period from 9/1/2017 to 9/30/2017 we did not take the required number of routine samples for total coliform bacteria. This violation did not pose a threat to the quality of the drinking water. On October 25, 2017 we collected a total coliform sample and returned to compliance.

During the 2017 calendar year, we were required to conduct one level 1 assessment. One level 1 assessment was completed. In addition, we were required to take one corrective action and we completed this action.

For more information about safe drinking water, visit the U.S. Environmental Protection Agency at www.epa.gov/safewater/.

Watersmeet Water / Wastewater Users

The annual "Consumer Confidence Report" regarding the quality of drinking water for the customers of the Watersmeet Water Systems for the year ended December 31, 2017 are available upon request at the township offices located at, N4689 1st Street Watersmeet , MI 49969 weekdays from 7:00 am to 3:00 pm c.s.t. These reports will not be mailed to the residents of Watersmeet Township.

Sandy Mansfield, Clerk / Watersmeet Township