

2008 Water Quality Report for Village of Fowlerville

This report has been prepared to inform the customers of the Village of Fowlerville's water treatment system of the quality of their drinking water. Your drinking water complied with all Environmental Protection Agency (EPA) and Michigan State drinking water health standards for the latest sampling period. Included in this report are details about where your water comes from, what it contains, and how it compares to EPA and State standards.

Your water comes from 5 groundwater wells, each over 250 feet deep. A geologic sensitivity analysis of the Village of Fowlerville's production wells determined the susceptibility of Well # 9 is moderately high; Well # 10 is moderately high; Well #11 is moderately high; Well #12 is moderately low; and Well #13 is moderately low. 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.

For more information regarding this report please contact the Director of Public Works, Erin Daksiewicz, at (517) 223-3771 Ext. 18 or via e-mail at erind@fowlerville.com.

- **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: Infants, some elderly, or immune-compromised persons such as those undergoing chemotherapy; those who have undergone organ transplants; those who are undergoing treatment with steroids; and people with HIV/AIDS or other immune systems disorders can be particularly at risk from infections. If you are in one of the categories listed above you may be more vulnerable than the general population to certain contaminants in drinking water. You should seek advice about drinking water from your physician or health care provider.

- **Sources of drinking water:** In general, 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 include anything found in water; they are generally not harmful at low levels. Removing all contaminants would be extremely expensive and in nearly all cases would not provide greater protection of health.

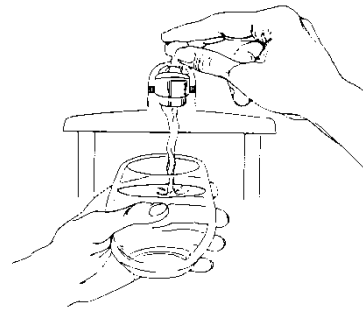
Examples of contaminants that may be present in source water in general include:

- **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 storm water 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 storm water 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 by-products of industrial processes and petroleum production which can also come from urban storm water runoff and septic systems.

In order to ensure that tap water is safe to drink, the 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.

The latest available information for the contaminants detected in our water during the 2008 calendar year is given in the following table. The presence of these contaminants in the water does not necessarily indicate that the water poses a health risk. The EPA does not require some contaminants to be monitored annually because their concentrations are not expected to vary.



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.
- **Maximum Residual Disinfectant Level (MRDL):** means 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):** means 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.
- **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).
- **Action Level (AL):** The concentration of a contaminant which, if exceeded, triggers treatment or other requirements that a water system must follow.

Water Quality Data

Regulated Contaminant	MCL	MCLG	Your Water	Range	Sample Date	Violation Yes / No	Typical Source of Contaminant
Arsenic (ppb)	10	0	2	0 - 2	2005	No	Erosion of natural deposits; Runoff from orchards; Runoff from glass and electronics production wastes
Barium (ppm)	2	2	.20	.15 - .25	2002	No	Discharge of drilling wastes; Discharge of metal refineries; Erosion of natural deposits
Selenium (ppb)	0.001	0.05	.001	0.001-0.05	2008	No	Discharge from petroleum and metal refineries; Erosion of natural deposits; Discharged from mines
Fluoride (ppm)	4	4	1.0	.63 – 1.0	2008	No	Erosion of natural deposits. Discharge from fertilizer and aluminum factories.
TTHM - Total Trihalomethanes (ppb)	80	N/A	0.5	0.0 -0.5	2005	No	Byproduct of drinking water disinfection
Chlorine (ppm)	MRDL	MRDLG	.59	.37 - .80	2005	No	Water additive used to control microbes (Water disinfection)
	4	4					
Radioactive Contaminant	MCL	MCLG	Your Water	Range	Sample Date	Violation Yes / No	Typical Source of Contaminant
Combined radium (pCi/L)	5	5	2	0 - 2	2002	No	Erosion of natural deposits
Special Monitoring and Unregulated Contaminant *			Your Water	Range	Sample Date	Typical Source of Contaminant	
Sodium (ppm)			70	49-92	2008	Erosion of natural deposits	
Sulfate (ppm)			32	22-42	2008	Erosion of natural deposits	
Chloride (ppm)			113	89-137	2008	Erosion of natural deposits	
Iron (ppm)			.7	.4 -1.0	2008	Naturally occurring in water of natural deposits	
Hardness (ppm as CaCO3)			326.5	281-372	2008	Naturally occurring in water	

Contaminant Subject to AL	Action Level	MCLG	90% of Samples ≤ This Level	Sample Date	Number of Samples Above AL	Typical Source of Contaminant
Copper (ppm)	1.3	1.3	0.12	2008	0	Corrosion of household plumbing systems; Erosion of natural deposits; Leaching from wood preservatives
Lead (ppm)	0.015	0	0.002	2008	0	Corrosion of household plumbing; Erosion of natural deposits.

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

Information about Lead: If present, elevated levels of lead can cause serious health problems, especially for pregnant woman and young children. Lead in drinking water results primarily from materials and components associated with service lines and home plumbing. The Village of Fowlerville 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, test 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>.

Microbial Contaminants	MCL	MCLG	Number Detected	Violation Yes / No	Typical Source of Contaminant
Total Coliform Bacteria	1 positive monthly sample (5% of monthly samples positive)	0	0	No	Naturally present in the environment
Fecal Coliform and <i>E. coli</i>	Routine and repeat sample total coliform positive, and one is also fecal or <i>E. coli</i> positive	0	0	No	Human and animal fecal waste

This report will be updated annually. Copies are available at the Village Office, located at 213 South Grand Ave. or by calling (517) 223-3771. EXT. 10 or at our web site: www.fowlerville.org. This report will not be sent to you.

Public input concerning the Village of Fowlerville Water System may be made at regularly scheduled Council Meetings, held every other Monday at 7:30 p.m. at 213 South Grand Ave. Fowlerville, MI. Please call the Village Hall for more information.