

VILLAGE OF BERRIEN SPRINGS

2016 Consumer Confidence Report

Is my water safe?

We are pleased to present this year's Annual Water Quality Report (Consumer Confidence Report) as required by the Safe Drinking Water Act (SDWA). This report is designed to provide details about where your water comes from, what it contains, and how it compares to standards set by regulatory agencies. This report is a snapshot of last year's water quality. We are committed to providing you with information because informed customers are our best allies.

Do I need to take special precautions?

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 system 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/Centers for Disease Control (CDC) guidelines on appropriate means to lessen the risk of infection by *Cryptosporidium* and other microbial contaminants are available from the Safe Water Drinking Hotline (800-426-4791).

Where does my water come from?

Your water comes from four groundwater wells; two of the wells are centrally located in the Village limits, while the other two are located in a well field North East of town.

Source water assessment and its availability

In 2003, The State performed an assessment of our source water. Using information from our Wellhead Protection Program our water supply was ranked as "moderately sensitive" by the State. A full copy of the Source Water Assessment is available at the Village Hall during regular business hours.

Why are there contaminants in my drinking 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 Environmental Protection Agency's (EPA) Safe Drinking Water Hotline (800-426-4791).

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, in some cases, radioactive material, and can pick up substances resulting from the presence of animals or from human activity: microbial contaminants, such as viruses and bacteria, that 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; 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 storm water runoff, and septic systems; and radioactive contaminants, which can be naturally occurring or be the result of oil and gas production and mining activities. 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 (FDA) regulations establish limits for contaminants in bottled water, which must provide the same protection for public health.

How can I get involved?

We want our customers to be informed about their water utility. If you want to learn more, please attend any of our regularly scheduled meetings. The Public Utilities Committee meets the second Wednesday after the first Monday of each month at 5:30 PM at the Village Hall. The Village Hall is located at 112 North Cass Street; hours are from 8:00 AM to 4:30 PM.

Description of Water Treatment Process

Your water is treated by disinfection. Disinfection involves the addition of chlorine or other disinfectants to kill bacteria and other microorganisms (viruses, cysts, etc.) that may be in the water. Disinfection is considered to be one of the major public health advances of the 20th century.

Water Quality Data Table

In order to ensure that tap water is safe to drink, EPA prescribes regulations which limit the amount of contaminants in water provided by public water systems. The table below lists all of the drinking water contaminants that we detected during the calendar year of this report. Although many more contaminants were tested, only those substances listed below were found in your water. All sources of drinking water contain some naturally occurring contaminants. At low levels, these substances are generally not harmful in our drinking water. Removing all contaminants would be extremely expensive, and in most cases, would not provide increased protection of public health. A few naturally occurring minerals may actually improve the taste of drinking water and have nutritional value at low levels. Unless otherwise noted, the data presented in this table is from testing done in the calendar year of the report. The EPA or the State requires us to monitor for certain contaminants less than once per year because the concentrations of these contaminants do not vary significantly from year to year, or the system is not considered vulnerable to this type of contamination. As such, some of our data, though representative, may be more than one year old. In this table, you will find terms and abbreviations that might not be familiar to you. To help you better understand these terms, we have provided the definitions below the table.

CONTAMINANTS	MCLG OR MRDLG	MCL TT OR MRDL	YOUR WATER	RANGE		SAMPLE DATE	VIOLATION	TYPICAL SOURCES
				LOW	HIGH			
DISINFECTANTS & DISINFECTION BY-PRODUCTS								
(There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants)								
TTHMs [Total Trihalomethanes] (ppb)	NA	80	10.2	0.7	10.2	2016	NO	By-product of drinking water disinfection
Chlorine (as Cl ₂) (ppm)	4	4	0.95	0.22	1.4	2016	NO	Water additive used to control microbes
Chloramine (as Cl ₂) (mg/L)	4	4	1.06	0.27	1.65	2016	NO	Water additive used to control microbes

INORGANIC CONTAMINANTS								
Nitrate [measured as Nitrogen] (ppm)	10	10	1.6	0	1.6	2016	NO	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
Sodium (optional) (ppm)		MPL	31	5	31	2016	NO	Erosion of natural deposits; Leaching
Fluoride (ppm)	4	4	0.14	0	0.14	2016	NO	Erosion of natural deposits; Water additive which promotes strong teeth; Discharge from fertilizer and aluminum factories

Undetected Contaminants								
The following contaminants were monitored for, but not detected, in your water.								
Arsenic (ppb)	0	10	0	0	0	2015	NO	Erosion of natural deposits; Runoff from orchards; Runoff from glass and electronics production wastes

Microbiological Contaminants								
CONTAMINANTS	MCLG OR MRDLG	MCL TT OR MRDL	YOUR WATER	SAMPLE DATE	VIOLATION	TYPICAL SOURCES		
Fecal coliform/E. coli - in the distribution system (positive samples)	0	0	0	2016	NO	Human and animal fecal waste		
Total Coliform (positive samples/month)	0	0	0	2016	NO	Naturally present in the environment		
A violation occurs when a routine sample and a repeat sample, in any given month, are total coliform positive, and one is also fecal coliform or E. coli positive.								

Lead and Copper						
CONTAMINANTS	MCLG	AL	YOUR WATER	# OF SAMPLES EXCEEDING AL	VIOLATION	TYPICAL SOURCES
COPPER - Action level at consumer taps (ppm) 90th Percentile	1.3	1.3	0.3	0	NO	Corrosion of household plumbing systems; Erosion of natural deposits
LEAD - Action level at consumer taps (ppb) 90th Percentile	0	15	3	0	NO	Corrosion of household plumbing systems; Erosion of natural deposits

Additional Information for Lead

Your water for lead and copper represents the 90th percentile. This means that 90% of the samples collected were equal to or less than this level. 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. Village of Berrien Springs 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>.

Important Drinking Water Definitions	
Term	Definition
MCLG	MCLG: Maximum Contaminant Level Goal: 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.
MCL	MCL: Maximum Contaminant Level: 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.
TT	TT: Treatment Technique: A required process intended to reduce the level of a contaminant in drinking water.
AL	AL: Action Level: The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.
Variances and Exemptions	Variances and Exemptions: State or EPA permission not to meet an MCL or a treatment technique under certain conditions.
MRDLG	MRDLG: Maximum residual disinfection level goal. 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.
MRDL	MRDL: Maximum residual disinfectant level. 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.
MNR	MNR: Monitored Not Regulated
MPL	MPL: State Assigned Maximum Permissible Level
For more information please contact:	

Contact Name: David Kunde

Address:

112 North Cass

Berrien Springs, MI 49103

Phone: 269-473-6921

Fax: 269-473-1188

E-Mail: berriensprings@sbcglobal.net

Website: www.villageofberriensprings.com