

City of Bellbrook Water Quality Report

March 2015

A Publication of the City of Bellbrook



2014 Water Quality Report Overview

The Environmental Protection Agency (EPA) requires all community water systems to annually provide a water quality report to their customers. The Bellbrook Water Department is proud of the fine drinking water it provides and is pleased to show that it meets all water quality standards. This annual water quality report shows the source of water, lists the results of tests, and contains important information about water and health. The Bellbrook Water Department will notify you if there is ever any reason for concern about your water. The City of Bellbrook has a current, unconditioned license to operate the water system.

The City of Bellbrook continues to improve the water system. In 2011, the City completed an addition to the existing water treatment plant which was built in 1996. The water treatment plant provides a reliable supply of quality water to the nearly 10,000 consumers served. The new addition provides the ability to treat more water, as well as provide more storage for times of high usage. With these and other improvements, the City provides excellent water service at rates that are consistently close to the regional average.

Water Source

The source of Bellbrook's drinking water is ground water pumped from wells drilled into the aquifer that lies beneath the City. The aquifer extends the length of the Miami Valley. Residents are encouraged to report activity or spills that could cause contamination of the aquifer.

The aquifer has a high susceptibility to contamination. This is due to its sensitive nature and the existing potential contaminant sources identified. This does not mean that the well field will become contaminated; only that conditions are such that the ground water could be impacted by potential contaminant sources. Future contamination can be avoided by implementing protective measures. More detailed information is available in the City's Wellhead Protection Report and Susceptibility Analysis, which can be obtained by contacting Ryan Pasley, Water Foreman, at (937) 848-8415.



Required Additional Health Information

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. The Food and Drug Administration regulations establish limits for contaminants in bottled water that must provide the same protection for public health. 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 Safe Drinking Water Hotline at (800) 426-4791.

The sources of drinking water, both tap 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. Contaminants that may be present in source water include:

- A. *Microbial contaminants*, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations and wildlife.
- B. *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.
- C. *Pesticides and herbicides*, which may come from a variety of sources such as agriculture, urban storm water runoff, and residential uses.
- D. *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.
- E. *Radioactive contaminants*, which can be naturally occurring or be the result of oil and gas production and mining activities.

City of Bellbrook Water Quality Report

Required Additional Health Information Continued

Some people may be more vulnerable to contaminants in drinking water than the general population. Immune-compromised persons such as individuals with cancer undergoing chemotherapy, persons who have undergone organ transplants, people with HIV/AIDS or other immune system disorders, some elderly, and some infants can be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. The Centers for Disease Control and Prevention and EPA guidelines on appropriate means to lessen the risk of infection by cryptosporidium and other microbial contaminants (which, while rare, are more likely to be found in surface water sources than in the ground water used here) are available from the EPA Safe Drinking Water Hotline at (800) 426-4791.

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Infants and children who drink water containing lead in excess of the action level could experience delays in their physical or mental development. Children could show slight deficits in attention span and learning abilities. Adults who drink this water over many years could develop kidney problems or high blood pressure. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. The City of Bellbrook 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 thirty seconds to two 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. A list of laboratories certified in the State of Ohio to test for lead may be found at www.epa.state.oh.us/ddagw or by calling (614) 644-2752. Information on lead in drinking water, testing methods and steps you can take to minimize exposure is available from the EPA Safe Drinking Water Hotline at (800) 426-4791 or at www.epa.gov/safewater/lead.

We encourage public interest and participation in our community's decisions affecting drinking water. Regular City Council meetings are scheduled at 7:00 PM on the second and fourth Mondays of each month at 15 East Franklin Street. The Water Foreman will be happy to answer any questions about Bellbrook water quality. Please call (937) 848-8415. For further information, go to the EPA Ground Water & Drinking Water web site at www.epa.gov/safewater.

Water Quality Data Table

Listed are 20 tests in which any level of contaminant (regardless of how small the amount) was detected in Bellbrook's drinking water for the most recent date up to and including 2014. All detected levels are far below allowed limits. Not listed are over 200 other tests in which **no contaminants** were detected.

The data presented in this report is from the most recent testing done in accordance with EPA regulations by the Bellbrook Water Department. Terms used in the Water Quality Table and in other parts of this report are defined here:

- ◆ **Parts per Million (ppm):** or Milligrams per Liter (mg/L) are units of measure for concentration of a contaminant. A part per million corresponds to one second in a little over 11.5 days.
- ◆ **Parts per Billion (ppb):** or Micrograms per Liter (ug/L) are units of measure for concentration of a contaminant. A part per billion corresponds to one second in 31.7 years.
- ◆ **Maximum Contamination 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 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.
- ◆ **Action Level (for Lead and Copper):** the concentration of a contaminant, which, if exceeded, triggers treatment or other requirements which a water system must follow.

Contaminant	Date Tested	Units	MCL	MCLG	Highest Level Found	Range of Detection	Major Sources	Violation
Inorganic Contaminant								
Fluoride	2014	ppm	4.0	4.0	1.09 2/17/14	.96-1.09	Erosion of natural deposits; water additive to promote strong teeth	No
Nitrite	3/29/11	ppm	1.0	1.0	<.02	N/A	Erosion of natural deposits	No
Lead **	Aug-14	ppb	AL=15.0	15.0	309	<5.0-309 (90%) 15.2	Corrosion of household plumbing	no
Copper *	Aug-14	ppb	AL=1300	1300	515	12-515 (90%) 266	Corrosion of household plumbing	No
Asbestos	7/22/11	mfl	≥10 Microns	0	0.17	0.17	Product used in A/C Water Main	No
Nitrate	3/10/14	ppm	10.0	10.0	0.93	N/A	Erosion of natural deposits; runoff from fertilizer use	No
Barium	7/21/14	ppm	2.0	2.0	0.11	N/A	Erosion of natural deposits.	No

City of Bellbrook Water Quality Report

Contaminant	Date Tested	Units	MCL	MCLG	Highest Level Found	Range of Detection	Major Sources	Violation
Volatile Organic Contaminant								
Bromodi-Chloro-Methane	7/30/14	ppb	***	***	3.50-13.93	N/A	1 of 4 by-products of chlorination –TTHM's	No
Dibromo-Chloro-Methane	7/30/14	ppb	***	***	3.92-10.14	N/A	1 of 4 by-products of chlorination –TTHM's	No
Chloroform	7/30/14	ppb	***	***	1.76-15.60	N/A	1 of 4 by-products of chlorination –TTHM's	No
Bromoform	7/30/14	ppb	***	***	1.29-2.65	N/A	1 of 4 by-products of chlorination –TTHM's	No
Dibromoacetic Acid	7/30/14	ppb	****	****	1.627-2.283	N/A	By-product of drinking water chlorination HAA5	No
Dichloroacetic Acid	7/30/14	ppb	****	****	1.205-4.212	N/A	By-product of drinking water chlorination HAA5	No
Trichloroacetic Acid	7/30/14	ppb	****	****	<1.00-2.65	N/A	By-product of drinking water chlorination HAA5	No
Total Trihalomethanes	7/30/14	ppb	80	0	10.47-42.32	3.02-18.04	By-product of drinking water chlorination	No
HAA5 (Halacetic Acids) Total	7/30/14	ppb	60	0	2.832-9.145	<1.0-2.3	By-product of drinking water chlorination	No
Toluene	7/25/11	ppm	1.0	1.0	0.00054	N/A	Petroleum discharge	No
Residual Disinfectants								
Total Chlorine	Highest qtrly running ann avg Qtr 1	ppm	MRDL 4	MRDLG 4	1.17	N/A	Water additive used to control microbes	No
Synthetic Organic Contaminant								
Alachlor	3/19/12	ppb	2	0	<0.10	N/A	Herbicide Runoff	No
Atrazine	3/19/12	ppb	3	3	<.071	N/A	Herbicide Runoff	No
Simazine	3/19/12	ppb	4	4	<.051	N/A	Herbicide Runoff	No

Key to Table		
AL=Action Level	ppb=parts per billion or micrograms per liter (ug/l)	* =20 samples, none above AL
MCL= Max. Contamination Level	N/A=Not Applicable	** =20 samples, two above AL
MCLG=Max. Contamination Level Goal	TTHM=Total Trihalomethanes	*** =Added together not to exceed 80 ppb for TTHMs
ppm=parts per million or milligrams per liter (mg/l)	HAA5=Halacetic Acids	**** =Added together not to exceed 60 ppb for HAA5

Online Option to Pay Your Water Bill

E-Bills Residents can receive their Bellbrook Utility invoice electronically. Visit the Utility Billing page on the city's web site at www.cityofbellbrook.org to sign up for this service. Current and past invoices are available for customers to view.

Pay Online Residents can pay their invoices over the internet with a credit card or checking account. Visit the City's web site for additional information. A transaction fee will apply for credit card payments.

Common Water Customer Questions

How and where can I pay my bill?

- ◆ Pay online – Credit card and ACH payments are accepted via the web.
- ◆ Pay by mail – Payments are posted on date of receipt.
- ◆ Pay at the drop box – The secure drop box is located at the Utility Billing office.
- ◆ Pay in person – 15 East Franklin Street, Bellbrook, Ohio 45305.

What is the hardness of our city water?

- ◆ Elements that contribute to water hardness are calcium and magnesium. The city's water hardness is about 18.22 grains per gallon or 312 milligrams per liter.

What could cause a higher than normal water bill?

- ◆ If it is summer, many residents' water usage increases both inside and out. More bathing, more laundry, filling swimming pools, watering lawns and gardens all add up to higher than normal water bills.
- ◆ Undetected leaks can also cause one's bill to increase. Check your toilets and other plumbing fixtures including outside faucets and hose bibs. It may be necessary to have a plumber inspect your plumbing system.

City of Bellbrook Water Quality Report

City of Bellbrook
15 East Franklin Street
Bellbrook, Ohio 45305



Administration Office

15 East Franklin Street
(937) 848-4666

Utility Billing Office

15 East Franklin Street
(937) 848-4638

Service Department

29 North West Street
(937) 848-8415

Visit Our Website!
www.cityofbellbrook.org

City of Bellbrook Water Quality Report

Hydrant Flushing

The annual **fire hydrant flushing** will occur in the fall. Dates and times will be announced in the August edition of the City Newsletter and on the city's website.

Please avoid doing **laundry** during this time. If discoloration of laundry occurs, a **special detergent** is available from the City's Utility Billing Office. If you use a **water softener**, please set it to "**by-pass**" during this week. Water may appear rusty during the process, but will return to normal when the process is complete.

If you have any questions regarding Hydrant Flushing, please contact the Utility Billing Office at (937) 848-4638.



Water Rates Remain Steady

In February, City Council decided not to increase water rates in 2015. This is the fourth consecutive year that water rates have remained stable. According to the annual *City of Oakwood Water and Sewer Rate Survey*, the City of Bellbrook is currently below average in what residents pay for water service.

Website

Visit the Utility Billing page on the City's website at www.cityofbellbrook.org. You will be able to find helpful information about the water system, billing, and other services. City residents pay for waste collection as part of their water bill. Waste and recycling information can also be found on our website under the Utility Billing department.