



CITY OF BELLBROOK COMMUNITY REPORT

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City of Bellbrook – 2007 Annual Water Quality Report

Beginning with 1998, all public water systems will distribute to customers an annual report on water quality. The data shown here and much more detailed information has always been available upon request from the City of Bellbrook. We look forward to answering any of your questions.

Water Source

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

The aquifer that supplies drinking water to the City of Bellbrook has a high susceptibility to contamination. This is due to the sensitive nature of the aquifer in which the drinking water well is located and the existing potential contaminant sources identified. This does not mean that this wellfield 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 calling Ryan Pasley, Water Foreman, at 848-8415.

Required Additional Health Information

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. FDA 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 Environmental Protection Agency's Safe Drinking Water Hotline (800-426-4791).

The sources of drinking water (both tap water and bottled water) includes 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.

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. EPA/CDC 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 groundwater used here) available from the Safe Drinking Water Hotline (800-426-4791).

We encourage public interest and participation in our community's decisions affecting drinking water. Regular City Council meetings usually occur at 7:30 p.m. on the second and fourth Monday of each month at 15 E. Franklin St. The public is welcome. The Water Foreman will be happy to answer any questions about Bellbrook water quality. Please call (937) 848-8415. For further information, see US Environmental Protection Agency (EPA) water information at www.epa.gov/safewater/.

The USEPA issued a rule in August 1998 requiring all community water systems to annually provide to their customers the following water quality report. The Bellbrook Water Department is proud of the fine drinking water it provides. This annual water quality report shows the source of our water, lists the results of our tests, and contains much important information about water and health. The Bellbrook Water Department will notify you if there is any reason for concern about our water. **We are pleased to show you how we have surpassed all water quality standards.**

Overview

In 1996 the City of Bellbrook constructed a new water treatment plant to provide a high-quality, reliable supply of water to the nearly 10,000 consumers served. Bellbrook provides this excellent water service at rates that are consistently close to the average for the region.

An Explanation of the Water-Quality Data Table

Listed are thirteen tests (and two totals) 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 2007. All detected levels are far below allowed limit.

Not listed are over two hundred 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:

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Definitions of some terms contained within this report:

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.

Not listed are over 200 other tests in which no contaminants were detected

Contaminant	Date Tested	Units	MCL	MCLG	Highest Level Found	Range of Detection	Major Sources	Does Result Exceed EPA Limits?
Regulated at the Water Facility								
Fluoride	2007	ppm	4.0	4.0	1.13	0.9 - 1.13	Erosion of natural deposits; water additive to promote strong teeth	No
Nitrate	4/2/2007	ppm	10.0	10.0	1.09	N/A	Erosion of natural deposits	No
Regulated at the Customer's Tap								
Lead*	7/7/2005	ppb	AL=15.0	15.0	6.7 (90th %)	<5.0 - 19.9	Corrosion of household plumbing	No
Copper**	8/30/2005	ppb	AL=1300.0	1300.0	195.0 (90th %)	<50.0 - 289.0	Corrosion of household plumbing	No
Regulated in the Distribution System								
Trihalomethanes THM's (total)	7/11/2005	ppb	80.0	0.0	22.7	1.4 - 9.4	By-product of drinking water chlorination	No
Haloacetic Acids (HAA5) (total)	7/11/2005	ppb	60.0	0.0	8.86	<1.0 - 5.55	By-product of drinking water chlorination	No
Unregulated Contaminants								
Bromodichloromethane	7/11/2005	ppb	***	***	6.4	N/A	1 of 4 by-products of chlorination - THM	No
Dibromochloromethane	7/11/2005	ppb	***	***	5.5	N/A	1 of 4 by-products of chlorination - THM	No
Chloroform	7/11/2005	ppb	***	***	9.4	N/A	1 of 4 by-products of chlorination - THM	No
Bromoform	7/11/2005	ppb	***	***	1.4	N/A	1 of 4 by-products of chlorination - THM	No
Dibromoacetic Acid	7/11/2005	ppb	****	****	1.96	N/A	By-product of drinking water chlorination - HAA5	No
Dichloroacetic Acid	7/11/2005	ppb	****	****	5.55	N/A	By-product of drinking water chlorination - HAA5	No
Monobromoacetic Acid	7/11/2005	ppb	****	****	<1.0	N/A	By-product of drinking water chlorination - HAA5	No
Monochloroacetic Acid	7/11/2005	ppb	****	****	<2.0	N/A	By-product of drinking water chlorination - HAA5	No
Trichloroacetic Acid	7/11/2005	ppb	****	****	1.35	N/A	By-product of drinking water chlorination - HAA5	No

Key To Table:			
N/A =	Not Applicable	THM =	Trihalomethane
ppm =	parts per million or milligrams per liter (mg/l)	HAA5	Haloacetic Acid
ppb =	parts per billion or micrograms per liter (ug/l)	* =	20 samples, two above AL
MCL =	Maximum Contamination Level	** =	20 samples, none above AL
MCLG =	Maximum Contamination Level Goal	*** =	Added together not to exceed 80 ppb for 4 THMs
AL =	Action level	**** =	Added together, not to exceed 60 ppb for HAA5