Clyde Water Treatment Plant
2007 Consumer Confidence Report for Drinking Water

The City of Clyde Water Treatment Plant has prepared the following report to provide information to you the consumer, on the quality of our drinking water. Included within this report is, general health information, water quality test results, and how to participate in decisions concerning your drinking water, and water system contacts.

Source Water Information:

The Clyde Water Plant receives surface water from the Beaver Creek watershed. This watershed covers an area of approximately 56 Square miles and the water received needs extensive treatment before being delivered to your homes. On average, we pump *250-500 Million* gallons of water a year from the runoff of this area and produce *350-500 Million* gallons of treated water a year.

The City of Clyde public water system uses surface water drawn from an intake on Beaver Creek. For the purposes of source water assessments, in Ohio all surface waters are considered to be susceptible to contamination. By their nature, surface waters are readily accessible and can be contaminated by chemicals and pathogens, which may rapidly arrive at the public drinking water intake with little warning or time to prepare. The City of Clyde's drinking water source protection area contains potential contaminant sources such as agriculture, home construction, oil and gas production activities, junkyards and landfills, above ground storage tanks, airports, other commercial sources, and roadways.

The City of Clyde's public water system treats the water to meet drinking water quality standards, but no single treatment technique can address all potential contaminants. The potential for water quality impacts can be further decreased by implementing measures to protect Beaver Creek. More detailed information is provided in the City of Clyde's Drinking Water Source Assessment report, which can be obtained by calling The Clyde WTP Superintendent at 419-547-9805

What are sources of contamination to drinking water?

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.

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.

In order to ensure that tap water is safe to drink, EPA prescribes regulations, which limit the amount of certain contaminants in water provided by public water systems. FDA regulations establish limits for contaminants in bottled water, which 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* (1-800-426-4791).

Who needs 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 infection. 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 (1-800-426-4791).

"Infants and young children are typically more vulnerable to lead in drinking water than the general population. It is possible that lead levels at your home may be higher than at other homes in the community as a result of materials used in your home's plumbing. If you are concerned about elevated lead levels in your home's water, you may wish to have your water tested and flush your tap for thirty seconds to two minutes before using tap water. Additional information is available from the safe drinking water hotline (800-426-4791)".

About your Drinking Water.

The EPA requires regular sampling to ensure drinking water safety. The Clyde Water Plant conducted sampling for bacteria, inorganic, synthetic organic, and volatile organic contaminants (VOC) sampling during 2007. Samples were collected for approx. 51 different contaminants, most of which were not detected in the Clyde Water Supply. The Ohio EPA requires us to monitor for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of our data, though accurate, may be more than one year old.

Monitoring and Reporting Violations:

There were no monitoring or reporting violations in 2007.

Listed below is information on those contaminants that were found in the City of Clyde drinking water.

Contaminants (Units)	MCLG	MCL	Level Found	Range of Detections	Violation	Sample Year	Typical Source of Contaminants
Turbidity (NTU)	NA	TT	0.114	.029-.114	NO	2007	Soil Runoff
Turbidity (% of samples meeting standards)	NA	TT	100%	100%	NO	2007	Soil Runoff
Total Organic Carbon (TOC) ***	NA	TT	2.091	1.600-2.500	NO	2007	Naturally present in the environment
Radioactive Contaminants	**MCLG**	**MCL**	**Level Found**	**Range of Detections**	**Violation**	**Sample Year**	**Typical Source of Contaminants**
Beta/Photon Emitters (pCi/L) *	0	AL=50	5.6	NA	NO	2003	Decay of natural and man-made products
Inorganic Contaminants	**MCLG**	**MCL**	**Level Found**	**Range of Detections**	**Violation**	**Sample Year**	**Typical Source of Contaminants**
Copper (ppm) **	1.3	AL=1.3	0.06	<0.020-0.062	NO	2005	Corrosion of household plumbing systems, erosion of natural products
	Zero samples out of twenty was found to have copper levels in excess of Action Level of 1.3ppm.						
Fluoride (ppm)	1.3	4.0	1.07	0.86-1.22	No	2007	Erosion of natural deposits, Water additive to promote strong teeth.
Lead (ppb) **	0	AL=15	<4	<4	No	2005	Corrosion of household plumbing systems
	Zero samples out of twenty was found to have lead levels in excess of Action Level of 15 ppb.						
Nitrate (ppm)	10	10	1.08	<0.10-1.08	No	2007	Runoff from fertilizer use; Erosion of natural deposits
Synthetic Organic Contaminants	**MCLG**	**MCL**	**Level Found**	**Range of Detections**	**Violation**	**Sample Year**	**Typical Source of Contaminants**
Atrazine (ppb)	3	3	0.287	<0.300-0.440	No	2007	Runoff from herbicide used on row crops
Volatile Organic Contaminants	**MCLG**	**MCL**	**Level Found**	**Range of Detections**	**Violation**	**Sample Year**	**Typical Source of Contaminants**
TTHM- Total Trihalomethane (ppb)	NA	80	47.62	35.30-68.00	No	2007	By-product of drinking water chlorination
HAA (ppb) Haloacetic Acids	NA	60	20.77	14.70-25.34	No	2007	By-product of drinking water chlorination
Residual Disinfectants	**MRDLG**	**MRDL**	**Level Found**	**Range of Detections**	**Violation**	**Sample Year**	**Typical Source of Contaminants**
Total Chlorine	4	4	1.61	0.60-2.10	No	2007	Water additive used to control microbes

* EPA considers 50 pCi/l to be the level of concern for beta particles.

** Lead and Copper tests were done in 2005. The next set will be done in 2008.

*** The value reported under "Level Found" for Total Organic Carbon (TOC) is the lowest ratio between percentage of TOC actually removed to the percentage of TOC required to be removed. A value of greater than one indicates that the water system is in compliance with TOC removal requirements. A value of less than one indicates a violation of the TOC removal requirements.

Turbidity is a measure of the cloudiness of water and is an indication of the effectiveness of our filtration system. The turbidity limit set by the EPA is ***0.3 NTU*** in 95% of the daily samples and shall not exceed 1 NTU at any time. As reported above, the Clyde Water Plant highest recorded turbidity result for 2007 was 0.114 NTU and lowest monthly percentage of samples meeting the turbidity limits was 100%.

Total organic carbon (TOC) has no health effects. However, total organic carbon provides a medium for the formation of disinfection by-products. These by-products include trihalomethanes (THM's) and haloacetic acids (HAA5's). Drinking water containing these by-products in excess of the MCL may lead to adverse health effects, liver or kidney problems, or nervous system effects, and may lead to an increase risk of getting cancer.

For more information on your drinking water:

Contact Phil Farrar, Water Plant Superintendent, at (419) 547-9805. Public participation and comments are encouraged at regular meetings of Clyde City Council, which meets on the 1st and 3rd Tuesday of each month at 7:00PM, at the Clyde City Hall Council Room.

Definitions of some terms contained within this report.

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 contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.

Parts per Million (ppm) 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) are units of measure for concentration of a contaminant. A part per billion corresponds to one second in 31.7 years.

Picocuries per liter (pCi/l): Picocuries per liter are the measurement of radioactivity in water.

Action Level (AL): The concentration of a contaminant, which, if exceeded, triggers treatment, or other requirements, which a water system must follow.

The "<" symbol: A symbol that means less than. A result of <5 means that the lowest level that could be detected was 5 and the contaminant in that sample was not detected.

Nephelometric Turbidity Units (NTU): Nephelometric turbidity units are a measure of the clarity of water. Turbidity in excess of 5 NTU is just noticeable to the average person.

Treatment Technique (TT): A required process intended to reduce the level of a contaminant in drinking water.

Action Level (AL): The concentration of a contaminant, which, if exceeded, triggers treatment, or other requirements, which a water system must follow.

Not Applicable: NA

Maximum Residual Disinfectantn Level Goal (MRDLG): The level of drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of use of disinfectants to control microbial contaminants.

Maximum Residual Disinfectantn Level (MRDL): 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.