

CITY OF LITCHFIELD

WATER TREATMENT FACILITY

2005 WATER QUALITY REPORT

Our Commitment to You:

Employees work around the clock, seven days a week, 365 days a year, to ensure the water delivered to you meets or exceeds EPA standards and is safe to use and consume. This report is a summary of the quality of water provided to our customers in 2005 and is intended to meet federal regulations for our facility's Consumer Confidence Report. Included in this report is information about where your water comes from, what it contains, and how it compares to standards set forth by regulatory agencies.

This year, as in years past, your tap met all USEPA, ILLINOIS EPA, and Illinois Dept. of Public Health drinking water health standards. Our system vigilantly safeguards its surface water supply, and we are able to report that the facility had no violation of a contaminant level or of any other water quality standard in the previous year.

If you have any questions about this report or concerning your water system, please contact Ray Weller / Water Superintendent at 324-2250 Monday through Friday from 7 AM until 3 PM. We want our valued customers to be informed about their water quality. If you would like to know more, please feel welcome to attend any of our regularly scheduled Public Works Committee meetings held on the last Thursday of the month at 6PM or our City Council meetings held on the first Tuesday of the month at 7PM. Both meetings are held in the Council Chambers located within the City Hall building at 120 East Ryder Street in Litchfield.

Our community uses surface water supplied by two man made reservoirs or lakes. Our primary source is Lake Lou Yaeger and our secondary source is the Litchfield Reservoir, both located close to Litchfield.

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. USEPA/CDC guidelines on appropriate means to lessen the risk of infection by cryptosporidium and other microbial contaminants are available from the USEPA's Safe Drinking Water Hotline **(1-800-426-4791)**.

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 USEPA's Safe Drinking Water Hotline **(1-800-426-4791)**.

Due to favorable monitoring history, our facility is on reduced monitoring for Total Trihalomethanes, a known carcinogen or cancer causing agent, as well as reduced monitoring for Lead and Copper. No vulnerability waivers had to be issued to our facility.

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 can dissolve naturally occurring minerals and radioactive material, and can pick up substances resulting from the presence of animals or from human activity. Possible contaminants consist of:

- * **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;
- * **Organic chemical contaminant**, 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;
- * **Radioactive contaminants**, which may 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, USEPA 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, which must provide the same protection for public health.

In addition to the informational section of this Water Quality Report, we have included for your review several tables. The tables will give you a better picture of the contaminants that were detected in your water and the contaminants that were tested for but not detected in your water.

City of Litchfield 2005 Regulated Contaminants Detected

Lead and Copper

Date Sampled: 12/31/2004

Definitions:

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

Action Level Goal (ALG): The level of a contaminant in drinking water below which there is no known or expected risk to health. ALG's allow for a margin of safety.

Lead MCLG	Lead Action Level (AL)	Lead 90th Percentile	# Sites Over Lead AL	Copper MCLG	Copper Action Level (AL)	Copper 90th Percentile	# Sites Over Copper AL	Likely Source of Contamination	
0	15 ppb	8 ppb	0	1.3 ppm	1.3 ppm	0.03 ppm	0	Corrosion of household plumbing systems; Erosion of natural deposits	Edit

Water Quality Test Results

Definitions: The following tables contain scientific terms and measures, some of which may require explanation. Maximum Contaminant Level (MCL): The highest level of a contaminant that is allowed in drinking water. MCL's are set as close to the Maximum Contaminant Level Goal 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. MCLG's allow for a margin of safety. mg/l: milligrams per litre or parts per million - or one ounce in 7,350 gallons of water. ug/l: micrograms per litre or parts per billion - or one ounce in 7,350,000 gallons of water. na: not applicable. Avg: Regulatory compliance with some MCLs are based on running annual average of monthly samples. Maximum Residual Disinfectant Level (MRDL): The highest level of disinfectant allowed in drinking water. Maximum Residual Disinfectant Level Goal (MRDLG): The level of disinfectant in drinking water below which there is no known or expected risk to health. MRDLG's allow for a margin of safety.

Regulated Contaminants

Disinfectants & Disinfection By-Products	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source Of Contaminant				
Total Haloacetic Acids (HAA5)	8/11/2005	46.8	25.5 - 46.8	N/A	60	ppb	No	By-product of drinking water chlorination	Edit			
THMs [Total Trihalomethanes]	8/11/2005	56.4	29.2 - 56.4	N/A	80	ppb	No	By-product of drinking water chlorination	Edit			
Chloramines	4/30/2005	1.4031	1.1327 - 1.4031	MRDLG=4	MRDL=4	ppm	No	Water additive used to control microbes	Edit			
Inorganic Contaminants	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source Of Contaminant				
Barium	2/3/2005	0.007	Not Applicable	2	2	ppm	No	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits	Edit			
Fluoride	2/3/2005	0.93	Not Applicable	4	4	ppm	No	Erosion of natural deposits; Water additive which promotes strong teeth; Fertilizer discharge	Edit			
Nitrate-Nitrite	2/4/2004	4.8	Not Applicable	10	10	ppm	No	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits	Edit			
Nitrate (As N)	2/3/2005	0.32	0 - 0.32	10	10	ppm	No	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits	Edit			
Radioactive Contaminants	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source Of Contaminant				
Alpha Emitters	12/10/2002	1.3	Not Applicable	0	15	pCi/L	No	Erosion of natural deposits	Edit			
State Regulated Contaminants				Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source Of Contaminant	
Manganese This contaminant is not currently regulated by USEPA. However, the state has set an MCL for this contaminant for supplies serving a population of 1000 or more.				2/3/2005	4	Not Applicable	N/A	150	ppb	No	Erosion of naturally occurring deposits	Edit
Sodium There is not a state or federal MCL for sodium. Monitoring is required to provide information to consumers and health officials that are concerned about sodium intake due to dietary precautions. If you are on a sodium-restricted diet, you should consult a physician about this level of sodium in the water.				2/3/2005	16	Not Applicable	N/A	N/A	ppm	No	Erosion of naturally occurring deposits; used in water softener regeneration	Edit

Note: The state requires monitoring of certain contaminants less than once per year because the concentrations of these contaminants do not change frequently. Therefore, some of this data may be more than one year old.

Turbidity

Limit (Treatment Technique)	Lowest Monthly % meeting limit	Violation	Source	
0.5 NTU (POP served < 10,000) 0.3 NTU (POP served > 9,999)	100	No	Soil Runoff	Edit
Limit (Treatment Technique)	Highest Single Measurement	Violation	Source	
5 NTU (POP served < 10,000) 1 NTU (POP served > 9,999)	0.29	No	Soil Runoff	Edit

Information Statement: Turbidity is a measurement of the cloudiness of the water caused by suspended particles. We monitor it because it is a good indicator of water quality and the effectiveness of our filtration system and disinfectants.

Total Organic Carbon

The percentage of Total Organic Carbon (TOC) removal was measured each month and the system met all TOC removal requirements set by IEPA, unless a TOC violation is noted in the violations section.