

2009 Annual Drinking Water Report

We are very pleased to present to you the 2009 Annual Water Quality Report. This report is designed to inform you about the quality of water and services we deliver to you every day. Our constant goal is to provide you with a safe and dependable supply of drinking water. We want you to understand the efforts we make to continually improve the water treatment process and to protect our water resources. We are committed to ensuring the quality of your water.

The Waverly water supply consists of four ground-water wells that draw water from the Silurian-Devonian aquifer. The wells range in depth from 150 to 220 feet deep. Chlorine is added to kill disease-causing organisms. Fluoride is added to promote dental health. It supplements the natural fluoride level that already exists in the water.

This water supply obtains water from one or more groundwater aquifers. Every aquifer has a degree of susceptibility to contamination because of the characteristics of the aquifer, overlying materials and human activity. Susceptibility to contamination generally increases with shallower aquifers, increasing permeability of the aquifer and overlying material nearby development or agricultural activity, and abandoned or poorly maintained wells

The Silurian-Devonian aquifer was determined to be highly susceptible to contamination because the characteristics of the aquifer and overlying materials allow contaminants to move through the aquifer fairly quickly. The City of Waverly wells are most susceptible to activities such as agricultural activities, dry cleaners, gas stations, industrial sites, and municipal wastewater dischargers. A detailed evaluation of your source water was completed by the Iowa Department of Natural Resources and is available from Shane Pothast, Senior Water Operator at (319) 352-6261 or Brian Sullivan, Public Services Superintendent at (319) 352-6247.

There are several contaminants that may be present in source water before treatment. Microbial contaminants, such as viruses and bacteria, may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife. Inorganic contaminants, such as salts and metals, can be naturally occurring or result from urban stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming. Pesticides and herbicides may come from a variety of sources such as agriculture and residential uses. Radioactive contaminants are naturally occurring. Organic chemical contaminants, including synthetic and volatile chemicals, are by-products of industrial processes and petroleum production, and can also come from gas stations, urban stormwater runoff, and septic systems.

The Waverly Water Division is pleased to report that our drinking water is safe and meets federal and state requirements. For the reporting period covering January 1, 2009, to December 31, 2009, the water supplied by the Waverly Water Division did not have any violations. It met the standards set forth by the Environmental Protection Agency (EPA) and the Iowa Department of Natural Resources (IDNR).

The Waverly Water Division routinely monitors for contaminants in your drinking water according to federal and state laws. The State requires us to monitor for certain contaminants monthly, annually and some less than once per year because the concentrations of these contaminants are not expected to vary from year to year. The table shows the results for 2009. Not listed in this table are nearly one hundred contaminants for which the City tested for and which were not detected. A list of contaminants that the City tests for is available upon request. Unless otherwise noted the data presented in this table is from testing done from January 1 to December 31, 2009.

In this table you will find many terms and abbreviations you might not be familiar with. To help you better understand these terms we've provided the following definitions:

Non-Detects (ND) - Not detected at testing limits.

Parts per million (ppm) or Milligrams per liter - One part per million corresponds to one minute in two years or a single penny in \$10,000.

Parts per billion (ppb) or Micrograms per liter - One part per billion corresponds to one minute in 2000 years or a single penny in \$10,000,000.

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

Maximum Contaminant Level - The "Maximum Allowed" (MCL) is 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 - The "Goal" (MCLG) is 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 Residual Disinfectant Level Goal (MRDLG) – 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.

Maximum Residual Disinfectant 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.

About Nitrate: Nitrate in drinking water at levels above 10 ppm is a health risk for infants of less than six months of age. High nitrate levels in drinking water can cause blue baby syndrome. Nitrate levels may rise quickly for short periods of time because of rainfall or agricultural activity. If you are caring for an infant you should ask advice from your health care provider.

About Lead: 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 line and home plumbing. Waverly Water Division 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 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 Drinking Water Hotline (1-800-426-4791) or at <http://www.epa.gov/safewater/lead>.

All 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 the 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 at 1-800-426-4791.

MCLs are set at very stringent levels. To understand the possible health effects described for many regulated constituents, a person would have to drink 2 liters of water every day at the MCL level for a lifetime to have a one-in-a-million chance of having the described health effect.

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

Thank you for allowing us to continue providing your family with clean, quality water this year. In order to maintain a safe and dependable water supply we sometimes need to make improvements that will benefit all of our customers.

Over the past year, the Waverly Water Department has continued its valve and hydrant replacement program. In this program, valves and hydrants that have been found inoperable or outdated have been replaced with new materials, providing for less interruption during water leaks and to provide the fire protection when needed. Also over the past year, the Water Department staff has continued their education in the water field by attending numerous seminars and classes. This enables the Water Department staff to stay on top of the constantly changing regulations and technology associated with the water industry. Water Department personnel also monitor chlorine levels during normal working hours throughout the city.

If you would like to know more about this report or if you have any questions concerning your water utility, please contact Shane Pothast at 352-6261 or Brian Sullivan at 352-6247. We want our customers to be well informed about their water and the water utility. The Waverly City Council meeting is another source for information. They meet the first, third, and fourth Mondays of each month at 7:00 p.m. at the Civic Center located at 200 1st Street NE. City information can also be found on our website www.waverly.ia.com.

The City of Waverly Water Division works around the clock to provide top quality water to every tap. We will continue to work hard to preserve and protect our water source and we ask our customers to join us in our efforts so that we can continue to provide a safe and dependable supply for the future generations to come.