2013 Annual Drinking Water Quality Report
City of Claremore

We're very pleased to provide you with this year's Annual Drinking Water Quality Report. We want to keep you informed about the excellent water and services we have delivered to you over the past year. Our goal is and always has been, to provide to you a safe and dependable supply of drinking water. This report shows our water quality and what it means. Our water source is Claremore Lake; we do get water from Oologah Lake that is pumped into Claremore Lake. We pre-treat our water with Sodium Permanganate, and Chlorine Dioxide to reduce iron, manganese and disinfection by product precursors. Coagulants are added to help remove the particles in water prior to filtration. The water is then filtered through multi-media filters containing granular activated carbon, anthracite and sand. Chlorine is then added for disinfection purposes to ensure that your water is safe. The City of Claremore contracts with Severn Trent Environmental Services, INC. to manage its water treatment facility.

The City of Claremore routinely monitors for contaminants in your drinking water according to Federal and State laws. This table shows the results of our monitoring for the period of January 1st to December 31st, 2013. (Some of our data may be more than one year old because the state allows us to monitor for some contaminants less often than once per year.) All drinking water, including bottled drinking water, may be reasonably expected to contain at least small amounts of some contaminants. It's important to remember that the presence of these contaminants does not necessarily pose a health risk. 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 before we treat it include:

**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 stormwater 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.

**Radioactive contaminants*, which are naturally occurring, or may be the result of oil and gas production and mining activities.

**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.

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. Some people may be more vulnerable to contaminants in drinking water than the general public. More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hotline (800-426-4791) or at http:www.epa.gov/safewater.

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 (800-426-4791).

WATER QUALITY DATA TABLE

The table below lists all of the drinking water contaminants we detected for the calendar year of this report. The presence of contaminants in the water does not necessarily indicate that the water poses a health risk. Unless otherwise noted, the data presented in this table is from testing done in the calendar year of the report.

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:

Maximum Contaminant Level (MCL): The 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 : The 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 or MRDL: The highest lever of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.

Maximum residual disinfectant level goal or MRDLG: The highest 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.

na – not applicable

Avg - Average

Parts per million (ppm) or Milligrams per liter (mg/l) - equivalent to one once in 7,350 gallons of water

Parts per billion (ppb) or Micrograms per liter (ug/l) - equivalent to one ounce in 7,350,000 gallons of water.

Picocuries per liter (pCi/L) - picocuries per liter is a measure of the radioactivity in water.

Action Level Goal (ALG): The level of a contaminant in drinking water below which there is no known or expected risk to health. ALGs allow for a margin of safety.
Action Level (AL): The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.

Lead and Copper

Lead and Copper	Date Sampled	MCLG	Action Level (AL)	90th Percentile	# Sites Over AL	Units	Violation	Likely Source of Contamination.
Copper	2013	1.3	1.3	0.209	0	ppm	N	Erosion of natural deposits; Leaching from wood preservatives; Corrosion of household plumbing systems.
Lead	2013	0	15	2.01	0	ppm	N	Corrosion of household plumbing systems; Erosion of natural deposits.

Regulated Contaminants

Disinfectants and Disinfection By-products	Collection Date	Highest Level Detected	Range of Levels Detected	MCGL	MCL	Units	Violation	Likely source of contamination
Chlorine	2013	1	1 -1	MRDLG=4	MRDL=4	ppm	N	Water additive used to control microbes.
Chlorite	2013	0.644	0.12 – 0.644	0.8	1	ppm	N	By-product of drinking water disinfection
Haloacetic Acids (HAA5)	2013	45	0 – 45.5	No goal for the total	60	ppb	N	By-product of drinking water disinfection
Total Trihalomethanes (TTHM)	2013	92	58.55 – 88.96	No goal for the total	80	ppb	Y	By-product of drinking water disinfection.

Inorganic Contaminants	Collection Date	Highest Level Detected	Range of Levels Detected	MCGL	MCL	Units	Violation	Likely source of contamination
Antimony	2013	1.27	1.27– 1.27	6	6	ppb	N	Discharge from petroleum refineries; fire retardants; ceramics; electronics; soldier; test addition.
Arsenic	2013	0.68	0.68 – 0.68	0	10	ppb	N	Erosion of natural deposits; Runoff from orchards; Runoff from glass and electronics production wastes.
Barium	2013	0.0289	0.0289 – 0.0289	2	2	ppm	N	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits.
Fluoride	2013	0.508	0 – 0.508	4	4.0	ppm	N	Erosion of natural deposits; Water additive which promotes strong teeth; Discharge from fertilizer and aluminum factories.
Radioactive Contaminants	Collection Date	Highest Level Detected	Range of Levels Detected	MCGL	MCL	Units	Violation	Likely source of contamination
Beta/photon emitters	08/23/2011	3.54	3.54 – 3.54	0	4	mrem/ yr	N	Decay of natural and man-made deposits.
Combined Radium 226/228	08/23/2011	2.64	2.64 – 2.64	0	5	pCi/L	N	Erosion of natural deposits.
Gross alpha excluding radon and uranium	08/23/2011	0.324	0 – 0.324	0	15	pCi/L	N	Erosion of natural deposits.

Turbidity

	Limit (Treatment Technique)	Level Detected	Violation	Likely Source of Contamination
Highest single measurement	1 NTU	0.298 NTU	N	Soil runoff.
Lowest monthly % meeting limit	0.3 NTU	100%	N	Soil runoff.

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.

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 lines and home plumbing. We cannot control the variety of materials used in plumbing components. When you 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 using water for drinking or cooking. If you are concerned about lead in you 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 Hotline or at http://www.epa.gov/safewater/lead.

Total Organic Carbon:

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

Total Trihalomethanes (TTHM)			
Some people who drink water containing trihalomethane in excess of the MCL over many years may experience problems with their liver, kidneys, or central nervous systems, and may have an increased risk of getting cancer.			
Violation Type	**Violation Begin**	**Violation End**	**Violation Explanation**
MCL, LRAA	01/01/2013	3/31/2013	Water samples showed that the amount of this contaminant in our drinking water was above its standard (called a maximum contaminant lever and abbreviated MCL) for the period indicated.
MCL, LRAA	04/01/2013	06/30/2013	Water samples showed that the amount of this contaminant in our drinking water was above its standard (called a maximum contaminant lever and abbreviated MCL) for the period indicated.

Este informe contiene información importante acerca de su aqua potable. Haga que alguien lo traduzca para usted o hable con alguien que lo entienda bien.

If you have any questions about this report or concerning your water utility, please contact Mr. Mike Cahalen; Project Manager; Severn Trent Environmental Services at (918) 341-1331 or bring your concerns to the attention of the City by attending any regularly scheduled council meetings. Council meetings are held on the first and third Monday's of each month at 104 S. Muskogee Claremore, OK 74017. We want our valued customers to be informed about their water utility.

Mike Cahalen

Mike Cahalen; Severn Trent Environmental Services