

City of Kerens

2015 Annual Drinking Water Quality Report

(Consumer Confidence Report)

for the period of January 1 to December 31, 2015

Phone Number: 903-396-2971

This report is intended to provide you with important information about your drinking water and the efforts made by the water system to provide safe drinking water. 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 EPA's Safe Drinking Water Hotline at (800) 426-4791.

For more information regarding this report contact:

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SPECIAL NOTICE

You may be more vulnerable than the general population to certain microbial contaminants, such as *Cryptosporidium*, in drinking water. Infants, some elderly or immunocompromised persons such as those undergoing chemotherapy for cancer; those who have undergone organ transplants; those who are undergoing treatment with steroids; and people with HIV/AIDS or other immune system disorders can be particularly at risk from infections. You should seek advice about drinking water from your physician or health care provider. Additional guidelines on appropriate means to lessen the risk of infection by *Cryptosporidium* are available from the Safe Drinking Water Hotline at (800) 426-4791.

ALL drinking water may contain contaminants.

When drinking water meets federal standards there may not be any health based benefits to purchasing bottled water or point of use devices. 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 EPA's Safe Drinking Water Hotline (1-800-426-4791).

Source of 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 before treatment 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 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 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.
- Radioactive contaminants, which can be naturally-occurring or be the result of oil and gas production and mining activities.

En Español

Este informe contiene información muy importante sobre el agua que usted bebe. Tradúzcalo ó hable con alguien que lo entienda bien.

ABBREVIATIONS

NTU - Nephelometric Turbidity Units
MFL - million fibers per liter (a measure of asbestos)
pCi/L - picocuries per liter (a measure of radioactivity)
ppm - parts per million, or milligrams per liter (mg/L)
ppb - parts per billion, or micrograms per liter (µg/L)
ppt - parts per trillion, or nanograms per liter
ppq - parts per quadrillion, or picograms per liter

Where do we get our drinking water?

The source of drinking water used by the City of Kerens is Purchased Surface Water. It comes from LAKE HALBERT and NAVARRO MILLS LAKE. A Source Water Susceptibility Assessment for your drinking source(s) is currently being updated by the Texas Commission on Environmental Quality. This information describes the susceptibility and types of constituents that may come into contact with you drinking water source based on human activities and natural conditions. The information contained in the assessment allows us to focus our source water protection strategies. For more information about your sources of water, please refer to the Source Water Assessment Viewer available at the following URL:

<http://gis3.tceq.state.tx.us/swav/Controller/index.jsp?wtrsrc=>

Further details about sources and source-water assessments are available in Drinking Water Watch at the following URL: dww.tceq.state.tx.us/DWW/.
Source Water Name – Surface Water From Corsicana-Lake Navarro CC from TX1750002

DEFINITIONS

Maximum Contaminant Level Goal or 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 or 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 Residual Disinfectant Level Goal or 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 contamination.

Maximum Residual Disinfectant Level or MRDL – The highest level of disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.

Avg – Regulatory compliance with some MCLs are based on running annual average of monthly samples.

ppm – milligrams per liter or parts per million, or one ounce in 7,350 gallons of water.

ppb – micrograms per liter or parts per billion, or one ounce in 7,350,000 gallons of water.

na – not applicable.

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

Action Level Goal or 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.

Treatment Technique or TT - A required process intended to reduce the level of a contaminant in drinking water.

Secondary Constituents

Many constituents (such as calcium, sodium, or iron) which are often found in drinking water can cause taste, color, and odor problems. The taste and odor constituents are called secondary constituents and are regulated by the State of Texas, not the EPA. These constituents are not causes for health concern. Therefore, secondary constituents are not required to be reported in this document but they may greatly affect the appearance and taste of your water.

Public Participation Opportunities

Date: July 12, 2016
or any Regularly Scheduled City Council Meeting (1st
Tuesday after the 5th of each month)
Location: City Hall
Time: 7:00 PM
Phone No: (903) 396-2971

Inorganic Contaminants

Year	Contaminant	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Unit of Measure	Violation	Source of Contaminant
2015	Nitrite (measured as Nitrogen)	<0.00400	0-0	1	1	ppm	N	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
2015	Nitrate (measured as Nitrogen)	0.0625	0.0625-0.0625	10	10	ppm	N	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits.

Nitrate Advisory – 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.

Maximum Residual Disinfectant Level

Year	Disinfectant	Average Level	Minimum Level	Maximum Level	MRDL	MRDLG	Unit of Measure	Source of Disinfectant
2015	Chloramine & Chlorine	1.52	0.73	2.20	4	<4	ppm	Disinfectant used to control microbes.

Disinfection Byproducts

Year	Contaminant	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Unit of Measure	Violation	Source of Contaminant
2015	Haloacetic Acids (HAA5)*	54	19.4-54.0	No goal for total	60	ppb	N	Byproduct of drinking water disinfection.
2015	Total Trihalomethanes (TThm)*	77	59.1-115	No goal for total	80	ppb	N	Byproduct of drinking water disinfection.

Not all sample results may have been used for calculating the Highest Level Detected because some results may be part of an evaluation to determine where compliance sampling should occur in the future

Coliform Bacteria

Total coliform bacteria are used as indicators of microbial contamination of drinking water because testing for them is easy. While not disease-causing organisms themselves, they are often found in association with other microbes that are capable of causing disease. Coliform bacteria are harder than many disease-causing organisms; therefore, their absence from water is a good indication that the water is microbiologically safe for human consumption.

Year	Maximum Contaminant Level Goal	Total Coliform Maximum Contaminant Level	Highest No. of Positive	Fecal Coliform or E. Coli Maximum Contaminant Level	Total No. of Positive E. Coli or Fecal Coliform Samples	Violation	Source of Contaminant
2015	0	1 positive monthly sample	2	Presence	2	Y	Naturally present in the environment

Lead and Copper

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

Year	Contaminant	MCL G	The 90th Percentile	Number of Sites Exceeding Action Level	Action Level	Unit of Measure	Violation	Likely Source of Contaminant
2014	Lead	0	1.4	0	15	ppb	N	Corrosion of household plumbing systems; erosion of natural deposits.
2014	Copper	1.3	0.21	0	1.3	ppm	N	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives.

Additional Health Information for 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 lines and home plumbing. This water supply 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 using water for 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 Hotline or at <http://www.epa.gov/safewater/lead>.

VIOLATIONS

Violation Type	Violation Begin – Violation End	Violation Explanation
Chlorine: Some people who use water containing chlorine well in excess of the MRDL could experience irritating effects to their eyes and nose. Some people who drink water containing chlorine well in excess of the MRDL could experience stomach discomfort.		
Disinfectant Level Quarterly Operating Report (DLQOR)	01/01/2014 – 03/31/2014	We failed to test our drinking water for the contaminant and period indicated. Because of this failure, we cannot be sure of the quality of our drinking water during the period indicated.

Regulated Contaminants from City of Corsicana

Disinfectants and Disinfection By-Products

	Contaminant	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Unit of Measure	Violation	Source of Contaminant
2015	Haloacetic Acids (HAA5)	80.8	15.1-80.8	No goal for total	60	ppb	N	Byproduct of drinking water disinfection.
2015	Total Trihalomethanes (TTHm)	105	26 – 105	No goal for total	80	ppb	N	Byproduct of drinking water disinfection.

Inorganic Contaminants

Year	Contaminant	Highest Level Detected	MCLG	MCL	Unit of Measure	Violation	Source of Contaminant
2015	Arsenic	0.0008	0	1	ppm	N	Erosion of natural deposits; Runoff from orchards; Runoff from glass and electronics production wastes.
2015	Barium	0.049	2	2	ppm	N	Discharge of drilling wastes; Discharge from metal refineries Erosion of natural deposits
2015	Chromium	0.00085	100	100	ppb	N	Discharge from steel and pulp mills; Erosion of natural deposits
2015	Fluoride	0.857	4	4.0	ppm	N	Erosion of natural deposits; Water additive which promotes strong teeth; Discharge from fertilizer and aluminum factories
2015	Nitrate (measured as Nitrogen)	0.0355	10	10	ppm	N	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
2015	Cyanide	0.156	200	200	Ppb	N	Discharge from plastic and fertilizer factories; Discharge from steel/metal factories
2015	Selenium	0.0011	50	50	ppb	N	Discharge from petroleum and metal refineries; Erosion of natural deposits; Discharge from mines

Radioactive Contaminants

1/26/11	Beta/photon emitters	4.7	0-4.7	0	50	pCi/L*	N	Decay of natural and man-made deposits
1/26/11	Combined Radium 226/228	1	1-1	0	5	pCi/L	N	Erosion of natural deposits

*EPA considers 50 pCi;L to be the level of concern for beta particles

Synthetic organic contaminants including pesticides and herbicides

2015	Atrazine	0.54	3	3	ppb	N	Runoff from herbicide used on row crops
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Turbidity

	Limit (Treatment Technique)	Level Detected	Violation	Source of Contaminant
Highest Single Measurement	1 NTU	0.29 NTU	N	Soil Runoff
Lowest monthly % meeting limit	0.3 NTU	100%	N	Soil runoff.

Lead and Copper

Year	Contaminant	MCLG	The 90th Percentile	Number of Sites Exceeding Action Level	Action Level	Unit of Measure	Source of Contaminant
2013	Copper	1.3	0.0513	0	1.3	ppm	Errorsion of natural deposits; Leaching from wood preservative; Corrosion of household plumbing systems.
2013	Lead	0	1.01	1	15	ppb	Corrosion of household plumbing systems; erosion of natural deposits

Regulated Contaminants from Chatfield Water Supply

Disinfectants and Disinfection By-Products

Year	Contaminant	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Unit of Measure	Violation	Source of Contaminant
2015	Haloacetic Acids (HAA5)	130	1.7-130	No goal for total	60	ppb	N	Byproduct of drinking water disinfection.
2015	Total Trihalomethanes (TThm)	124	31.7-124	No goal for total	80	ppb	N	Byproduct of drinking water disinfection.

Inorganic Contaminants

2014	Nitrate (measured as Nitrogen)	0.0615	0.0615-0.0615	10	10	Pm	N	Runoff from fertilizer use; Leaching from septic tanks, sewage, Erosion of natural deposits
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Lead and Copper

Year	Contaminant	MCLG	The 90th Percentile	Number of Sites Exceeding Action Level	Action Level	Unit of Measure	Source of Contaminant
2013	Copper	1.3	0.0445	1	1.3	ppb	Errosion of natural deposits; Leaching from wood preservative; Corrosion of household plumbing systems.
2013	Lead	0	2.61	0	15	ppm	Corrosion of household plumbing systems; erosion of natural deposits