

Where do we get our drinking water?

The City of Kennedale's drinking water during 2014 consisted of 53% ground and 47% surface water. Kennedale has five wells that pull ground water from the Trinity Aquifer (Twin Mountains, Travis Peak, and Paluxy). We also purchase treated surface water from the City of Fort Worth that they obtain from Lake Bridgeport, Eagle Mountain Lake, Lake Worth, Benbrook Lake, Cedar Creek Reservoir and Richland-Chambers Reservoir. To see the complete Fort Worth water quality report, visit <http://fortworthtexas.gov/tapwater> or you can request a paper copy of the report by calling Mary Gugliuzza at 817-392-8253. The City of Kennedale's 2014 water loss was 5%. Water losses for utilities across the USA average 16%, and anything below 10% is considered excellent.

Chloramines

The addition of chloramines may cause problems to persons dependent on dialysis machines. A condition known as hemolytic anemia can occur if the disinfectant is not completely removed from the water that is used for the dialysate. Consequently, the pre-treatment scheme used for the dialysis units must include some means, such as charcoal filtering, for the removal of chloramines. If you are utilizing a dialysis machine, please contact the manufacturer for information concerning this matter.

In addition, chloramines in certain concentrations may be toxic to fish. If you have a fish tank, please make sure that the chemicals or filters you are using are designed for use in water that has been treated with chloramines. Your local pet store is a good source of information on this topic along with the appropriate reagents for neutralizing chloramines.

Source Water Assessment Protection

The Texas Commission on Environmental Quality (TCEQ) completed an assessment of the City of Kennedale's source water, and results indicate that two (2) of the well water sources are high in minerals. The sampling requirements for the water system are based on this susceptibility and previous sample data. Any detection of these minerals may be found in this Consumer Confidence Report as 'Total Dissolved Solids and Sulfates'. For more information on source water assessments and protection efforts in the City of Kennedale, contact Public Works Director Larry Ledbetter at 817-985-2171.

Be Water Wise

Please remember to conserve water. Go to <http://www.twdb.texas.gov/publications/brochures/conservation/index.asp> for useful water saving tips. Year-round irrigation restrictions are in effect which prohibit lawn watering between the hours of 10 a.m. and 6 p.m., and require customers to irrigate no more than twice a week on designated days. Current restrictions can be found in Chapter 23, Article VI of the City of Kennedale's municipal code.

Abbreviations and Definitions

The tables in this document contain scientific terms and measures, some of which may require explanation.

Maximum Contaminant Level (MCL): The highest permissible level of a contaminant in drinking water.

MCLs are set as close to the MCLGs 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 health risk. MCLGs allow for a margin of safety.

Maximum Residual Disinfectant Level (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.

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 contamination.

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.

ABBREVIATIONS

NTU: nephelometric turbidity units (a measure of turbidity); **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)

Annual Water Quality Report for the period of January 1 to December 31, 2014

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**.

In order to ensure that tap water is safe to drink, the EPA prescribes regulations that limit the amount of certain contaminants in water provided by public water systems. Food and Drug Administration regulations establish limits for contaminants in bottled water which must provide the same protection for public health. Contaminants may be found in drinking water that may cause taste, color, or odor problems. These types of problems are not necessarily causes for health causes. For more information on taste, odor, or color of drinking water, please call the system's business office.

For more information regarding this report, please contact Mary Goza by calling 817-985-2170. Este reporte incluye informacion importante sobre el agua potable. Para asistencia en espanol, favor de llamar al telefono 817-985-2163, ext. 2227, y pregunte por Dianna Garcia.

Water Sources

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, 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 storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining or farming.
- ☿ **Pesticides and herbicides** come from a variety of sources such as agricultural, urban storm water runoff, and residential uses.
- ☿ **Organic chemical contaminants**, including synthetic and volatile organic chemicals, are byproducts of industrial processes and petroleum production; they can also come from gas stations, urban storm water runoff, and septic systems.
- ☿ **Radioactive contaminants** can be naturally occurring or be the result of oil and gas production and mining activities.

Public Participation Opportunities

Public participation at board and council meetings is welcomed and encouraged. The City Council meets the third Monday of each month at 7 p.m. at City Hall (405 Municipal Dr.). Upcoming meeting dates can be found at the city's website (<http://www.cityofkennedale.com/cal>).

Special Notice for the ELDERLY, INFANTS, CANCER PATIENTS, people with HIV/AIDS or other immune problems:

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, persons 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.

2014 CITY OF KENNEDALE Drinking Water Quality Report

City of Kennedale Municipal Building
405 Municipal Dr. Kennedale, TX 76060
817-985-2170 www.cityofkennedale.com



CITY OF KENNEDALE

Groundwater Analysis Results

Regulated Contaminants

Collection Date	Contaminant	Highest Level Detected	Range of Levels Detected	MCL	MCLG	Unit of Measure	Violation	Common Sources of Substance
2014	Haloacetic Acids (HAA5)	7	5-11	60	No goal for the total	ppb	N	Byproduct of drinking water disinfection
2014	Total Trihalo-methanes (THM)	10	2.5-14.2	80	No goal for the total	ppb	N	Byproduct of drinking water disinfection
2014	Fluoride	2.42	0.96-2.42	4	4	ppm	N	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
2010	Arsenic	0.843	0.441-0.843	10	0	ppb	N	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
2010	Barium	0.0219	0.00973-0.0219	2	2	ppm	N	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
2010	Chromium	6.75	4.9-6.75	100	100	ppb	N	Discharge from steel and pulp mills; erosion of natural deposits
2014	Cyanide	115	46.2-115	200	200	ppb	N	Discharge from plastic and fertilizer factories; discharge from steel/metal factories
2010	Selenium	0.781	0-0.781	50	50	ppb	N	Discharge from petroleum and metal refineries; erosion of natural deposits; discharge from mines
2010	Thallium	0.111	0-0.111	2	0.5	ppb	N	Discharge from electronics, glass, and drug factories; leaching from ore processing sites
2014	Nitrate (measured as Nitrogen)	0.314	0-0.314	10	10	ppm	N	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits

Distribution Residual Disinfectant Levels

Year (Range)	Disinfectant	Average Level	Minimum Level	Maximum Level	MRDL	MRDLG	Unit of Measure	Source of Chemical
2014	Chloramine	2.35	1.00	3.4	4	4	ppm	Disinfectant used to control microbes

Coliform Bacteria

Maximum Contaminant Level Goal	Total Coliform Maximum Contaminant Level	Highest No. of Positive Samples	Fecal Coliform or E. Coli Maximum Contaminant Level	Total No. of Positive E. Coli or Fecal Coliform Samples	Violation	Common Sources of Substance
0	1 positive monthly sample	0	0	0	N	Coliforms are bacteria that are naturally present in the environment; they are used as an indicator that other, potentially harmful bacteria may be present

The data presented in this report is from the most recent testing done in accordance with regulations.

This report can be viewed online at www.cityofkennedale.com/water

Lead & Copper

Date Sampled	Contaminant	MCLG	The 90 th Percentile	Action Level (AL)	Number of Sites Over AL	Unit of Measure	Violation	Common Sources of Substance
2013	Lead	0	1.28	15	0	ppb	N	Corrosion of household plumbing systems; erosion of natural deposits
2013	Copper	1.3	0.0732	1.3	0	ppm	N	Corrosion of household plumbing systems; erosion of natural deposits

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. The City of Kennedale 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 two 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 at 800-426-4791 or online at <http://www.epa.gov/safewater/lead>.

Secondary & Other Constituents Not Regulated (No associated adverse health effects)

Year	Constituent	Average Level	Minimum Level	Maximum Level	Secondary Limit	Unit of Measure	Common Sources of Substance
2014	Bicarbonate Alkalinity	325	175	412	NA	ppm	Corrosion of carbonate rocks such as limestone
2014	Chloride	50	30	76.6	300	ppm	Abundant naturally occurring element
2010	Hardness as Ca & Mg	11	6	24	NA	ppm	Naturally occurring calcium and magnesium
2011	pH	8.5	8.3	8.7	8.5	units	Measure of corrosivity of water
2010	Sodium	274	264	299	NA	ppm	Erosion of natural deposits
2014	Sulfate	210	89	487	300	ppm	Naturally occurring; common industrial byproduct; byproduct of oil field activity
2014	Total Alkalinity	339	175	436	NA	ppm	Naturally occurring soluble mineral salts
2014	Total Dissolved Solids	772	382	1220	1000	ppm	Total dissolved mineral constituents in water

Secondary constituents are not required to be reported in this document but they may greatly affect the appearance and taste of your water.



CITY OF FORT WORTH

Surface Water Analysis Results

Contaminant	2014 Level	Range	MCL	MCLG	Measure	Common Sources of Substance
Gross Beta particles & photon emitters ¹	5.6	4 to 5.6	50	0	pCi/L	Decay of natural and man-made deposits
Radium 226/228 ¹	1	1 to 1	5	0	pCi/L	Erosion of natural deposits
Arsenic	1.28	.97 to 1.28	10	0	ppb	Erosion of natural deposits; runoff from orchards; runoff from glass and electronic production wastes
Atrazine	.09	0 to .1	3	3	ppb	Runoff from herbicide use on row crops
Antimony	.22	0 to .22	6	6	ppb	Discharge from petroleum refineries, fire retardants, ceramics, electronics, solder, test addition
Barium	.07	.05 to .07	2	2	ppm	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Chromium (Total)	.55	0 to .55	100	100	ppb	Discharge from steel and pulp mills, erosion of natural deposits
Cyanide	113	0 to 113	200	200	ppb	Discharge from plastics and fertilizer factories; discharge from steel and metal factories
Fluoride	.62	.27 to .62	4	4	ppm	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Nitrate (measured as Nitrogen)	.82	.28 to .82	10	10	ppm	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Nitrite ² (measured as Nitrogen)	.03	0 to .03	1	1	ppm	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Bromate	8.92	0 to 8.92	10	0	ppb	By-product of drinking water disinfection
Haloacetic Acids	11.5	0 to 11.5	60	N/A	ppb	By-product of drinking water disinfection
Total Trihalomethanes	26	0 to 26	80	N/A	ppb	By-product of drinking water disinfection
Total Coliforms (including fecal coliform & E. coli)	Presence in 1.4% of monthly samples	0 to 1.4%	Presence in 5% or more of monthly samples	0	% of positive samples	Coliforms are naturally present in the environment as well as feces; fecal coliforms and E. coli only come from human and animal fecal waste
Turbidity ³	0.29 (Highest single result) 100% (Lowest monthly % of samples ≤ 0.3 NTU)	N/A	TT	N/A	NTU	Soil runoff

Contaminant	Disinfectant	Low	Average	MCL	MCLG	Common Sources of Substance
Total Organic Carbon ⁴	1	1	1	TT = % removal	N/A	Naturally occurring

¹ Because of historically low levels of radionuclides in its water, TCEQ has Fort Worth on a reduced monitoring schedule. The test results shown are from 2011 (Radium) or 2014 (Gross Beta).

² The state last sampled for Nitrite in 2013.

³ Turbidity is a measure of the cloudiness of water. It is monitored because it is a good indicator of the effectiveness of the filtration system.

⁴ Total Organic Carbon is used to determine disinfection by-product precursors. Fort Worth was in compliance with all monitoring and treatment technique requirements for disinfection by-product precursors.

Interconnects or Emergency Sources

Source of the Water	Length of Time Used	Explanation of Why It Was Used	Whom to Call for the Water Quality Information
City of Fort Worth	All Year	To supplement water supply	Mary Gugliuzza 817-392-8253