

2013 Annual Drinking Water Quality Report

Consumer Confidence Report (CCR) for the period of January 1 to December 31, 2013

NORTH RURAL WSC - PWS ID No.1820009

YOUR DRINKING WATER IS REGULATED AND MEETS OR EXCEEDS ALL FEDERAL (EPA) DRINKING WATER REQUIREMENTS: 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. The analysis was made by using the data from the most recent U.S. Environmental Protection Agency (EPA) required tests and is presented on the enclosed attachment. We hope this information helps you become more knowledgeable about what's in your drinking water. For more information regarding this report contact our office at (940)327-0700. Our regular monthly Board Meetings are held at 7:00pm on the first Thursday of each month at our office: 3810 N Highway 281, Mineral Wells, TX 76067.

Your drinking water is obtained from SURFACE water sources. It comes from Lake Palo Pinto, Palo Pinto Creek, and Hilltop Presedimentation Reservoir. Drinking water, including bottled water, may reasonably be expected to contain at least small amounts on 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.

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

SPECIAL NOTE: 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 microbial contaminants are available from the Safe Drinking Water Hotline at (800) 426-4791.

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 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>.

SOURCES 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 include:

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.

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.

Microbial Contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.

Pesticides and Herbicides, which may come from a variety of sources such as agriculture, urban storm water runoff, and residential uses.

Radioactive Contaminants, which can be naturally occurring or be the result of oil and gas production and mining activities.

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

SOURCE WATER ASSESSMENT

The TCEQ has completed a Source Water Assessment for all drinking water systems that own their sources. The report describes the susceptibility and types of constituents that may come into contact with your drinking water source based on human activities and natural conditions. The system from which we purchase our water (The City of Mineral Wells) received the assessment report. For more information on source water assessments and protection efforts at our system, contact The City of Mineral Wells at (940)328-7777.

DEFINITIONS

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 risk to health. MCLGs allow for a margin of safety.

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.

Maximum Residual Disinfectant Level Goal (MRDLG) - The level of drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of the use of disinfectant to control microbial contaminants.

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

MFL	million fibers per liter (a measure of asbestos)
mrem/yr	millirems per year (a measure of radiation absorbed by the body)
n/a	not applicable
NTU	nephelometric turbidity units
pCi/L	picocuries per liter (a measure of radioactivity)
ppb	micrograms per liter (ug/L), or parts per billion, or one ounce in 7,350,000 gallons of water
ppm	parts per million, or milligrams per liter (mg/L)
ppt	parts per trillion, or nanograms per liter
ppq	parts per quadrillion, or picograms per liter

2013 Regulated Contaminants / Lab Results from North Rural WSC

Lead & Copper	Date Sampled	MCLG	Action Level (AL)	90 th Percentile	No. Sites Over AL	Units	Violation	Likely Source of Contamination
Lead	9-16-2008	1.3	1.3	0.024	0	ppm	N	Erosion of natural deposits; Leaching from wood preservatives; Corrosion of household plumbing systems
Copper	9-16-2008	0	15	0.203	0	ppb	N	Corrosion of household plumbing systems; Erosion of natural deposits
Asbestos	Date Sampled	Method	Less Than Ind.	Level Type	Reporting Level	Units	Violation	Likely Source of Contamination
	8-07-2013	100.2	<	MRL	0.185 MFL		N	The major sources of asbestos in drinking water are decay of asbestos cement water mains; and erosion of natural deposits.

Disinfectant Residual	Date Sampled	Average Level	Minimum Level	Maximum Level	MRDL	MRDLF	Units	Likely Source of Contamination
Chloramine	2013	2.25	1.10	3.10	4.0	<4.0	ppm	Disinfectant used to control microbes

Systems must complete and submit disinfectant date on the Disinfectant Level Quarterly Operating Report (DLQOR). On the report, the system must provide disinfectant type, minimum, maximum and average levels.

Disinfectant and Disinfection By-Products	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination
Haloacetic Acids (HAA5)	2013	18	15.3 – 20.6	N/A	60	ppb	N	By-product of drinking water disinfection
Total Trihalomethanes (TTHm)	2013	32	25.8 – 41.1	N/A	80	ppb	N	By-product of drinking water disinfection
Inorganic Contaminants	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination
Nitrate (Measured as Nitrogen)	2013	0.106	0.084 – 0.106	10	10	ppm	N	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits.

TOTAL COLIFORM REPORTED MONTHLY TESTS FOUND NO COLIFORM BACTERIA.

FECAL COLIFORM REPORTED MONTHLY TESTS FOUND NO FECAL COLIFORM BACTERIA.

Water Loss Estimate

In the Water Loss Audit submitted to the Texas Water Development Board for the time period of January-December 2013, our system lost an estimated 10,795,100 gallons. This calculates to 6.7% loss of total purchased water. The TCEQ's acceptable percentage of water loss is 10%. If you have any questions about the Water Loss Audit, please call our office at (940)327-0700 or our Maintenance Superintendent, Danny Walton, at (940)682-8322.

2013 Regulated Contaminants / Lab Results from The City of Mineral Wells

Inorganic Contaminants	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination
Antimony	8-07-2013	0.234	0.234-0.234	6	6	ppb	N	Discharge from petroleum refineries; fire retardants; ceramics; electronics; solder; test addition
Arsenic	8-07-2013	1.03	1.03-1.03	10	10	ppb	N	Erosion of natural deposits; Runoff of orchards; Runoff from glass and electronics production wastes
Barium	8-07-2013	0.0755	0.0755-0.0755	2	2	ppm	N	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits
Fluoride	2-20-2013	0.6	0.6-0.6	4.0	4.0	ppm	N	Erosion of natural deposits; Water additive which promotes strong teeth; Discharge from fertilizer and aluminum factories
Nitrate (measured as Nitrogen)	2-20-2013	0.07	0.07-0.07	10	10	ppm	N	
Selenium	8-07-2013	1.35	1.35-1.35	50	50	ppb	N	

Radioactive Contaminants	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination
Beta/photon emitters	3-09-2011	5.8	5.8-5.8	0	50	pCi/L	N	Decay of natural and man-made deposits
Combined Radium 226/226	3-09-2011	1	1-1	0	5	pCi/L	N	Erosion of natural deposits

Turbidity	Limit (Treatment Technique)	Level Detected	Violation	Likely Source of Contamination
Highest single measurement	1 NTU	0.13 NTU	N	Soil runoff
Lowest monthly % meeting limit	0.3 NTU	100%	N	Soil runoff

Total Organic Carbon	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination
Source Water	2013	6.22	5.3-7.3	N/A	N/A	ppm	N	Naturally present in the environment
Drinking Water	2013	3.23	2.8-4.8	N/A	N/A	ppm	N	Naturally present in the environment
Removal Ratio	2013	1.40	1.13-1.57	N/A	N/A	% removal*	N	N/A

*Removal ratio is the percent of TOC removed by the treatment process divided by the percent of TOC required by TCEQ to be removed. Total Organic Carbon (TOC) has no health effects. The disinfectant can combine with TOC to form disinfection by-products. Disinfection is necessary to ensure that water does not have unacceptable levels of pathogens. By-products of disinfection include Trihalomethanes (THMs) and Haloacetic acids (HAA) which are reported elsewhere in this report.

2013 Regulated Contaminants / Lab Results are from The City of Mineral Wells (continued)

TOTAL COLIFORM REPORTED MONTHLY TESTS FOUND NO COLIFORM BACTERIA.
 FECAL COLIFORM REPORTED MONTHLY TESTS FOUND NO FECAL COLIFORM BACTERIA.

Contaminants	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination
Chlorform	8-07-2013	9.54	9.54-9.54	N/A	N/A	ppb	N	By-product of drinking water disinfection
Bromoform	8-07-2013	4.55	4.55-4.55	N/A	N/A	ppb	N	By-product of drinking water disinfection
Bromodichloromethane	8-07-2013	13.7	13.7-13.7	N/A	N/A	ppb	N	By-product of drinking water disinfection
Dibromochloromethane	8-07-2013	15.4	15.4-15.4	N/A	N/A	ppb	N	By-product of drinking water disinfection

There is no maximum contaminant level for these chemicals at the entry point to distribution.

Contaminants	Collection Date	Highest Level Detected	Range of Levels Detected	Secondary Limit	Units	Violation	Likely Source of Contamination
Bicarbonate	2-20-2013	112	112-112	N/A	ppm	N	Corrosion of carbonate rocks such as limestone
Chloride	2-20-2013	25.8	25.8-25.8	300	ppm	N	Abundant naturally occurring element; used in water purification; by-product of oil field activity
Hardness as Ca/Mg	8-07-2013	79.4	79.4-79.4	N/A	ppm	N	Naturally occurring calcium and magnesium
pH	3-09-2013	7.9	7.9-7.9	8.5	pH units	N	Measure of corrosivity of water
Sodium	8-07-2013	22.4	22.4-22.4	N/A	ppm	N	Erosion of natural deposits; by-product of oil field activity
Sulfate	2-20-2013	35.7	35.7-35.7	300	ppm	N	Naturally occurring; common industrial by-product; by-product of oil field activity
Total Alkalinity as CaCO ₃	2-20-2013	112	112-112	N/A	ppm	N	Naturally occurring soluble mineral salts
Total Dissolved Solids	2-20-2013	227	227-227	1000	ppm	N	Total dissolved mineral constituents in water

No associated health risks.