



Annual Water Quality Report
For the period of January 1 to December 31, 2023
City of Dorchester- PWS ID # TX0910028 903-476-5862



Public Participation Opportunities

Date: First Monday of Each Month
Time: 6:30p.m.
Location: 373 Main St. Dorchester, TX 75459
To learn about future public meetings, concerning your drinking water, or to request one, please don't hesitate to give us a call at 903-476-5862

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. For more information concerning this report contact James Parkman at 903-476-5862

En Español: Este reporte incluye informacion importante sobre el aqua para tomar. Si tiene preguntas o comentarios sobre este informe en espanol, favor de llamar al tel. 903-476-5862

Information about your 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. 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 EPAs Safe Drinking Water Hotline at (800) 426-4791.

Contaminants that may be present in source water 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.

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.

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 concerns. For more information on taste, odor, or color of drinking water, please contact the system's business office.

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 providers. Additional guidelines on appropriate means to lessen the risk of infection by Cryptosporidium are available from the Safe Drinking Water Hotline (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 are responsible for providing high quality drinking water, but 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>.

For more information about your sources of water, please refer to the Source Water Assessment Viewer available at the following URL: <https://www.tceq.texas.gov/gis/swaview>

Further details about sources and source-water assessments are available in Drinking Water Watch at following URL: <https://dww2.tceq.texas.gov/DWW/>

Information about Source Water

City of Dorchester provides ground water from Paluxy aquifer located in Grayson County. City of Dorchester purchases water from City of Sherman. City of Sherman provides purchased ground water from Trinity aquifer located in Grayson County.

TCEQ completed an assessment of your source water, and results indicate that our sources have a low susceptibility to contaminants. The sampling requirements for your water system is based on this susceptibility and previous sample data. Any detections of these contaminants will be found in this Consumer Confidence Report. For more information on source water assessments and protection efforts at our system contact James Parkman @ 903-476-5862.

Definitions & Abbreviations

Action Level:	The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.
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.
Avg:	Regulatory compliance with some MCLs are based on running annual average of monthly samples.
Level 1 Assessment:	A Level 1 assessment is a study of the water system to identify potential problems and determine (if possible) why total coliform bacteria have been found in our water system.
Level 2 Assessment:	A Level 2 assessment is a very detailed study of the water system to identify potential problems and determine (if possible) why an E. coli MCL violation has occurred and/or why total coliform bacteria have been found in our water system on multiple occasions.
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 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 residual disinfectant level or 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 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 contaminants.
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) – or one ounce in 7,350 gallons of water	
ppb - parts per billion, or micrograms per liter – or one ounce in 7,350,000 gallons of water	
ppt - parts per trillion, or nanograms per liter (ng/L)	
ppq - parts per quadrillion, or picograms per liter (pg/L)	

Source Water Name	Type	Report Status	Location
Preston Rd. PS 2	GW	Active	3138 State Hwy 289
City of Sherman	GW	Active	12457 FM 902



Lead and Copper	Date Sampled	MCLG	Action Level (AL)	90th Percentile	# Sites Over AL	Units	Violation	Likely Source of Contamination
Copper	2022	1.3	1.3	0.095	0	ppm	N	Erosion of natural deposits; Leaching from wood preservatives; Corrosion of household plumbing systems.

2023 Water Quality Test Results

2022

Disinfection By-Products	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Haloacetic Acids (HAA5)	2022	5	5 - 5	No goal for the total	60	ppb	N	By-product of drinking water disinfection.

*The value in the Highest Level or Average Detected column is the highest average of all HAA5 sample results collected at a location over a year

Total Trihalomethanes (TTHM)	2023	5	4.59 – 4.59	No goal for the total	80	ppb	N	By-product of drinking water disinfection.
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*The value in the Highest Level or Average Detected column is the highest average of all TTHM sample results collected at a location over a year

2023

Inorganic Contaminants	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Barium	2022	0.003	0.003 – 0.003	2	2	ppm	N	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits.
Chromium	2022	10	10 - 10	100	100	ppb	N	Discharge from steel and pulp mills; Erosion of natural deposits.
Fluoride	2022	0.976	0.976 – 0.976	4	4.0	ppm	N	Erosion of natural deposits; Water additive which promotes strong teeth; Discharge from fertilizer and aluminum factories.
Nitrate [measured as Nitrogen]	2023	0.0639	0.0408 – 0.0639	10	10	ppm	N	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits.
Synthetic organic contaminants including pesticides and herbicides	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination

Benzo(a)pyrene	2022	50	0 – 50	0	200	ppt	N	Leaching from lining of water storage tanks and distribution lines
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Radioactive Contaminants	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Combined Radium 226/228	10/11/2016	1.5	1.5 - 1.5	0	5	pCi/L	N	Erosion of natural deposits.
Volatile Organic Contaminants	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Xylenes	2022	0.00078	0 – 0.00078	10	10	ppm	N	Discharge from petroleum factories; Discharge from chemical factories.
Ethylbenzene	2021	1.13	0 – 1.13	700	700	ppb	N	Discharge from petroleum refineries
Toluene	2023	0.00123	0 – 0.00123	1	1	ppm	N	

Disinfectant Residual

Disinfectant Residual	Year	Average Level	Range of Levels Detected	MRDL	MRDLG	Unit of Measure	Violation (Y/N)	Source in Drinking Water
Chlorine	2023	1.67	.20 - 2.20	4	4	ppm	N	Water additive used to control microbes.

2023 Purchased Ground Water Contaminants – City of Sherman

City of Dorchester purchase groundwater from The City of Sherman. The City of Sherman provides groundwater from the Trinity and Woodbine Aquifers located in Grayson County. Below are tables containing the contaminants that were detected in the providers water for the above calendar year.

Inorganic Contaminants	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Arsenic	2022	Levels lower than detection level	0	0	10	ppb	N	Erosion of natural deposits; Runoff from orchards; Runoff from glass and electronics production wastes.
Barium	2023	0.00.71	0 – 0.0071	2	2	ppm	N	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits.
Chromium	2022	0.0014	0.0011-0.0014	100	100	ppb	N	Discharge from steel and pulp mills; Erosion of natural deposits.
Cyanide	2022	Levels lower than detection level	0 – 0	0.2	0.2	ppm	N	Discharge from steel / metal factories; discharge from plastic and fertilizer factories.

Fluoride	2023	0.972	0.478 -0.972	4	4.0	ppm	N	Erosion of natural deposits; Water additive which promotes strong teeth; Discharge from fertilizer and aluminum factories.
Selenium	2020	0.005	0.005-0.005	50	50	ppb	N	Discharge from petroleum and metal refineries. Erosion of natural deposits.
Texas Copper	2022	Levels lower than detection level	0 – 0	1.3	1.3	ppm	N	Erosion of natural deposits; Corrosion of household plumbing systems.
ALL Synthetic organic contaminants including pesticides and herbicides	2021	Levels lower than detected level	0-0	3		ppb	N	
Nitrate (As Nitrogen)	2023	0.436	0.0438 -0.436	10	10	ppm	N	Runoff from fertilizer use; leaching from septic tanks; sewage, erosion of natural deposits

2023 Purchased Contaminants Unregulated

Calcium	2023	1.58	0 – 1.58			ppm	N	Abundant Naturally Occurring Element
Chloride	2023	227	16.5 – 227			ppm	N	Abundant Naturally Occurring Element
Magnesium	2023	0.363	0 – 0.363			ppm	N	Abundant Naturally Occurring Element
Manganese	2023	0.0021	0 – 0.0021			ppm	N	Abundant Naturally Occurring Element
pH	2020	8.7	8.3-8.7			Units	N	Measure of corrosivity of Water
Sodium	2023	283	0 – 283			ppm	N	Erosion of Natural Deposits
Sulfate	2023	110	49.5 - 110			ppm	N	Naturally occurring, common industrial by-product
Total Alkalinity as CaCO3	2023	429	270 – 429			ppm	N	Naturally occurring soluble mineral salts
Total Dissolved Solids	2023	888	389 - 888			ppm	N	Total Dissolved mineral constituents in water
Total Hardness as CaCO3	2023	5.45	0 – 5.45			ppm	N	Naturally Occurring calcium
Zinc	2022	0.0064	0.0064 – 0.0064			ppm	N	Moderately abundant naturally occurring element used in metal industry.
Aluminum	2023	0.0084	0 – 0.0084			ppm	N	Erosion of Natural Deposits
Iron	2022	0.481	0.0635 – 0.481			ppm	N	Erosion of natural deposits; iron or steel water delivery equipment of facilities

Radioactive Contaminants	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Combined Radium 226/228	2023	1.5	1.5 - 1.5	0	5	pCi/L	N	Erosion of natural deposits.
Volatile Organic Contaminants	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Xylenes	2023	0.00252	0.00061 – 0.00252	10	10	ppm	N	Discharge from petroleum factories; Discharge from chemical factories.
Ethylbenzene	2023	0.53	0 – 0.53	700	700	ppb	N	Discharge from petroleum refineries



In the water loss audit submitted to the Texas Water Development Board for the period of Jan-Dec 2023 our system had an estimated loss of 40M+ gallons of water