Annual Drinking Water Quality Report
East Central Regional Water District – GFTW
2019

We're pleased to present to you this year's *Annual Drinking Water Quality Report*. This report is designed to inform you about the safe clean water we deliver to you every day. Our constant goal is to provide you with a safe and dependable supply of drinking water. We want you to understand the efforts we make to continually improve the water treatment process and protect our water resources. We are committed to ensuring the quality of your water. East Central Regional WD - GF utilizes the Elk Valley Aquifer, drawn from 18 drilled wells. East Central Regional WD - GF wells are located near the City of Larimore.

East Central Regional WD-GF is participating in the North Dakota Wellhead Protection Program. Relevant information on the Wellhead Protection plan is available during normal business hours at our Thompson office. The North Dakota Department of Environmental Quality has prepared a Source Water Assessment for East Central Regional WD - GF. Information on these programs is available to the public during normal business hours at the above listed water system. Our public water system, in cooperation with the North Dakota Department of Environmental Quality, has completed the delineation and contaminant/land use inventory elements of the North Dakota Source Water Protection Program. Based on the information from these elements, the North Dakota Department of Environmental Quality has determined that our source water is "moderately susceptible" to potential contaminants. No significant sources of contamination have been identified.

East Central Regional WD - GF is pleased to report that our drinking water is safe and meets federal and state requirements.

This report shows our water quality and what it means.

If you have any questions about this report or concerning your water utility, please contact Neil Breidenbach, manager of East Central Regional WD - GF, at (701) 599-2963. We want our valued customers to be informed about their water utility. If you want to learn more, please attend any of our regularly scheduled meetings. They are held on the second Tuesday of each month at 7:00 PM in the water office at Thompson. If you are aware of non-English speaking individuals who need help with the appropriate language translation, please call Neil at the number listed above.

East Central Regional WD - GF would appreciate it if large volume water customers would please post copies of the Annual Drinking Water Quality Report in conspicuous locations or distribute them to tenants, residents, patients, students, and/or employees, so individuals who consume the water, but do not receive a water bill can learn about our water system.

East Central Regional WD - GF 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, 2019. As authorized and approved by EPA, the state has reduced monitoring requirements for certain contaminants to less often than once per year because the concentrations of these contaminants are not expected to vary significantly from year to year. Some of our data [e.g., for radioactive contaminants], though representative, is more than one year old.

The sources of drinking water (both tap 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:

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, industrial or domestic wastewater discharges, oil production, mining or farming.

Pesticides and herbicides, which come from a variety of sources such as agriculture, urban stormwater 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 stormwater 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, the Environmental Protection Agency (EPA) prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. The Food and Drug Administration (FDA) regulations establish limits for contaminants in bottled water that must provide the same protection for public health.

In the table on page 3, 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:

Not Applicable- (N/A)

Parts per million (ppm) or Milligrams per liter (mg/l) - one part per million corresponds to one minute in two years or a single penny in $10,000.

Parts per billion (ppb) or Micrograms per liter (µg/l)- one part per billion corresponds to one minute in 2,000 years, or a single penny in $10,000,000.

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

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

Treatment Technique (TT) - A treatment technique is a required process intended to reduce the level of a contaminant in drinking water.

Maximum Contaminant Level - The "Maximum Allowed" (*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 Goal - The "Goal" (*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 (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 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.

2019 TEST RESULTS FOR EAST CENTRAL REGIONAL WD-GF								
Contaminant	**MCL**	**MCLG**	**Level Detected**	**Unit Measurement**	**Range**	**Date (year)**	**Violation Yes/No Other Info**	**Likely Source of Contamination**
Inorganic Contaminants								
Nitrate-Nitrite	10	10	0.18	ppm	N/A	2019	No	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Barium	2	2	0.0152	ppm	N/A	2017	No	Discharge of drilling wastes: discharge from metal refineries: erosion of natural deposits
Fluoride	4	4	0.844	ppm	N/A	2017	No	Erosion of natural deposits: water additive which promotes strong teeth: discharge from fertilizer and aluminum factories
Chromium	100	100	1.14	ppb	N/A	2017	No	Discharge from steel and pulp mills. Erosion of natural deposits.
Disinfectants								
Chlorine	MRDL=4.0	MRDLG=4	0.6	ppm	0.469 to 0.77	2019	No	Water additive used to control microbes
Stage 2 Disinfection Byproducts (TTHM/HAA5)								
Total Haloacetic Acids (HAA5)	System-Wide	60	No Detect	ppb	N/A	2019	No	By-product of drinking water disinfection.
Total Trihalomethanes (TTHM)	System-Wide	80	2	ppb	N/A	2019	No	By-product of drinking water chlorination.
Radioactive Contaminants								
Gross Alphia, Includng RA, Excldng RN & U	15	15	2	pCi/l	N/A	2017	No	Erosion of natural deposits
Radium, Combined (226, 228)	5		1.25	pCi/l	N/A	2017	No	Erosion of natural deposits
Uranium Combined	30		ND	ppb	-0.04 to 0	2017	No	Erosion of natural deposits
Lead/Copper								
	# samples	Action Level	90th percentile					
Copper	27	AL=1.3	0.095 90th % Value	ppm	N/A	2017	No*	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
Lead	27	AL=15	No Detect 90th % Value	ppb	N/A	2017	No*	Corrosion of household plumbing systems, erosion of natural deposits

Unregulated Contaminant	Average value at EP sampling point micrograms per liter (parts per billion)
Manganese	0.65 (Range: <0.4 to 1.3)

** Under the Fourth Unregulated Contaminant Monitoring Rule, East Central Regional Water District was selected by EPA to sample for twenty unregulated contaminants during 2019. Samples were taken two times from either the Entry Point or from the Maximum Residence Time sampling point within the distribution system, as required. One contaminant was detected during this sampling. Unregulated contaminants are those for which EPA has not established drinking water standards. The purpose of unregulated contaminant monitoring is to assist EPA in determining the occurrence of unregulated contaminants in drinking water and whether future regulation is warranted. Should you have any questions, please contact our office. The following unregulated contaminant was the only contaminant detected during this sampling.

EPA requires monitoring of over 80 drinking water contaminants. Those contaminants listed in the table above, are the only contaminants detected in your drinking water.

As you can see by the table on page 3, our system had no violations. We're proud that your drinking water meets or exceeds all Federal and State requirements. We have learned through our monitoring and testing that some contaminants have been detected. The EPA has determined that your water IS SAFE at these levels.

Unregulated contaminants are those for which the EPA has not established drinking water standards. The purpose of unregulated contaminant monitoring is to assist the EPA in determining the occurrence of unregulated contaminants in drinking water and whether future regulation is warranted.

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 the water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline (1-800-426-4791).

MCL's are set at very stringent levels. To understand the possible health effects described for many regulated contaminants, a person would have to drink 2 liters of water every day at the MCL level for a lifetime to have a one-in-a-million chance of having the described health effect.

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 (1-800-426-4791).

If present, elevated levels of lead can cause serious health problems, especially for pregnant woman and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. Grand Forks - Traill Water District is responsible for providing high quality drinking water, but cannot control the variety of materials used in plumbing components. **Use water from the cold tap for drinking and cooking. 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 drinking 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.

Please call Neil Breidenbach, manager of East Central Regional WD - GF at (701) 599-2963 if you have questions concerning your drinking water.

East Central Regional WD

Kory Sondreal – President Michael Anderson – Vice President Jason Lovas - Sec. Tres.
Travis Hegg, Jeremy Cunningham, Mike Elliott, and Andy Krogstad

East Central Regional WD

Neil Breidenbach, Manager
Randy Thompson, Mike Thompson, Chad Gratton, John Eaton, Justin Breidenbach, Shelly Anderson, and Shari Hagen

Annual Drinking Water Quality Report
East Central Regional Water District - TRW
2019

We're pleased to present to you this year's Annual Drinking Water Quality Report. This report is designed to inform you about the safe clean water we deliver to you every day. Our constant goal is to provide you with a safe and dependable supply of drinking water. We want you to understand the efforts we make to continually improve the water treatment process and protect our water resources. We are committed to ensuring the quality of your water. Our water source is ground water from the Galesburg Aquifer. Our eight wells are located between the cities of Clifford and Portland. The well water is treated at our iron and manganese removal treatment plant.

East Central Regional WD-Traill is participating in the North Dakota Wellhead Protection Program. Relevant information on the Wellhead Protection plan is available during normal business hours at our Clifford office. The North Dakota Department of Environmental Quality has prepared a Source Water Assessment for East Central Regional WD-Traill. Information on this program is available to the public during normal business hours at our Clifford office. Our public water system, in cooperation with the North Dakota Department of Environmental Quality, has completed the delineation and contaminant/land use inventory elements of the North Dakota Source Water Protection Program. Based on the information from these elements, the North Dakota Department of Environmental Quality has determined that our source water is not susceptible to potential contaminants. No significant sources of contamination have been identified.

East Central Regional WD-Traill is pleased to report that our drinking water is safe and meets federal and state requirements.

This report shows our water quality and what it means.

If you have questions regarding this report, please contact East Central Regional WD-Traill Manager Neil Breidenbach at (701) 599-2963. Questions can also be answered at our regularly scheduled monthly council meeting held the second Tuesday of each month at 7:00 P.M. at the water office in Thompson. If you are aware of non-English speaking individuals who need help with the appropriate language translation, please call Neil Breidenbach at the number listed above.

East Central Regional WD-Traill would appreciate it if large volume water customers would please post copies of the Annual Drinking Water Quality Report in conspicuous locations or distribute them to tenants, residents, patients, students, and/or employees, so individuals who consume the water, but do not receive a water bill can learn about our water system.

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The sources of drinking water (both tap 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:

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, industrial or domestic wastewater discharges, oil production, mining or farming.

Pesticides and herbicides, which come from a variety of sources such as agriculture, urban stormwater 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 stormwater 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, the Environmental Protection Agency (EPA) prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. The Food and Drug Administration (FDA) regulations establish limits for contaminants in bottled water that must provide the same protection for public health.

2019 TEST RESULTS FOR EAST CENTRAL REGIONAL WD-TRAILL								
Contaminant	**MCLG**	**MCL**	**Level Detected**	**Unit Measurement**	**Range**	**Date (year)**	**Violation Yes/No Other Info**	**Likely Source of Contamination**
Disinfectants								
1. Chlorine	MRDLG = 4	MRDL=4.0	0.8	ppm	0.42 to 0.833	2019	No	Water additive used to control microbes
Stage 2 Disinfection Byproducts								
2. Total Haloacetic Acids (HAA5)	System -Wide	60	No Detect	ppb	N/A		No	By-product of drinking water disinfection.
3.Total Trihalomethanes (TTHM)	System -Wide	80	1	ppb	N/A		No	By-product of drinking water chlorination.
Lead / Copper	# samples	Action Level						
4. Copper	11	1.3	0.78	ppm	N/A	2018	No	Corrosion of household plumbing systems, erosion of natural deposits
5. Lead	11	15	1.1	ppb	N/A	2018	No	Corrosion of household plumbing systems, erosion of natural deposits

2019 TEST RESULTS FOR THE CITY OF MAYVILLE								
Contaminant	**MCL**	**MCLG**	**Level Detected**	**Unit Measurement**	**Range**	**Date (year)**	**Violation Yes/No Other Info**	**Likely Source of Contamination**
Disinfectants								
1. Chlorine	MRDL =4.0	MRDL G=4	0.8	ppm	0.69 to 1.01	2019	No	Water additive used to control microbes
Radioactive Contaminants								
2. Gross Alpha, Incldng RA, Excldng RN & U	15	15	0.62	pCi/l	N/A	2017		Erosion of natural deposits
3. Radium, Combined (226, 228)	5		0.16	pCi/l		2017		Erosion of natural deposits
4. Uranium, Combined	30		0.02	ppb		2017		Erosion of natural deposits
Inorganic Contaminants								
5. Nitrate-Nitrite	10	10	0.18	ppm	N/A	2019	No	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
6. Barium	2	2	0.00986	ppm	N/A	2017	No	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
7. Fluoride	4	4	0.699	ppm	N/A	2017	No	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
8. Arsenic	10	0	3.45	ppb	N/A	2018	No	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Stage 2 Disinfection Byproducts								
9.Total Haloacetic Acids (HAA5)	System -Wide	60	1	ppb	N/A	2019	No	By-product of drinking water disinfection.
10.Total Trihalomethanes (TTHM)	System -Wide	80	4	ppb	N/A	2019	No	By-product of drinking water chlorination.
Lead/ Copper	# Samples	Action Level						
11. Copper	10	AL=1.3	.78 90^{th} % Value	ppm	N/A	2019	0	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
12. Lead	10	AL=15	3.32 90^{th} % Value	ppb	N/A	2019	0	Corrosion of household plumbing systems, erosion of natural deposits

* No sites exceeded the copper or lead action levels in 2019.

2019 TEST RESULTS FOR THE CITY OF HILLSBORO								
Contaminant	**MCLG**	**MCL**	**Level Detected**	**Unit Measurement**	**Range**	**Date (year)**	**Violation Yes/No Other Info**	**Likely Source of Contamination**
Disinfectants								
1. Chlorine	MRDLG=4	MRDL=4.0	0.7	ppm	0.34 to 1.01	2019	No	Water additive used to control microbes
Stage 2 Disinfection Byproducts								
2. Total Haloacetic Acids (HAA5)	System-Wide	60	1	ppb	N/A	2019	No	By-product of drinking water disinfection.
3.Total Trihalomethanes (TTHM)	System-Wide	80	3	ppb	N/A	2019	No	By-product of drinking water chlorination.
Inorganic Contaminants								
4. Nitrate-Nitrite	10	10	0.15	ppm	N/A	2019	No	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
5. Arsenic	0	10	2.01	ppb	N/A	2016	No	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
6. Barium	2	2	0.0039	ppm	N/A	2017	No	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
7. Fluoride	4	4	0.753	ppm	N/A	2017	No	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Radioactive Contaminants								
8. Gross Alpha, incldng RA, Excldng RN & U	15	15	1.09	PCi/l	N/A	2017	No	Erosion of natural deposits
9. Radium, Combined (226, 228)		5	1.95	PCi/l	N/A	2017	No	Erosion of natural deposits
10. Uranium, Combined		30	0.85	ppb	N/A	2017	No	Erosion of natural deposits
Lead/ Copper	# Samples	Action Level						
11. Copper	10	AL=1.3	0.532 90^{th} % Value	ppm	N/A	2019	*No	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
12. Lead	10	AL=15	4 90^{th} % Value	ppb	N/A	2019	*No	Corrosion of household plumbing systems, erosion of natural deposits

* No sites exceeded the lead or copper levels action levels in 2019.

In the table's 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.

Not Applicable- (N/A)

Parts per million (ppm) or Milligrams per liter (mg/l) - one part per million corresponds to one minute in two years or a single penny in $10,000.

Parts per billion (ppb) or Micrograms per liter (µg/l)- one part per billion corresponds to one minute in 2,000 years, or a single penny in $10,000,000.

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

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

Treatment Technique (TT) - A treatment technique is a required process intended to reduce the level of a contaminant in drinking water.

Maximum Contaminant Level - The "Maximum Allowed" (*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 Goal - The "Goal" (*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 (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 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.

EPA requires monitoring of over 80 drinking water contaminants. Those contaminants listed in the table on pages 2 and 3, are the only contaminants detected in your drinking water.

We're proud that your drinking water meets or exceeds all Federal and State requirements. We have learned through our monitoring and testing that some contaminants have been detected. The EPA has determined that your water IS SAFE at these levels.

Unregulated contaminants are those for which the EPA has not established drinking water standards. The purpose of unregulated contaminant monitoring is to assist the EPA in determining the occurrence of unregulated contaminants in drinking water and whether future regulation is warranted.

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 the water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline (1-800-426-4791).

MCL's are set at very stringent levels. To understand the possible health effects described for many regulated contaminants, a person would have to drink 2 liters of water every day at the

MCL level for a lifetime to have a one-in-a-million chance of having the described health effect.

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 (1-800-426-4791).

If present, elevated levels of lead can cause serious health problems, especially for pregnant woman and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. Traill Rural Water District is responsible for providing high quality drinking water but cannot control the variety of materials used in plumbing components. **Use water from the cold tap for drinking and cooking. 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 drinking 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.

Please call our office at (701) 599-2963 if you have questions concerning your drinking water.

East Central Regional WD-Traill works diligently to provide top quality water to every tap. We ask that all our customers help us protect our water sources, which are the heart of our community, our way of life and our children's future.