GROUNDWATER

Marion Utilities pumps about 3.7 million gallons per day of water from wells in the Teays River Valley. Many years ago, Glaciers carved out the valley and then the valley was filled with glacial till. This has made an excellent groundwater source for the City of Marion.



Marion Utilities works to protect the groundwater source. For information on preventing groundwater contamination go to www.marionutilities.com. The groundwater is softened, filtered, treated with chlorine and fluoride (if needed), and pumped into the drinking water system.

BACTERIAL MONITORING

Marion Utilities conducts routine monitoring for presence of harmful bacteria within the water supply. This monitoring ensures that we provide the best public health protection possible by finding and fixing any potential vulnerabilities to contamination as soon as they occur.

In 2016, the Revised Total Coliform Rule (RTCR) went into effect and strengthened limits on E. coli, a specific indicator for contamination. It also increased the response required by a positive coliform sample and established a more active response to this indicator if found. Marion Utilities has complied with the new changes. In over 360 samples taken in 2020, no presence of total coliform or E. coli bacteria was found.

LEAD AND YOUR

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. Marion Utilities is responsible for providing high quality drinking water, but cannot control the variety of materials used in home plumbing components.

When your water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap for thirty 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 or at:

http://www.epa.gov/safewater/lead

If you have any questions about the contents of this report, please contact

Robin Shrader at (765) 664-2391

OR JOIN US at our
Marion Utilities Service Board meetings
1540 N. Washington St. on the 1st and 3rd
Thursday of each month at 5:30 pm.



2021 Annual Water Quality Report

Your service provider for

Drinking Water

Wastewater

Stormwater

Solid

Waste Recycling

The mission of Marion Utilities is to bring added value to the city of Marion by providing excellent customer service, maintaining the highest of standards for the lowest possible cost, and promoting environmental stewardship to ensure the future of our community.

WATER QUALITY INFORMATION

Marion Utilities conducts regular testing to monitor its treatment process and drinking water quality. The table below shows contaminants that were detected in 2020 water samples or in the most recent testing done for that contaminant. Contact Marion Utilities for a list of all tested contaminants. No violations were identified.

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants that do not necessarily pose 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.

Contaminant	Date Sampled	Maximum Contaminant Level	Maximum Contaminant Level Goal	Result	Range of detected levels	Typical Source
INORGANIC CONTAMINANTS (R	esults remain	on this report for	or 3 years from the	he test date	e or when the test is repe	
Copper (ppm)	2020	1.3	1.3	0.035	< 0.005 - 0.098	Corrosion of household plumbing
Lead (ppb)	2020	15	0	2.2	< 0.5 – 5.9	Corrosion of household plumbing
Barium (ppm)	2020	2	2	0.0074	0.0074	Erosion of natural deposits
Chromium (ppb)	2020	100	100	3.6	3.6	Erosion of natural deposits
Nickel (ppm)	2020	0.1	0.1	0.0016	0.0016	Erosion of natural deposits
Fluoride (ppm)	2020	4	4	0.7	0.7	Erosion of natural deposits
Nitrate measured as Nitrogen (ppm)	2020	10	10	0.15	0.15	Run-off from fertilizer use, Leaching from septic tanks, Erosion of natural deposits
UNREGULATED CONTAMINANTS	S (Detected o	luring UCMR 4 Te	est must remain o	on this repo	ort for 5 years from the to	est date)
Bromochloroacetic Acid (ppb)	2019	NA	NA	0.509	0.303 - 0.715	Disinfection byproduct
Dichloroacetic acid (ppb)	2019	NA	NA	1.615	1.21 - 2.02	Disinfection byproduct
Dibromoacetic acid (ppb)	2019	NA	NA	0.302	0.302	Disinfection byproduct
Manganese (ppb)	2019	NA	NA	1.36	1.36	Erosion of natural deposits
Bromide (ppb)	2019	NA	NA	86.75	81.6 – 91.9	Naturally occurring disinfection byproduct precursor
Total Organic Carbon (ppb)	2019	NA	NA	1760	1630 - 1890	Naturally occurring disinfection byproduct precursor
UNREGULATED CONTAMINANTS	S (Results rer	nain on this repo	rt for 3 years fro	m the test	date or when the test is r	repeated)
Sodium (ppm)	2020	NA	NA	30.6	30.6	Erosion of natural deposits
RADIOACTIVE CONTAMINANTS	(Results rem	ain on this report	for 5 years from	the test da	ate or when the test is re	peated)
Beta/photon emitters (mrem/yr)	2020	4	0	0.9	0.9	Decay of natural and man- made deposits.
Gross alpha excluding radon & uranium (pCi/L)	2020	15	0	0.01	0.01	Erosion of natural deposits
RESIDUAL DISINFECTANT & DISI	NFECTION B	Y PRODUCTS				
Chlorine Residual (ppm)	2020	4	NA	2.51	1.68 – 3.05	Water additive used to control microbes
Total Trihalomethanes (ppb)	2020	80	NA	1.6	1.4 – 1.8	Byproduct of drinking water disinfection
Haloacetic acid (ppb)	2020	60	NA	2.85	2.7 – 3.0	Byproduct of drinking water disinfection

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 contaminant in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety. UCMR 4 - Forth Unregulated Contaminant Monitoring Rule.

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, **pCi/L** = one trillionth of a curie, **mrem** = millirems per year (a measure of radiation absorbed by the body)

GENERAL INFORMATION

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 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:

- (A) Microbial contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- (B) Inorganic contaminants, such as salts and metals, which can be naturally-occurring or result from urban storm runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming.
- (C) Pesticides and herbicides, which may come from a variety of sources such as agriculture, stormwater runoff, and residential uses.
- D) 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.
- (E) 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.

Some people may be more vulnerable to contaminants, including the immuno-compromised such as persons undergoing chemotherapy, persons with 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.