
Pioneer Water Department

2019 Consumer Confidence Report



**Village of Pioneer
409 S. State St.
Pioneer, Ohio 43554**

www.villageofpioneer.org

Village of Pioneer Public Water System

Drinking Water Consumer Confidence Report

For calendar year 2019

Introduction

The Village of Pioneer has prepared the following report to provide information to you, the consumer, on the quality of our drinking water. Included within this report is general health information, water quality test results, how to participate in decisions concerning your drinking water and water system contacts.

Source Water Information

The Pioneer water department receives its drinking water from the Michindoh Aquifer located in Northwest Ohio, Southeast Michigan, and Northeast Indiana. Water is withdrawn by three wells that pumped approximately three hundred thousand gallons per day in 2019. The State of Ohio EPA performed an assessment of our source water in 2003. That assessment indicated that Pioneer's source of drinking water has a low susceptibility to contamination due to the following:

- * The presence of a moderately thick protective layer of clay overlying the aquifer.
- * The significant depth of the aquifer below ground, over 25 feet.
- * No evidence to suggest that ground water has been impacted due to significant levels of chemical contaminants from human activities
- * No apparent significant potential contaminant sources in the well field protection area

This susceptibility means that under currently existing conditions, the likelihood of the aquifer becoming contaminated is relatively low. This likelihood of contamination can be minimized by implementing appropriate protective measures.

This susceptibility is subject to revision if new potential contaminate sources are sited within the protection area, or if water sampling indicates contamination by a manmade contaminate source. Copies of the source water assessment report prepared for Pioneer are available by calling Bob Seigneur at 419 737 1525 or it can be accessed on the internet at <http://appa.epa.ohio.gov/swpa/OH8601312>.

What are sources of contamination to 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: (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 water 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, urban storm water 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, USEPA prescribes regulations which limit the quantity 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.

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 Federal Environmental Protection Agency's Safe Drinking Water Hotline (1-800-426-4791).

Who needs to take special precautions?

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 infection. 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 (1-800-426-4791).

About your drinking water

The EPA requires regular sampling to ensure drinking water safety. The Pioneer Water Department conducted sampling for inorganic chemicals, bacteria (total coliform), heavy metals (lead and copper), Disinfection by-products (haloacetic acids and trihalomethanes), and nitrates during 2019. Samples were collected for a total of forty different contaminants, thirty-six of which were not detected in the Pioneer water supply. Most importantly, due to recent drinking water concerns throughout the country, lead was also a contaminant that was not detected. The Ohio EPA requires contaminants that were sampled but not detected within the last five years to not be listed in the following table. Consequently, the few number of contaminants listed in the following table is an indicator of the village of Pioneer's high-water quality. The Ohio EPA requires us to monitoring for some contaminants less than once per year because concentrations of those contaminants do not change frequently. Consequently, some of our data, though accurate, is more than one year old. The village provides high quality safe-to-drink water at a very competitive price. The quality of our water is excellent because it is ground water that is pumped from a water rich zone of sand and gravel aquifers covered by more than twenty-five feet of low permeability material. The covering provides significant protection from surface contamination of an abundant source of ground water. This high-quality water is pumped from the village well field, consisting of three wells, located adjacent to the water treatment plant where iron, taste, and odor is removal through pressure filtration.

Table of Detected Contaminants

Listed below is information on contaminants found in the Pioneer Water Department's drinking water.

TABLE OF DETECTED CONTAMINANTS

Contaminants (Units)	MCLG	MCL	Level Found	Range of Detections	Violation	Sample Year	Typical Source of Contaminants
Radioactive Contaminants							
Combined radium 228 (pCi/L)	4	4	1.09	n/a	No	2016	By-product of drinking water chlorination
Inorganic Contaminants							
Barium (ppm)	2	2	.205	n/a	No	2019	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits
Fluoride (ppm)	4	4	1.24	n/a	No	2019	Erosion of natural deposits; Discharge from fertilizer and aluminum factories; Drinking water additive to promote strong teeth.
Disinfectants including Disinfectant By-Products							
Total Chlorine (mg/l)	MRDLG = 4	MRDL = 4	0.385	0.35 to 0.56	No	2019	Water additive used to control microbes
Haloacetic Acid, HAA5 (ppb or ug/l)	N/A	60	6.3	6.0 to 6.3	No	2018	BY-product of drinking water chlorination
Total Trihalomethanes, TTHM (ppb or ug/l)	N/A	80	20.3	12.6 to 20.3	No	2019	BY-product of drinking water chlorination
Lead and Copper							
Contaminants (units)	Action Level (AL)	Individual Results over the AL	90% of test levels were less than	Violation	Year Sampled	Typical source of Contaminants	
Copper (ppm or mg/l)	1.3	N / A	.086	NO	2019	Corrosion of household plumbing systems.	
	0 out of 10 samples were found to have copper levels in excess of the copper action level of 1.3 ppm.						

Lead Educational Information

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 Pioneer Water Department 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 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 at 800-426-4791 or at <http://www.epa.gov/safewater/lead>.

Revised Total Coliform Rule (RTCR) Information

All water systems were required to begin compliance with a new rule, the Revised Total Coliform Rule, on April 1, 2016. The new rule maintains the purpose to protect public health by ensuring the integrity of the drinking water distribution system and monitoring for the presence of total coliform bacteria, which includes E. coli bacteria. The U.S. EPA anticipates greater public health protection under the new rule, as it requires water systems that are vulnerable to microbial contamination to identify and fix problems. As a result, under the new rule there is no longer a maximum contaminant level violation for multiple total coliform detections. Instead, the new rule requires water systems that exceed a specified frequency of total coliform occurrences to conduct an assessment to determine if any significant deficiencies exist. If found, these must be corrected by the PWS.

License to Operate (LTO) Status Information

In 2019 we had an unconditioned license to operate our water system.

How do I participate in decisions concerning my drinking water?

Public participation and comment are encouraged at regular meetings of the village council at the Community Center. Meetings are held at 7 pm on the second Monday of the month. However, on occasion the council meeting may be postponed and rescheduled if the village council calls for a special meeting. It may also be postponed and rescheduled if the attendance is inadequate to obtain a forum of village council members. When possible, rescheduled meetings will be published in the Bryan Times newspaper to inform the public of the rescheduled date and time.

For more information on your drinking water and this Consumer Confidence Report, or to request that a paper copy of the Consumer Confidence Report to be delivered to your residence, please feel free to contact Bob Seigneur at (419) 737 1525 or the Village Administrations Office at (419) 737 2614.

Backflow Prevention and Cross-Connection Information

If you believe you observed a potential cross-connection or if you have questions regarding backflow prevention, please contact Village offices at (419) 737-2614. For more information regarding Backflow Prevention and Cross-Connection Control please visit the following website:
<http://www.villageofpioneer/departments/backflow-prevention>

Definitions of some terms contained within this report

- 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 Contaminant level (MCL): The highest level of contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.
- 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 disinfectants to control microbial contaminants.
- Action Level (AL): The concentration of contaminate which, if exceeded, triggers treatment or other requirements which a water system must follow.
- Parts per Million (ppm) or Milligrams per Liter (mg/L) are units of measure for concentration of a contaminant. A part per million corresponds to one second in a little over 11.5 days.
- Parts per Billion (ppb) or Micrograms per Liter ($\mu\text{g}/\text{L}$) are units of measure for concentration of a contaminant. A part per billion corresponds to one second in 31.7 years.
- The “<” symbol: A symbol which means less than. A result of <5 means that the lowest level that could be detected was 5 and the contaminant in that sample was not detected.
- Picocuries per liter (pCi/L): A common measure of radioactivity.
- Not applicable (n/a): This means there was no “range of detection” because only one analysis was required for the contaminate.