



2018 ANNUAL DRINKING WATER QUALITY REPORT Ridglea Water System

PWSID #1150215

South Coventry Township, Chester County, Pennsylvania

Este informe contiene información muy importante acerca de su agua potable. Haga que alguien lo traduzca para usted, ó hable con alguien que lo entienda. (This report contains very important information about your drinking water. Have someone translate it for you, or speak with someone who understands it.)

We're pleased to present to you this year's Consumer Confidence Water Quality Report for the Ridglea Water System. This report is designed to inform you about the quality of water and services 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 from two groundwater wells located approximately 375 feet south of the intersection of Route 23 and Stauffer Road.

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 (800-426-4761).

The Ridglea Water System is routinely monitored for constituents in your drinking water according to Federal and State laws. The following table shows the results of our monitoring for the period of January 1st to December 31, 2018. However, the state allows us to monitor for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of our data is from prior years in accordance with the Safe Drinking Water Act. The date has been noted on the sampling results table. Samples collection and testing was conducted by ALS Environmental Laboratories, Middletown, PA (717) 944-5541 and then the facility changed to a different laboratory, MJ Reider Associates, Inc. (610) 374-5129, during 2018.

We are pleased to report that the drinking water supplied to the residents of Ridglea is safe and met all of the federal and state water quality requirements throughout 2018.

If you have any questions about this report or concerning your water utility, please contact **Amanda Shaner (610-469-0444)**. We want our valued customers to be informed about their water utility. We want you to be informed about your water supply. If you want to learn more, please attend any of our regularly scheduled meetings.

In the table below you will find many terms and abbreviations you might not be familiar with. To help you better understand these terms we have provided the following definitions:

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

NA –Not applicable

Maximum Contaminant Level (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(MCLG) – The level of a contaminant in drinking water below which there is no known or expected risk to health. MCLG’s allow for a margin of safety.

Minimum Residual Disinfectant Level (MinRDL) - The minimum level of residual disinfectant required at the entry point to the distribution system.

Maximum Residual Disinfection Level (MRDL) – The highest level of a disinfectant that is allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.

Maximum Residual Disinfection 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.

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.

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

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) – a measure of radioactivity.

WATER QUALITY DATA							
INORGANIC CONTAMINANTS							
Chemical Contaminant	MCL in CCR Units	MCLG	Level Detected	Range of Detections	Units	Violation Y/N	Sources of Contamination
Chlorine	MRDL= 4	MRDLG= 4	1.45	0-1.45	ppm	N	Water additive used to control microbes.
Nitrate	10	10	0.24	N/A	ppm	N	Runoff from fertilizer use; leaching from septic tanks, sewage, erosion of natural deposits.
ENTRY POINT DISINFECTION RESIDUAL							
Chemical Contaminant	Min RDL	Lowest Level Detected	Range of Detections	Units	Violation Y/N	Sources of Contamination	
Chlorine	0.40	0.46	0.46-1.97	ppm	N	Water additive used to control microbes.	

DISINFECTION BYPRODUCTS							
Chemical Contaminant	MCL in CCR Units	MCLG	Level Detected	Range of Detections	Units	Violation Y/N	Sources of Contamination
Total Trihalomethanes (TTHMs)	80	N/A	6.9	N/A	ppb	N	By-product of drinking water chlorination.
BACTERIAL TEST RESULTS[†]							
Chemical Contaminant	MCL	MCLG	Assessments/ Corrective Actions	Violation Y/N	Sources of Contamination		
Total Coliform Bacteria	1 positive monthly sample	N/A	N/A	N	Naturally present in the environment.		
LEAD AND COPPER[†]							
Chemical Contaminant	Action Level (AL)	MCLG	90 th Percentile Value	Units	# of Sites Above AL of Total Sites	Violation Y/N	Sources of Contamination
Lead (2017)	15	0	5.8	ppb	0 out of 10	N	Corrosion of household plumbing systems; Erosion of natural deposits.
Copper (2017)	1.3	1.3	0.17	ppm	0 out of 10	N	Corrosion of household plumbing systems; Erosion of natural deposits; Leaching from wood preservatives.

**** WE NEED YOUR HELP ****

Customer participation is needed to meet our Lead and Copper testing requirements. The DEP requires ten (10) samples to be collected annually from different locations in our distribution system. Please help us satisfy these testing requirements by providing a water sample to our Representative upon request. These samples will be tested for lead and copper at no cost to you. A copy of the laboratory test results will be sent to you after testing. If you would like to assist us, please contact Amanda Shaner at (610-469-0444).

[†]Information about Total Coliform Bacteria

Coliforms are bacteria that are naturally present in the environment and are used as an indicator that other potentially-harmful, bacteria may be present or that a potential pathway existing through which contamination may enter the drinking water distribution system. Total Coliform bacteria was found in one monthly sample in May 2018. However, one positive result does not constitute a violation. Additional testing indicated that there was no E. coli bacteria present in this sample. All required check samples were immediately taken and their results indicated no total coliform bacteria presence. Therefore, level assessments were not needed. Laboratory or sampling errors may have been the cause of the positive result.

[†]Information about Lead

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. Ridglea Water System 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 or at <http://www.epa.gov/safewater/lead>.

†Information about Copper

Copper is an essential nutrient, but some people who drink water containing copper in excess of the action level over a relatively short amount of time could experience gastrointestinal distress. Some people who drink water containing copper in excess of the action level over many years could suffer liver or kidney damage. People with Wilson’s Disease should consult their personal doctor.

RADIOACTIVE CONTAMINANTS							
Chemical Contaminant	MCL in CCR Units	MCLG	Level Detected	Range of Detections	Units	Violation Y/N	Sources of Contamination
Gross Alpha (2016)	15	0	4.2	N/A	pCi/L	N	Erosion of natural deposits of certain minerals that are radioactive and may emit a form of radiation known as alpha radiation

Testing was conducted for a broad range of contaminants in 2018 which were not detected in our samples, including: nitrite, haloacetic acids (five), and regulated VOCs (benzene, carbon tetrachloride, chlorobenzene, toluene, vinyl chloride, etc.).

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

Other Violations

DEP cited two monitoring and reporting violations in 2018 for late reporting in June and October. We are required to monitor the chlorine levels in your water daily as it leaves the treatment plant. The water was sampled and tested as required and was always within allowable levels, however, in those months data was not submitted to DEP by the deadline.

Educational Information

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 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 run-off, 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 stormwater run-off 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 run-off 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 assure that tap water is safe to drink, EPA and DEP prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. FDA and DEP regulations establish the limits for contaminants in bottled water which must provide the same protection for public health.

Drinking water, included 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 (800-426-4791).