

2016 ANNUAL DRINKING WATER QUALITY REPORT: PWSID #: 4180048 NAME: City of Lock Haven Water Dep.

Este informe contiene información muy importante sobre su agua de beber. Tradúzcalo ó hable con alguien que lo entienda bien. (This report contains very important information about your drinking water. Translate it, or speak with someone who understands it.)

WATER SYSTEM INFORMATION:

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 Jason M. Dershem at the Lock Haven Water Department at (570) 893-5909, Web Page – www.lockhavenpa.gov.

We want you to be informed about your water supply. If you want to learn more or get involved with local water issues, you are encouraged to attend any of our regularly scheduled Council meetings. The times and locations of public meetings are announced in advance in the Lock Haven Express.

SOURCE OF WATER:

Our water source is surface water from the Keller Reservoir located in Wayne Township and is filtered by the Central Clinton County Water Filtration Authority's plant in McElhattan. The water supply is generated from a large forested watershed located in Southeastern Clinton County.

A Source Water Assessment of our source was completed in 2003 by the PA Department of Environmental Protection (PADEP). The Assessment has found that our source is potentially most susceptible to contamination from agriculture practices, on-lot wastewater disposal, and transportation Corridors. Overall, our source before treatment has a moderate risk of significant contamination. Summary reports of the Assessment are available by writing to The Lock Haven Water Department at 20 East Church Street, Lock Haven, PA 17745, and will be available on the PADEP website at www.dep.state.pa.us (Keyword: "DEP source water"). Complete reports were distributed to municipalities, water supplier, local planning agencies & PADEP offices. Copies of the complete report are available for review at the PADEP Willamsport Office, Records Management Unit at (570) 327-3636.

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 microbial contaminants are available from the Safe Drinking Water Hotline (800-426-4791).

MONITORING YOUR WATER:

We routinely monitor for contaminants in your drinking water according to federal and state laws. The following tables show the results of our monitoring for the period of January 1 to December 31, 2016. 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.

DEFINITIONS AND ABBREVIATIONS:

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

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. 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.

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

pCi/L = picocuries per liter (a measure of radioactivity)

ppb = parts per billion, or micrograms per liter (ug/L)

ppm = parts per million, or milligrams per liter (mg/L)

DETECTED SAMPLE RESULTS:

Chemical Contaminant	MRDL In CCR Units	MRDLG	Lowest Level Detected	Range of Detections	Units	Violation Y/N	Sources of Contamination
Chlorine (ppm)	4	4	0.15 7/20/16	0.15-1.42	ppm	N	Water additive used to control microbes

Chemical Contaminant	MRDL In CCR Units	MCLG	Highest Level Detected	Range of Detections	Units	Violation Y/N	Sources of Contamination		
Fluoride (CCCWFA)	2	2	1.07 10/22/16	0.53 - 1.07	ppm	N	Erosion of natural deposits; Water additive which promotes strong teeth; Discharge from fertilizer and aluminum factories		
Total Trihalomethanes (TTHM)	80	n/a	55.0 11/2/16	19.5 - 55.0	ppb	Y	By-product of drinking water disinfection		
Haloacetic Acids (HAA5)	60	n/a	50.2 11/2/16	20.9 - 50.2	ppb	Y	By-product of drinking water disinfection		
Contaminant	MCL				MCLG	Level Detected	Sample Date	Violation Of TT Y/N	Source of Contamination
Turbidity	TT=1 NTU for a single measurement				0	0.098 NTU	06/24/16	N	Soil runoff
	TT= at least 95% of monthly samples <0.3 NTU					100%	6/16	N	

Turbidity is a measure of the cloudiness of the water. We monitor it because it is a good indicator of the effectiveness of our filtration system.

(a) Only one sample required

TTHM and HAA5 samples were supposed to be collected between February 3 – 10th for the first quarter, but were inadvertently missed and collected on 2/24/16. In addition we incorrectly sampled in August (the 3rd quarter). A sample was collected from the wrong plan location. These are monitoring violations of the PA Safe Drinking Water Act.

Contaminant	Action Level (AL)	MCLG	90 th Percentile Value	Units	# of Sites Above AL of Total Sites	Violation Of TT Y/N	Sources of Contamination
Lead (2016)	15	0	3.11	ppb	0 out of 20	N	Corrosion of household plumbing
Copper (2016)	1.3	1.3	.107	ppm	0 out of 20	N	Corrosion of household plumbing

T.O.C. = Total Organic Carbon. We test quarterly for T.O.C's and do to very low levels in our source water (raw annual running average is 0.875 mg/l < 2 mg/l) we meet an alternative compliance criteria for which we had no violations of in 2016.

Microbial – Total Coliform and Fecal Coliform are tested several times a month and during 2016 the City had two detection of total coliform in the month of September. Each positive test location was provided with check samples that came back clean; however since both initial positive tests happened in the same monitoring period a violation of the PA Safe Drinking Water Act occurred. Due to changes in the regulations the City was unaware of the required level 1 assessment which did not get completed on time and submitted to DEP which is also a violation. A level one assessment is an investigation of the possibility of any issues with the quality of the drinking water. Now being aware of the regulations any future instances will be provided with the correct level one assessment as well as the submission to DEP being within the required time frame.

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 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 storm water 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 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 and DEP prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. FDA and DEP 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 Environmental Protection Agency's Safe Drinking Water Hotline (800-426-4791).

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. City of Lock Haven 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 or at <http://www.epa.gov/safewater/lead>.