

FOREST LAKES METROPOLITAN DISTRICT, La Plata County, Colorado PWSID# CO0134360

2016 Drinking Water Quality Report (2017)

We are pleased to present this year's Annual Water Quality Report. This report is designed to inform you about the water quality and services we deliver to you every day. Our constant goal is to provide you with a safe and dependable supply of drinking water. Our water comes from wells that draw groundwater from the Pine River alluvium. If you have any questions about this report or concerning your water utility, please contact Brian Sheffield, Manager at the Forest Lakes Metropolitan District office or call (970) 884-2925. We want our valued customers to be informed about their water utility. If you want to learn more, please call the above contact about the District or any scheduled meetings.

Some people may be more vulnerable to contaminants in drinking water than the public in general.

All drinking water, including bottled drinking 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. 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 of infections. More information about contaminants and potential health effects, or to receive a copy of the U.S. Environmental Protection Agency (EPA) and the U.S. Centers for Disease Control (CDC) guidelines on appropriate means to lessen the risk of infection by cryptosporidium and microbiological contaminants call the EPA Safe Drinking Water Hotline at 1-800-426-4791 or by visiting <http://water.epa.gov/drink/contaminants>.

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 runoff, industrial or domestic wastewater discharges, oil and gas production, mining or farming.
- **Pesticides and herbicides**, that 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 byproducts of industrial processes and petroleum production and also may come from gas stations, urban storm water runoff and septic systems.
- **Radioactive** contaminants, that can be naturally occurring or be the result of oil and gas production and mining activities.

Lead in Drinking Water if present, elevated levels of lead can cause serious health problems (especially for pregnant women and young children). It is possible that lead levels at your home may be higher than other homes in the community as a result of materials used in your home's plumbing. If you are concerned about lead in your water, you may wish to have your water tested. 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. Additional information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline (1-800-426-4791) or at <http://www.epa.gov/safewater/lead>.

In order to ensure that tap water is safe to drink, the Colorado Department of Health and Environment prescribes regulations limiting the amount of certain contaminants in water provided by public water systems. The U.S. Food and Drug Administration (FDA) regulations establish limits for contaminants in bottled water that must provide the same protection for public health.

The Colorado Department of Public Health and Environment has provided us with a Source Water Assessment Report for our water supply. You may obtain a copy of the report by visiting <http://www.wgcdcompliance.com/ccr>, clicking on La Plata County and selecting 134360; Forest Lakes MD or by contacting Brian Sheffield at 970-884-2925. For general information about Source Water Assessments, please visit <http://www.cdphe.state.co.us/wq/sw/swaphom.html>.

Potential sources of contamination in our source water area come from: oil/gas facilities, row crops, pasture/hay, forest, septic systems and road miles.

The Source Water Assessment report provides a screening-level evaluation of potential contamination that could occur. It does not mean that the contamination has or will occur. We can use this information to evaluate the need to improve our current water treatment capabilities and prepare for future contamination threats. This can help us ensure that quality finished water is delivered to your homes. In addition, the source water assessment results provide a starting point for developing a source water protection plan.

The water quality table contains many terms and abbreviations that may be unfamiliar. To help you better understand these terms we have provided the following definitions:

AL	Action Level – the concentration of a contaminant that, if exceeded, triggers treatment or other requirements a water system must follow.
HS	High Solids – alpha was not tested
MCL	Maximum Contaminant Level - The "Maximum Allowed" 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.
MCLG	Maximum Contaminant Level Goal - The "Goal" 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.
MRDLG	Maximum Residual Disinfectant Level Goal- 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.
MRDL	Maximum Residual Disinfectant Level – 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.
MFL	Million fibers per Liter – A measure of the presence of asbestos fibers in water longer than 10 micrometers.
MPA	Microscopic Particulate Analysis – An analysis of surface water organisms and indicators in water. This analysis can be used to determine performance of a surface water treatment plant or to determine the existence of surface water influences on a ground water well.
NTU	Nephelometric Turbidity Unit – is a measure of the clarity of water. Turbidity in excess of five NTU is just noticeable to the average person.
NA	Not Applicable. Does not apply.
ND or BDL	Non-Detects or Below Detection Level- laboratory analysis indicates that the contaminant is not present ("<" symbol for less than, the same as ND or BDL)
NT	Not tested.
ppm or mg/l	Parts per million or Milligrams per liter (mg/l). One part per million corresponds to one minute in two years or one dollar in \$1,000,000. 1 ppm= 1,000 ppb
ppb or ug/l	Parts per billion or Micrograms per liter (ug/l). One part per billion corresponds to one minute in 2,000 years, or one dollar in \$1,000,000,000.
ppt or ng/l	Parts per trillion or Nanograms per liter (ng/l). One part per trillion corresponds to one minute in 2,000,000 years or one dollar in \$1,000,000,000,000.
ppq or pg/l	Parts per quadrillion or Picograms per liter (pg/l). One part per quadrillion corresponds to one minute in 2,000,000,000 years or one dollar in \$1,000,000,000,000,000.
pCi/l	PicoCuries per liter – a measure of radioactivity in water.
TT	Treatment Technique – is a required process intended to reduce the level of a contaminant in drinking water.
Gross Alpha	Including RA, Excluding RN & U – This is the gross alpha particle activity compliance value. It includes radium-226, but excludes radon 222 and uranium.
V/E	Variances and Exemptions – State permission not to meet an MCL or a treatment technique under certain conditions.
RAA	Running Annual Average – An average of monitoring results for the previous 12 calendar months.
AVERAGE OF INDIVIDUAL SAMPLES	- The typical value. Mathematically it is the sum of values, divided by the number of samples.
RANGE OF INDIVIDUAL SAMPLES	- The lowest value to the highest value.
NUMBER OF SAMPLES	- The number or count of values.
VIOLATION	- A failure to meet a Colorado Primary Drinking Water Regulation
FORMAL ENFORCEMENT ACTION	- An escalated action taken by the State (due to the number and/or severity of violations) to bring a non-compliant water system into compliance by a certain time, with an enforceable consequence if the schedule is not met.
COMPLIANCE VALUE	- Single or Calculated value used to determine if regulatory contaminant level (e.g. MCL) is met. Examples of calculated values are the 90 th Percentile, Running Annual Average (RAA) and Locational Running Annual Average (LRAA).
SAMPLE SIZE (n)	- Number of count of values (i.e. number of water samples collected).

Detected Contaminants

Forest Lakes routinely monitors for contaminants in your drinking water according to Federal and State laws. The following table(s) show all detections found in the period of January 1 to December 31, 2016, unless otherwise noted. The State of Colorado requires us to monitor for certain contaminants less than once per year because the concentrations of these contaminants are not expected to vary significantly from year to year, or the system is not considered vulnerable to this type of contamination. Therefore, some of our data, though representative, may be more than one year old. Violations and Formal Enforcement Actions, if any, are reported in the next section of this report. Note only detected contaminants sampled within the last 5 years appear in this report.

Disinfectants Sampled in the Distribution System						
TT Requirement: At least 95% of samples per period (month or quarter) must be at least 0.2 ppm <u>OR</u> If sample size is less than 40 no more than 1 sample is below 0.2 ppm Typical Sources: Water additive used to control microbes						
Contaminant Name	Time Period	Results	Number of Samples Below Level	Sample Size	TT Violation	MRDL
Chlorine	December, 2016	Lowest period percentage of samples meeting TT requirement: 100%	0	3	No	4.0 ppm

Lead and Copper Sampled in the Distribution System								
Contaminant Name	Time Period	90 th Percentile	Sample Size	Unit of Measure	90 th Percentile AL	Sample Sites Above AL	90 th Percentile AL Exceedance	Typical Sources
Copper	07/22/2015 to 07/22/2015	0.33	10	ppm	1.3	0	No	Corrosion of household plumbing systems; Erosion of natural deposits
Lead	07/22/2015 to 07/22/2015	13.7	10	ppb	15	1	No	Corrosion of household plumbing systems; Erosion of natural deposits

Disinfection Byproducts Sampled in the Distribution System										
Name	Year	Average	Range Low – High	Sample Size	Unit of Measure	MCL	MCLG	Highest Compliance Value	MCL Violation	Typical Sources
Total Haloacetic Acids (HAA5)	2016	8.3	8.3 to 8.3	1	ppb	60	N/A		No	Byproduct of drinking water disinfection
Total Trihalomethanes (TTHM)	2016	10.1	10.1 to 10.1	1	ppb	80	N/A		No	Byproduct of drinking water disinfection

Radionuclides Sampled at the Entry Point to the Distribution System									
Contaminant Name	Year	Average	Range Low – High	Sample Size	Unit of Measure	MCL	MCLG	MCL Violation	Typical Sources
Gross Alpha	2016	0.77	-0.23 to 1.77	2	pCi/L	15	0	No	Erosion of natural deposits
Combined Radium	2016	2.42	2.15 to 2.68	2	pCi/L	5	0	No	Erosion of natural deposits

Inorganic Contaminants Sampled at the Entry Point to the Distribution System

Contaminant Name	Year	Average	Range Low – High	Sample Size	Unit of Measure	MCL	MCLG	MCL Violation	Typical Sources
Arsenic	2016	0.37	0 to 0.6	3	ppb	10	0	No	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Barium	2016	0.09	0.08 to 0.1	3	ppm	2	2	No	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Chromium	2016	5.4	0 to 9.3	3	ppb	100	100	No	Discharge from steel and pulp mills; erosion of natural deposits
Fluoride	2016	0.14	0.13 to 0.15	3	ppm	4	4	No	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Nitrate	2016	0.71	0.57 to 0.93	3	ppm	10	10	No	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Selenium	2016	0.33	0 to 1	3	ppb	50	50	No	Discharge from petroleum and metal refineries; erosion of natural deposits; discharge from mines
Thallium	2016	0.23	0 to 0.7	3	ppb	2	0.5	No	Leaching from ore-processing sites; discharge from electronics, glass, and drug factories

Secondary Contaminants**

**Secondary standards are non-enforceable guidelines for contaminants that may cause cosmetic effects (such as skin, or tooth discoloration) or aesthetic effects (such as taste, odor, or color) in drinking water.

Contaminant Name	Year	Average	Range Low – High	Sample Size	Unit of Measure	Secondary Standard
Sodium	2016	3.77	3.6 to 3.91	3	ppm	N/A

Radon is currently not regulated, but the District voluntarily participated in the Colorado radon water survey in 1998, which reported a radon level in our water of 1135 pCi/l (picocuries per liter). The District voluntarily sampled for Radon again in 2013 which was reported at 750 pCi/l. Radon is a radioactive gas that you cannot see, taste, or smell. It is found in the soil throughout the United States. Radon can move up through the ground and into a home through cracks and holes in the foundation. Radon can reach high levels in all types of homes. Radon can also be released from tap water from showering, washing dishes and other household activities. Compared to radon entering the home through the soil, radon entering the home through tap water will be, in most cases, a small source of radon in indoor air. Radon is a known human carcinogen. Breathing air that contains radon can lead to lung cancer. Drinking water that contains radon may also cause increased risk of stomach cancer. If you are concerned about radon in your home, test the air in your home. Testing is inexpensive and easy. Fix your home if the level of radon in your air is four (4) picocuries per liter of air (pCi/L) or higher. There are simple ways to fix a radon problem that are relatively inexpensive. For additional information, call the State radon program at 303-692-3030 or call the EPA Radon Hotline 1-800-SOS-RADON.

Testing of other unregulated contaminants produced the following results: nickel = < 1 ppb (3/18/09), sulfate = 10 ppm (3/18/09), manganese = <0.002 mg/l and hardness = 140 mg/l (3/26/13). The District also tested on 3/26/13 regulated and unregulated phase I, II & V organic chemicals including synthetic and volatile organic compounds which were reported less than regulated detectable limits. In addition, the State has issued our water system waivers from monitoring for asbestos, cyanide and glyphosate. There is a Colorado statewide waiver for dioxin monitoring.

Violations and/or Formal Enforcement Actions

No violations or formal enforcement actions occurred in the Calendar year of 2016.

Questions and Comments

Please contact Brian Sheffield, Manager, Forest Lakes Metro District, P.O. Box 440, Bayfield, CO 81122, (970) 884-2925 for questions or comments concerning your drinking water. The District Board of Directors regular Board meeting schedule is the second Tuesday of each month, beginning at 1:30 pm in the Forest Lakes Community Center, 998 Alpine Forest Dr., unless otherwise posted on the District public notification board located at the Forest Lakes mail stop, 257 Alpine Forest Dr.

Pará los que hablan español

El informe contiene información importante sobre la calidad del agua en su comunidad. Tradúzcalo o hable con alguien que lo entienda bien.