

ESTA ES INFORMACIÓN IMPORTANTE. SI NO LA PUEDEN LEER, NECESITAN QUE ALGUIEN SE LA TRADUZCA.

2009

CONSUMER CONFIDENCE REPORT

846 FOREST RD | VAIL, COLORADO 81657 | (970) 476-7480 | ERWSD.ORG
PUBLIC WATER SYSTEM ID # CO0119786



UPPER EAGLE
REGIONAL WATER AUTHORITY

Providing efficient, effective, and reliable water services in a manner that respects the natural environment.

Upper Eagle Regional Water Authority (UERWA) is pleased to present this year's Consumer Confidence Report, which details the quality water and services we deliver every day. Our constant goal is to provide our customers with a safe and dependable supply of drinking water. This report, and the Eagle River Water & Sanitation District's 2009 Consumer Confidence Report, is available online at www.erwsd.org.

For most of the year, we treat surface water from the Eagle River in our Avon treatment plant, which can produce 10 million gallons per day and recently received a state-of-the-art ozone system upgrade. A 5 million-gallon-per-day microfiltration treatment plant also provides water to the area. During the spring and summer, the system is supplemented with three wells in the Eagle River Alluvial Aquifer in the Edwards area, which can produce 500, 230, and 90 gallons per minute (the equivalent of 0.720, 0.331, and 0.130 million gallons per day, respectively). The Ranch (west) side of Cordillera also runs seven small wells which can produce approximately 450 gallons per minute (0.65 million gallons per day) to supplement that area. A connection to the Vail well water system through Dowd Junction can supply up to 2.3 million gallons per day to the UERWA.

It is important that our valued customers be informed about their water utility. Please contact the Water Division Manager at (970) 949-5887 with questions about this report or to schedule a tour of our facilities.



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WHAT'S IN YOUR WATER BEFORE WE TREAT IT?

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 that 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 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 stormwater runoff, and residential uses.

Organic chemical contaminants, including synthetic and volatile organic chemicals, which are by-products of industrial processes and petroleum production, and also may come from gas stations, urban stormwater runoff, and septic systems.

Radioactive contaminants that 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, the U.S. Environmental Protection Agency (EPA) 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.

Colorado has a statewide waiver for dioxin monitoring. UERWA has monitoring waivers for glyphosate, cyanide, and asbestos because our system is not considered vulnerable to this type of contamination.

Our facilities are designed to treat for known contaminants in our watershed, and to meet or exceed Federal and State requirements. Please contact the Water Division Manager at (970) 949-5887 to learn more about our system or with questions about any of the information presented.

OPERATIONS & MANAGEMENT

Your Public Water System is owned by Upper Eagle Regional Water Authority, a local government. The Authority, a quasi-municipal corporation and political subdivision of the State of Colorado, is organized pursuant to the Water Authority Act.

The Authority is comprised of six Member Entities (the Metropolitan Districts of Arrowhead, Beaver Creek, Berry Creek, Eagle-Vail, and Edwards, along with the town of Avon), each of which appoints one Director to the six member Board of Directors. Board meetings are open to the public and are generally scheduled for the fourth Thursday of each month. Operation and maintenance of the water system is provided by Eagle River Water & Sanitation District through an Operations Agreement. The board meeting schedule and other Authority information is available online at erwsd.org or by calling (970) 476-7480.

HEALTH INFORMATION

ABOUT WATER QUALITY

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



All 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 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. These people should seek advice about drinking water from their health care providers.

Infants and young children are typically more vulnerable to lead in drinking water than the general population. 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 elevated lead levels in your home's water, you may wish to have your water tested and flush your tap for 30 seconds to 2 minutes before using tap water.

Although filtration removes *cryptosporidium*, the most commonly used filtration methods cannot guarantee 100 percent removal. Our monitoring indicates the presence of these organisms in our source water and/or finished water. Current test methods do not allow us to determine if the organisms are dead or if they are capable of causing disease. Ingestion of *cryptosporidium* may cause cryptosporidiosis, an abdominal infection. Symptoms of infection include nausea, diarrhea, and abdominal cramps. Most healthy individuals can overcome the disease within a few weeks. However, immuno-compromised people are at greater risk of developing life-threatening illness. We encourage immuno-compromised individuals to consult their doctor regarding appropriate precautions to take to avoid infection. *Cryptosporidium* must be ingested to cause disease, and it may be spread through means other than drinking water.

For 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 (800) 426-4791.



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*Plants need less water after July.
Remember to reset irrigation system
controls monthly to deliver the amount of
water that plants really need.*

SOURCE WATER

ASSESSMENT & PROTECTION



A source water assessment has been completed by the State of Colorado. Consumers can obtain a copy of this assessment by going to the State's Source Water Assessment and Protection (SWAP) Web site located at: www.cdphe.state.co.us/wq/sw/swaphom.html or by contacting the Water Division Manager at (970) 949-5887.

Total susceptibility to potential sources of contamination ranges between moderate and moderately high. This rating reflects conditions that exist throughout the entire watershed, and its overall potential for contamination. UERWA continuously monitors its water sources and is committed to delivering finished drinking water of the highest quality.

Potential sources of contamination in our source water area come from above ground, underground, and leaking storage tanks, existing/abandoned mine sites, EPA hazardous waste generators, EPA abandoned contaminated sites, EPA superfund sites, EPA chemical inventory/storage sites, permitted wastewater discharge sites, high and low intensity residential, commercial/industrial/transportation, urban recreational grasses, quarries/strip mines/gravel pits, pasture/hay, septic systems, row crops, road miles, other facilities; deciduous, evergreen and mixed forests.

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.

AND THE RESULTS ARE IN...

UERWA routinely monitors for contaminants in your drinking water according to Federal and State laws. The table below shows all detections found in the period of **January 1 to December 31, 2009, unless otherwise noted. All are below allowed levels, and there were no violations for the year 2009. Contaminants that were tested for, but not detected,** include all synthetic organic, inorganic, and volatile organic contaminants, except those listed in the table.

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 these types of contamination. Therefore, some of our data, though representative, may be more than one year old.



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TERMS & ABBREVIATIONS

The following definitions explain the many terms and abbreviations, that may be unfamiliar, which are used in this report.

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

Compliance Factor (CF): Measurements should not be lower than this factor.

High Solids (HS): High Solids, alpha was not tested.

Maximum Contaminant Level (MCL): 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.

Maximum Contaminant Level Goal (MCLG): 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.

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.

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.

Million Fibers per Liter (MFL): A measure of the presence of asbestos fibers in water longer than 10 micrometers.

Millirems per Year (mrem/yr): A measure of radiation absorbed by the body.

Nephelometric Turbidity Unit (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.

90th Percentile: 90% of results are below this number.

Non-Detects (ND) or Below Detection Level (BDL): Laboratory analysis indicates that the constituent is not present. (“<” Symbol for less than, the same as ND or BDL)

Not Tested (NT): Not tested.

Parts per million (ppm) or Milligrams per liter (mg/l): One part per million corresponds to one minute in two years or one 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 one penny in \$10,000,000.

Parts per trillion (ppt) or Nanograms per liter (ng/l): One part per trillion corresponds to one minute in 2,000,000 years, or one penny in \$10,000,000,000.

Parts per quadrillion (ppq) or Picograms per liter (pg/l): One part per quadrillion corresponds to one minute in 2,000,000,000 years or one penny in \$10,000,000,000,000.

PicoCuries per Liter (pCi/l): A measure of radioactivity in water.

Running Annual Average (RAA): An average of monitoring results for the previous 12 calendar months.

Secondary Maximum Contaminant Level (SMCL): The highest recommended contaminant level.**

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

Variances and Exemptions: State permission not to meet an MCL or a treatment technique under certain conditions.

Waiver: State permission not to test for a specific contaminant.



Microbiological Contaminants	Violation	Sample Date	MCL or TT		MCLG	CCR Units	Level Detected	Likely Source of Contamination	
Total Coliform Bacteria	No	Monthly	System collects < 40 samples: 1 positive monthly sample.		0	Absent or Present	0.8	Naturally present in the environment	
Fecal Coliform and E. Coli	No	On Positive Total Coliform	A violation occurs when a routine sample and a repeat sample, in any given month, are total coliform positive and one is also fecal coliform or E. Coli positive.		0	Absent or Present	0	Human and animal fecal waste	
Cryptosporidium	No	Sept. 2009	An MCL is not established. Testing is being done on source water to determine if additional treatment will be required in the future.		N/A	Spores	5	Cryptosporidium is a microbial pathogen found in surface water throughout the United States.	
Turbidity	No	May 2009	TT Value is 0.3. A value less than 95% constitutes a TT violation unless approved by the State. Any measurement in excess of 1.0 is a violation.		N/A	NTU	0.02 - 0.29	Soil Runoff	
Lowest Monthly Percent of readings below TT limits: 100%									
Radionuclide Contaminates	Violation	Sample Date	MCL	MCLG	CCR Units	Level Detected	Range	Likely Source of Contamination	
Beta/Photon Emitters	No	6/11/01	Trigger Level = 15	0	pCi/l	4.31	0.74 - 4.31	Decay of natural and man-made deposits	
Alpha Emitters	No	6/11/01	15	0	pCi/l	3.45	0.29 - 3.45	Erosion of natural deposits	
Copper and Lead Contaminants	Exceeds AL	Sample Date	Action Level	MCLG	CCR Units	90th Percentile	# of Samples Exceeding AL	Likely Source of Contamination	
Copper	No	Jul - Sept 2009	1.3	1.3	ppm	0.48	0	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives	
Lead	No	Jul - Sept 2009	15	0	ppb	1.8	0	Corrosion of household plumbing systems, erosion of natural deposits	
Organic and Inorganic Contaminants	Violation	Sample Date	MCL or MRDL	MCLG or MRDLG	CCR Units	Level Detected	Range	Likely Source of Contamination	
Barium	No	6/22/09	2	2	ppm	0.19	0.037 - 0.19	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits	
Chlorine	No	Monthly	MRDL = 4	MRDLG = 4	ppm	2.0	0.2 - 2.0	Water additive used to control microbes.	
Fluoride	No	Daily	4	4	ppm	1.00	0.087 - 1.00	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories.	
Hexachlorocyclopentadiene	No	7/1/09	50	50	ppb	0.11	ND - 0.11	Discharge from chemical factories	
Nitrate	No	6/22/09	10	10	ppm	2.9	0.1 - 2.9	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits	
Nitrate - Nitrite	No	6/14/06	10	10	ppm	2.2	2.0 - 2.2	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits	
Disinfection By-Product Contaminants	Violation	Sample Date	MCL	MCLG	CCR Units	Average	Highest RAA	Range	Likely Source of Contamination
Total Trihalomethanes	No	Quarterly	80	N/A	ppb	35.3	40.8	1.45 - 122.0	By product of drinking water chlorination.
Haloacetic Acids	No	Quarterly	60	N/A	ppb	17.4	22.7	BDL - 95.1	By-product of drinking water disinfection.
Disinfection By-Product Contaminants	Year	Compliance Description					Requirement	Typical Sources	
Control of Disinfection By-Product Precursors	2009	We used enhanced treatment to remove the required amount of natural organic material and/or we demonstrated compliance with alternative criteria					TT	Natural organic material that is present in the environment	
Secondary Contaminants**/ Other Monitoring	Violation	Sample Date	SMCL	CCR Units	Level Detected	Range			
Sodium	No	6/25/09	10,000	ppm	9.5	4.6 - 9.5			
Microscopic Particulate Analysis	No	7/17/09	N/A	Units	BDL	No Range Single Sample			
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WHEN SHOULD I WATER?



MONDAY:
No Outdoor Water Use

TUES/THURS/SAT:
Addresses ending in
ODD numbers may water

WED/FRI/SUN:
Addresses ending in
EVEN numbers may water

WATER USE REGULATIONS

Adhere to the Odd/Even watering schedule as above.

Watering schedule based on last digit of street address.

Keep all outdoor water turned off on Mondays

The irrigation day runs from midnight to midnight

Watering must occur before 10 a.m. or after 4 p.m. on your watering day

Hoses must have water saving shut off nozzles to prevent free running water.

Permits are required for consecutive day irrigation

Permit applications are available at our office and at erwsd.org/wise-use. Permits allow for irrigation on consecutive days excluding Mondays. Requests should be submitted at least 2 business days in advance and permits are issued (free) for the following uses:

Newly-seeded areas: Allows for 28 consecutive days excluding Mondays

Newly-planted sod, annuals, perennials and woody plants: Allows for 14 consecutive days excluding Mondays

Swimming pools are limited to one filling per year, unless draining for repairs is necessary.

Water shall be used for beneficial purposes only.

WATER EFFICIENCY

*Stop by the Vail office to pick up
free water conservation items:*

OUTDOORS: 6 position garden hose nozzle,
soil moisture probe, rain gauge

SHOWER: massage showerhead, 5-minute timer

SINKS: bathroom aerators, dual spray
kitchen aerator

TOILETS: leak detection kit, tank ball,
flapper valve, fill cycle diverter

For more information, call the
Water Conservation Officer at (970) 476-7480



Use Water Wisely



846 FOREST ROAD
VAIL, COLORADO 81657

PREVENT WATER
WASTE

Water in the
morning or
evening. Check
sprinkler heads
for breaks,
blockages, and
over spraying
onto pavement.

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