CASTLE PINES NORTH

METROPOLITAN DISTRICT™

2022 Drinking Water Quality & Consumer Confidence Report

Covering Data for Calendar Year 2021

Why did CPNMD mail me two separate 2022 Water Quality Consumer Confidence Reports, one for CPNMD and another for the Centennial Water & Sanitation District that serves Highlands Ranch?

CPNMD utilizes two water sources. Consistent with CPNMD's bi-annual water-source rotation — courtesy of our newly renovated water-treatment plant and our ten freshly rehabbed deep-water wells — CPNMD's water will continue originating from the Denver Basin Aquifer System until October 1, 2022.

From October 1st through April 30th of each year, CPNMD utilizes its renewable water supplies stored in Chatfield Reservoir, which travels through the Centennial Water & Sanitation District's water-treatment system, through CPNMD's existing InterConnect Pipeline, and into CPNMD's water distribution system.

From May 1st through September 30th of each year, CPNMD utilizes its deep-water wells in the Denver Basin Aquifer System.

CASTLE PINES NORTH METRO DISTRICT

2022 Drinking Water Quality & Consumer Confidence Report

Covering Data for Calendar Year 2021

Public Water System ID: CO0118006

Esta es información importante. Si no la pueden leer, necesitan que alguien se la traduzca.

We are pleased to present to you this year's water quality report. Our constant goal is to provide you with a safe and dependable supply of drinking water. Please contact Jim Worley at 303-688-8550 with any questions or for public participation opportunities that may affect water quality. **Please see the water quality data from our wholesale system(s) (either attached or included in this report) for additional information about your drinking water.**

General Information

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. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline (1-800-426-4791) or by visiting **epa.gov/ground-water-and-drinking-water**.

Some people may be more vulnerable to contaminants in drinking water than the general population. Immunocompromised 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. 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 (1-800-426-4791).

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:** viruses and bacteria that may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- **Inorganic contaminants:** 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:** may come from a variety of sources, such as agriculture, urban storm water runoff, and residential uses.
- **Radioactive contaminants:** can be naturally occurring or be the result of oil and gas production and mining activities.
- **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.

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

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 **epa.gov/safewater/lead**.

Source Water Assessment and Protection (SWAP)

The Colorado Department of Public Health and Environment may have provided us with a Source Water Assessment Report for our water supply. For general information or to obtain a copy of the report please visit wqcdcompliance.com/ccr. The report is located under "Guidance: Source Water Assessment Reports". Search the table using 118006, CASTLE PINES NORTH MD, or by contacting JIM WORLEY at 303-688-8550. 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. Potential sources of contamination in our source water area are listed on the next page.

Please contact us to learn more about what you can do to help protect your drinking water sources, any questions about the Drinking Water Quality Report, to learn more about our system, or to attend scheduled public meetings. We want you, our valued customers, to be informed about the services we provide and the quality water we deliver to you every day.

Our Water Sources

Sources (Water Type - Source Type)	Potential Source(s) of Contamination
A7 WELL (Groundwater-Well) DE7 WELL (Groundwater-Well) A6 WELL (Groundwater-Well) DE6 WELL (Groundwater-Well) A5 WELL (Groundwater-Well) PURCHASED WATER FROM CO0118015 (Surface Water-Consecutive Connection) PURCHASED FROM CASTLE PINES VILLAGE (Groundwater-Consecutive Connection) A1 WELL (Groundwater-Well) A2 WELL (Groundwater-Well) A3 WELL (Groundwater-Well) A4 WELL (Groundwater-Well) LDA1 WELL (Groundwater-Well)	Aboveground, Underground and Leaking Storage Tank Sites, Other Facilities, Low Intensity Residential, Urban Recreational Grasses, Fallow, Evergreen Forest, Septic Systems, Road Miles

Terms and Abbreviations

- **Maximum Contaminant Level (MCL)** – The highest level of a contaminant allowed in drinking water.
- **Treatment Technique (TT)** – A required process intended to reduce the level of a contaminant in drinking water.
- **Health-Based** – A violation of either a MCL or TT.
- **Non-Health-Based** – A violation that is not a MCL or TT.
- **Action Level (AL)** – The concentration of a contaminant which, if exceeded, triggers treatment and other regulatory requirements.
- **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 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 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.
- **Violation (No Abbreviation)** – Failure to meet a Colorado Primary Drinking Water Regulation.
- **Formal Enforcement Action (No Abbreviation)** – Escalated action taken by the State (due to the risk to public health, or number or severity of violations) to bring a non-compliant water system back into compliance.
- **Variance and Exemptions (V/E)** – Department permission not to meet a MCL or treatment technique under certain conditions.
- **Gross Alpha (No Abbreviation)** – Gross alpha particle activity compliance value. It includes radium-226, but excludes radon 222, and uranium.
- **Picocuries per liter (pCi/L)** – Measure of the radioactivity in water.
- **Nephelometric Turbidity Unit (NTU)** – Measure of the clarity or cloudiness of water. Turbidity in

Terms and Abbreviations (continued)

excess of 5 NTU is just noticeable to the typical person.

- **Compliance Value (No Abbreviation)** – Single or calculated value used to determine if regulatory contaminant level (e.g. MCL) is met. Examples of calculated values are the 90th Percentile, Running Annual Average (RAA) and Locational Running Annual Average (LRAA).
- **Average (x-bar)** – Typical value.
- **Range (R)** – Lowest value to the highest value.
- **Sample Size (n)** – Number or count of values (i.e. number of water samples collected).
- **Parts per million = Milligrams per liter (ppm = mg/L)** – One part per million corresponds to one minute in two years or a single penny in $10,000.
- **Parts per billion = Micrograms per liter (ppb = ug/L)** – One part per billion corresponds to one minute in 2,000 years, or a single penny in $10,000,000.
- **Not Applicable (N/A)** – Does not apply or not available.
- **Level 1 Assessment** – 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 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.

Detected Contaminants

CASTLE PINES NORTH MD 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, 2021 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. If no tables appear in this section then no contaminants were detected in the last round of monitoring.

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 ***OR*** 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

Disinfectant Name	Time Period	Results	Number of Samples Below Level	Sample Size	TT Violation	MRDL
Chloramine	July, 2021	Lowest period percentage of samples meeting TT requirement: 80%	2	10	Yes	4.0 ppm

Lead and Copper Sampled in the Distribution System								
Contaminant Name	**Time Period**	**90th Percentile**	**Sample Size**	**Unit of Measure**	**90th Percentile AL**	**Sample Sites Above AL**	**90th Percentile AL Exceedance**	**Typical Sources**
Copper	09/30/2021 to 09/30/2021	0.39	20	ppm	1.3	0	No	Corrosion of household plumbing systems; Erosion of natural deposits
Lead	09/30/2021 to 09/30/2021	1	20	ppb	15	0	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**	**MCL Violation**	**Typical Sources**
Total Haloacetic Acids (HAA5)	2021	8.2	8.2 to 8.2	1	ppb	60	N/A	No	Byproduct of drinking water disinfection
Total Trihalomethanes (TTHM)	2021	19.8	19.8 to 19.8	1	ppb	80	N/A	No	Byproduct of drinking water disinfection

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**
Barium	2021	0.1	0.1 to 0.1	1	ppm	2	2	No	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Chromium	2021	2	2 to 2	1	ppb	100	100	No	Discharge from steel and pulp mills; erosion of natural deposits
Fluoride	2020	0.73	0.73 to 0.73	1	ppm	4	4	No	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum 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	2021	18.2	18.2 to 18.2	1	ppm	N/A

Violations, Significant Deficiencies, and Formal Enforcement Actions

Health-Based Violations

Maximum contaminant level (MCL) violations: Test results for this contaminant show that the level was too high for the time period shown. Please read the information shown below about potential health effects for vulnerable populations. This is likely the same violation that we told you about in a past notice. We are evaluating, or we already completed an evaluation, to find the best way to reduce or remove the contaminant. If the solution will take an extended period of time, we will keep you updated with quarterly notices.

Treatment technique (TT) violations: We failed to complete an action that could affect water quality. Please read the information shown below about potential health effects for vulnerable populations. This is likely the same violation that we told you about in a past notice. We were required to meet a minimum operation/treatment standard, we were required to make upgrades to our system, or we were required to evaluate our system for potential sanitary defects, and we failed to do so in the time period shown below. If the solution will take an extended period of time, we will keep you updated with quarterly notices.

Name	Description	Time Period	Health Effects	Compliance Value	TT Level or MCL	MRDL
CHLORAMINE	FAILURE TO MAINTAIN MINIMUM DISINFECTION IN THE DISTRIBUTION SYSTEM	07/01/2021 - 07/31/2021	Disinfectant residual serves as one of the final barriers to protect public health. Lack of an adequate disinfectant residual may increase the likelihood that disease-causing organisms are present.	N/A	N/A	4.0 ppm

Additional Violation Information

Please share this information with all the other people who drink this water, especially those who may not have received this notice directly (for example, people in apartments, nursing homes, schools, and businesses). You can do this by posting this notice in a public place or distributing copies by hand or mail.

Describe the steps taken to resolve the violation(s), and the anticipated resolution date:

CHLORAMINE: The failed chlorine dosing pumps and injection points that caused this violation have been replaced with new, more reliable, redundant systems to ensure this lapse does not occur again. ***VIOLATION RESOLVED***

Non-Health-Based Violations

These violations do not usually mean that there was a problem with the water quality. If there had been, we would have notified you immediately. We missed collecting a sample (water quality is unknown), we reported the sample result after the due date, or we did not complete a report/notice by the required date.

Name	Description	Time Period
LEAD & COPPER RULE	FAILURE TO INFORM HOMEOWNER OF LEAD RESULTS	01/01/2021 - 10/18/2021
CONSUMER CONFIDENCE RULE	FAILURE TO DELIVER AN ANNUAL CONSUMER CONFIDENCE (WATER QUALITY) REPORT TO THE PUBLIC/CONSUMERS	07/01/2021 - 08/06/2021

Additional Violation Information

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Describe the steps taken to resolve the violation(s), and the anticipated resolution date:

LEAD & COPPER RULE: While lead and copper sampling was completed on time in both the 2020 and 2021 calendar years, the certification documentation was not submitted to the state before the given deadline in 2020 which triggered this violation which stayed active until certification for 2021 sampling had been submitted. ***VIOLATION RESOLVED***

CONSUMER CONFIDENCE RULE: This violation is a result of our system submitting our 2021 consumer confidence report (CCR) after the given deadline. The distribution and certification of this, the 2022 CCR will resolve this violation. Castle Pines North Metro District apologizes for this oversight and has put redundant measures in place to ensure our CCR is distributed, and all related documentation is submitted in a timely manner. ***VIOLATION RESOLVED***

2022 Water Quality Report

CENTENNIAL
WATER AND SANITATION DISTRICT
Serving the communities of Highlands Ranch and Solstice.

We are pleased to present you this year's water quality report. Centennial Water & Sanitation District is committed to providing a safe and dependable supply of high-quality drinking water. Last year, as in years past, your tap water met all U.S. Environmental Protection Agency (EPA) and state drinking water health standards. Please contact Nick Marusin at 303-791-2185 with any questions or for public participation opportunities that may affect water quality. Please see the water quality data from our wholesale system(s) (included in this report) for additional information about your drinking water. A portion of Centennial Water's surface water supply is through leases with other water providers therefore their water quality reports are contained within this report.

General Information

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 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 (1-800-426-4791) or by visiting epa.gov/ground-water-and-drinking-water.

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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 DrinkingWater Hotline (1-800-426-4791) or at epa.gov/safewater/lead.

Source Water Assessment and Protection (SWAP)

The Colorado Department of Public Health and Environment has provided us with a Source Water Assessment Report for our water supply. For general information or to obtain a copy of the report please visit wqcdcompliance.com/ccr. The report is located under "Guidance: Source Water Assessment Reports." Search the table using 118015, CENTENNIAL WSD, or by contacting Nick Marusin at 303-791-2185. The Source Water Assessment Report provides a screening-level evaluation of potential contamination that could occur. It does not mean 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 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. Potential sources of contamination in our source water area are listed below.

Please contact us to learn more about what you can do to help protect your drinking water sources, any questions about the Drinking Water Quality Report, to learn more about our system, or to attend scheduled public meetings. We want you, our valued customers, to be informed about the services we provide and the quality water we deliver to you every day.

Potential Source(s) of Contamination:

EPA Abandoned Contaminated Sites, EPA Hazardous Waste Generators, EPA Chemical Inventory/Storage Sites, Permitted Wastewater Discharge Sites, Aboveground, Underground and Leaking Storage Tank Sites, Solid Waste Sites, Existing/Abandoned Mine Sites, Other Facilities, Commercial/Industrial/Transportation, High Intensity Residential, Low Intensity Residential, Row Crops, Fallow, Pasture / Hay, Evergreen Forest, Septic Systems, Road Miles

Sources (water type - source type)

PURCHASED FROM CO0116001 (Surface Water-Consecutive Connection)
WELL D9 (Groundwater-Well)
WELL TD4 (Groundwater-Well)
WELL TD5 (Groundwater-Well)
WELL TD6 (Groundwater-Well)
WELL TD12 (Groundwater-Well)
WELL A6R (Groundwater-Well)
WELL A12R (Groundwater-Well)
WELL D1 (Groundwater-Well)
WELL D12R (Groundwater-Well)
WELL LFH2 (Groundwater-Well)
WELL LFH7 (Groundwater-Well)
WELL LFH8R (Groundwater-Well)
WELL LFH9 (Groundwater-Well)
WELL LFH10R (Groundwater-Well)
WELL LFH11 (Groundwater-Well)
WELL LFH13 (Groundwater-Well)
WELL LFH14R (Groundwater-Well)
WELL LFH15 (Groundwater-Well)
WELL SP-9 (Groundwater UDI Surface Water-Well)
WELL SP-10 (Groundwater UDI Surface Water-Well)
WELL SP-11 (Groundwater UDI Surface Water-Well)
WELL SP-12 (Groundwater UDI Surface Water-Well)
SOUTH PLATTE RESERVIOIR (Surface Water-Reservoir)
ENGLEWOOD CITY DITCH (Surface Water-Intake)
PURCHASED WATER WISE CO0103843 (Surface Water-Consecutive Connection)
WELL D10A (Groundwater-Well)
MCLELLAN RESERVOIR (Surface Water-Intake)
WELL LFH4R (Groundwater-Well)
WELL D7 (Groundwater-Well)
WELL A5R (Groundwater-Well)
WELL A7R (Groundwater-Well)
WELL A11R (Groundwater-Well)
PA-7S REDRILL (Groundwater-Well)
WELL A8 (Groundwater-Well)
WELL D5 (Groundwater-Well)
WELL D11 (Groundwater-Well)
WELL D13 (Groundwater-Well)
WELL D15 (Groundwater-Well) WELL D19 (Groundwater-Well)
WELL A9R (Groundwater-Well)
WELL A10R (Groundwater-Well)
WELL A13R (Groundwater-Well)
WELL D14 (Groundwater-Well)
WELL D16 (Groundwater-Well)
WELL D17 (Groundwater-Well)
WELL D18 (Groundwater-Well)
WELL D20 (Groundwater-Well)
WELL TD7 (Groundwater-Well)
WELL TD8 (Groundwater-Well)
WELL TD9 (Groundwater-Well)
WELL A1 (Groundwater-Well)
WELL TD10 (Groundwater-Well)
WELL LFH3 (Groundwater-Well)
WELL A2 (Groundwater-Well)
WELL A3 (Groundwater-Well)
WELL A4 (Groundwater-Well)

Detected Contaminants

Centennial Water 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, 2021 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. If no tables appear in this section then no cntaminants were detected in the last round of monitoring.

Disinfectants Sampled in the Distribution System
TT Requirement: Atleast 95% of samples per period (month or quarter) must be at least 0.2 ppm OR if sample size is less than 40 no more than sample is below 0.2 ppm.
Typical Sources: Water additive used to control microbes

Disinfectant Name	Time Period	Results	Number of Samples Below Level	Sample SizeSource	TT Violation	MRDL
Chloramine	December 2021	Lowest period % of samples meeting TT requirement: 100%	0	102	No	4.0 ppm

Lead and Copper Sampled in the Distribution System

Contaminant Name	Time Period	90th Percentile	Sample Size	90th Percentile AL	Sample Sites Above AL	90th Percentile AL Exceedance	Typical Sources
Copper (ppm)	7/12/21-11/9/21	0.39	103	1.3	0	No	Corrosion of household plumbing systems; erosion of natural deposits
Lead (ppb)	1/25/21-6/18/21	3	101	15	0	No	Corrosion of household plumbing systems; erosion of natural deposits
Copper (ppm)	1/25/21-6/18/21	.52	101	1.3	0	No	Corrosion of household plumbing systems; erosion of natural deposits
Lead (ppb)	7/12/21-11/9/21	2	103	15	0	No	Corrosion of household plumbing systems; erosion of natural deposits

Disinfectant Byproducts Sampled in the Distribution System

Name	Year	Average	Range Low-High	Sample Size	MCL	MCLG	MCL Violation	Typical Sources
Total Haloacetic Acids (HAA5) (ppb)	2021	10.91	0-16.5	32	60	N/A	No	Byproduct of drinking water disinfection
Total Trihalomethanes (TTHM) (ppb)	2021	36.32	4.9-57.4	32	80	N/A	No	Byproduct of drinking water disinfection

Total Organic Carbon (Disinfection Byproducts Precursor) Removal Ratio of Raw and Finished Water

Contaminant Name	Year	Average	Range Low-High	Sample Size	TT Minimum Ratio	TT Violation	Typical Sources
Total Organic Carbon Ratio	2021	2.59	1.38-3.35	24	1.00	No	Naturally present in the environment

*If minimum ratio not met and no violation identified then the system achieved compliance using alternative criteria.

Summary of Turbidity Sampled at the Entry Point to the Distribution System					
Contaminant Name	Sample Date	Level Found	TT Requirement	TT Violation	Typical Sources
Turbidity	Dec.	Highest single measurement: 0.07 NTU	Maximum 1 NTU for any single measurement	No	Soil runoff
Turbidity	Dec.	Lowest monthly percentage of samples meeting TT requirement for our technology: 100%	In any month, at least 95% of samples must be less than 0.3 NTU	No	Soil runoff

Radionuclides Sampled at the Entry Point to the Distribution System								
Contaminant Name	Year	Average	Range Low-High	Sample Size	MCL	MCLG	MCL Violation	Typical Source
Gross Alpha (pCi/L)	2020	1.62	0-3.73	3	15	0	No	Erosion of natural deposits
Combined Radium (pCi/L)	2020	1.97	0.5-3.7	3	5	0	No	Erosion of natural deposits
Combined Uranium (ppb)	2020	0.67	0-1	3	30	0	No	Erosion of natural deposits
Gross Beta Particle Activity (pCi/L*)	2020	1.8	0-5.4	3	50	0	No	Decay of natural and man-made deposits

*The MCL for Gross Beta Particle Activity is 4 mrem/year. Since there is no simple conversion between mrem/year and pCi/L, EPA considers 50 pCi/L to be the level of concern for Gross Beta Particle Activity.

Centennial Water & Sanitation District's Water Quality Data Table PWSID: CO 0118015

Inorganic Contaminants Sampled at the Entry Point to the Distribution System								
Contaminant Name	Year	Average	Range Low-High	Sample Size	MCL	MCLG	MCL Violation	Typical Source
Arsenic (ppb)	2021	2.33	1-3	3	10	0	No	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Barium (ppm)	2021	0.07	0.06-0.08	3	2	2	No	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Chromium (ppb)	2021	0.67	0-1	3	100	100	No	Discharge from steel and pulp mills; erosion of natural deposits
Fluoride (ppm)	2021	0.88	0.81-0.93	3	4	4	No	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Nitrate (ppm)	2021	0.18	0.05-0.4	3	10	10	No	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Selenium (ppb)	2021	2	0-5	3	50	50	No	Discharge from petroleum and metal refineries; erosion of natural; deposits; discharge from mines

Secondary Contaminants**					
Contaminant Name	Year	Average	Range Low-High	Sample Size	Secondary Standard
NIckel (ppb)	2021	0.8	<0.9-2.4	3	N/A
Sodium (ppm)	2021	65.6	45.7-92.5	3	N/A
Total Dissolved Solids (ppm)	2021	449	147-867	85	500

**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.

Violations, Significant Deficiencies and Formal Enforcement Actions

No Violations or Formal Enforcement Actions

Terms and Abbreviations

Maximum Contaminant Level (MCL): The highest level of a contaminant allowed in drinking water.

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

Health-Based: A violation of either a MCL or TT.

Non-Health-Based: A violation that is not a MCL or TT.

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

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 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 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.

Violation (No Abbreviation): Failure to meet a Colorado Primary Drinking Water Regulation.

Formal Enforcement Action (No Abbreviation): Escalated action taken by the State (due to the risk to public health, or number or severity of violations) to bring a non-compliant water system back into compliance.

Variance and Exemptions (V/E): Department permission not to meet a MCL or treatment technique under certain conditions.

Gross Alpha (No Abbreviation): Gross alpha particle activity compliance value. It includes radium-226, but excludes radon 222 and uranium.

Picocuries per liter (pCi/L): Measure of radioactivity in water.

Nephelometric Turbidity Unit (NTU): Measure of the clarity or cloudiness of water. Turbidity in excess of 5 NTU is just noticeable to the typical person.

Compliance Value (No Abbreviation): Single or calculated value used to determine if regulatory contaminant level (e.g. MCL) is met. Examples of calculated values are the 90th percentile, running annual average (RAA) and locational running annual average (LRAA).

Average (x-bar): Typical value.

Range (R): Lowest value to the highest value.

Sample Size (n): Number or count of values (i.e. number of water samples collected).

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

Parts per billion = Microorgams per liter (ppb = ug/L): One part per billion corresponds to one minute in 2,000 years, or a single penny in $10,000,000.

Not Applicable (N/A): Does not apply or not available.

Level 1 Assessment: 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 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.

Below Reporting Limit (BRL): When the chemical concentration in the sample is below the sensitivity of the testing instrument.

We are pleased to present to you this year's water quality report for East Cherry Creek Valley WSD (ECCV). Our constant goal is to provide you with a safe and dependable supply of drinking water. Please contact Sara Brewer at 303-693-3800 with any questions or for public participation opportunities that may affect water quality in the ECCV service area. Please see the water quality data from the wholesale system(s) (either attached or included in this report) for additional information about your drinking water.

General Information

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. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline (1-800-426-4791) or by visiting epa.gov/ground-water-and-drinking-water.

Some people may be more vulnerable to contaminants in drinking water than the general population. Immunocompromised 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. 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 (1-800-426-4791).

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:** viruses and bacteria that may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- **Inorganic contaminants:** 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:** may come from a variety of sources, such as agriculture, urban stormwater runoff, and residential uses.
- **Radioactive contaminants:** can be naturally occurring or be the result of oil and gas production and mining activities.
- **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 stormwater runoff, and septic systems.

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

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 epa.gov/safewater/lead.

Source Water Assessment and Protection (SWAP)

The Colorado Department of Public Health and Environment may have provided us with a Source Water Assessment Report for the ECCV water supply. For general information or to obtain a copy of the report please visit wqcdcompliance.com/ccr. The report is located under "Guidance: Source Water Assessment Reports". Search the table using 103035, EAST CHERRY CREEK VALLEY WSD, or by contacting Sara Brewer at 303-693-3800. 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 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. Potential sources of contamination in our source water area are listed at the bottom of the page.

Please contact us to learn more about what you can do to help protect your drinking water sources, any questions about the Drinking Water Quality Report, to learn more about our system, or to attend scheduled public meetings.

Sources (water type - source type)

WPA 6R WELL (Groundwater-Well)
P2 WELL (Groundwater-Well)
P3 WELL (Groundwater-Well)
P4 WELL (Groundwater-Well)
P5 WELL (Groundwater-Well)
P15 WELL (Groundwater-Well)
P18 WELL (Groundwater-Well)
A10 WELL (Groundwater-Well)
L9 WELL (Groundwater-Well)
A13 WELL (Groundwater-Well)
L12 WELL (Groundwater-Well)
A16 WELL (Groundwater-Well)
L15 WELL (Groundwater-Well)
SA1 WELL (Groundwater-Well)
SL1 WELL (Groundwater-Well)
SA10 WELL (Groundwater-Well)
SL10 WELL (Groundwater-Well)
DA5 WELL (Groundwater-Well)
SAU9 WELL (Groundwater-Well)
SAL9 WELL (Groundwater-Well)
SL9 WELL (Groundwater-Well)
SSA5 WELL (Groundwater-Well)
SSL5 WELL (Groundwater-Well)
SSA6 WELL (Groundwater-Well)
WA4 WELL (Groundwater-Well)
WA5A WELL (Groundwater-Well)
WA6A WELL (Groundwater-Well)
WFH3 WELL (Groundwater-Well)
WPA8 WELL (Groundwater-Well)
WCA1R WELL (Groundwater-Well)
P6 WELL (Groundwater-Well)
E7A WELL (Groundwater-Well)
P8 WELL (Groundwater-Well)
P11 WELL (Groundwater-Well)
P12 WELL (Groundwater-Well)
WFH4 WELL (Groundwater-Well)
WA5R WELL (Groundwater-Well)
WA1A WELL (Groundwater-Well)
WA1B WELL (Groundwater-Well)
P13 WELL (Groundwater-Well)
PURCHASED FROM AURORA 3 ZONE 1 (Surface Water-Consecutive Connection)
PURCHASED FROM AURORA 5 ZONE 2 (Surface Water-Consecutive Connection)
PURCHASED FROM DENVER NORTH (Surface Water-Consecutive Connection)
PURCHASED FROM DENVER WEST (Surface Water-Consecutive Connection)
PURCHASED FROM AURORA 2 ZONE 1 (Surface Water-Consecutive Connection)
PURCHASED FROM AURORA 4 ZONE 2 (Surface Water-Consecutive Connection)
WPA 1R WELL (Groundwater-Well)
WELL E1 (Groundwater-Well)
WELL P14 (Groundwater-Well)
WELL P19 (Groundwater-Well)
WELL P20 (Groundwater-Well)
WELL P21 (Groundwater-Well)
PURCHASED FROM AURORA 1 ZONE 2 (Surface Water-Consecutive Connection)
WPA3 WELL (Groundwater-Well)
DA12 WELL (Groundwater-Well)
A7R WELL (Groundwater-Well)
A8 WELL (Groundwater-Well)
A11 WELL (Groundwater-Well)
A12 WELL (Groundwater-Well)
A14 WELL (Groundwater-Well)
A15 WELL (Groundwater-Well)
A17 WELL (Groundwater-Well)
A18 WELL (Groundwater-Well)
SA7 WELL (Groundwater-Well)
DA13 WELL (Groundwater-Well)
L6 WELL (Groundwater-Well)
L7 WELL (Groundwater-Well)
L8 WELL (Groundwater-Well)
L10 WELL (Groundwater-Well)
L13 WELL (Groundwater-Well)
L18 WELL (Groundwater-Well)
SL6 WELL (Groundwater-Well)
SL7 WELL (Groundwater-Well)
SA4 WELL (Groundwater-Well)
A1 WELL (Groundwater-Well)
L4 WELL (Groundwater-Well)
SA2 WELL (Groundwater-Well)
SL2 WELL (Groundwater-Well)
SA3 WELL (Groundwater-Well)
SL3 WELL (Groundwater-Well)
A2R WELL (Groundwater-Well)
L11 WELL (Groundwater-Well)
SA5 WELL (Groundwater-Well)
SL5 WELL (Groundwater-Well)
SA8 WELL (Groundwater-Well)
SL8 WELL (Groundwater-Well)
A9 WELL (Groundwater-Well)
A19 WELL (Groundwater-Well)
A3 WELL (Groundwater-Well)
L19 WELL (Groundwater-Well)
A4 WELL (Groundwater-Well)
A5R WELL (Groundwater-Well)
A6 WELL (Groundwater-Well)
PURCHASED FROM WISE CO0103843 (Surface Water-Consecutive Connection)

Potential Source(s) of Contamination:

EPA Abandoned Contaminated Sites, EPA Hazardous Waste Generators, EPA Chemical Inventory/Storage Sites, Permitted Wastewater Discharge Sites, Aboveground, Underground and Leaking Storage Tank Sites, Solid Waste Sites, Existing/Abandoned Mine Sites, Other Facilities, Commercial/Industrial/Transportation, High Intensity Residential, Low Intensity Residential, Row Crops, Fallow, Pasture / Hay, Evergreen Forest, Septic Systems, Road Miles

Detected Contaminants

EAST CHERRY CREEK VALLEY WSD 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, 2021 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. If no tables appear in this section then no contaminants were detected in the last round of monitoring.

Radionuclides Sampled at the Entry Point to the Distribution System								
Contaminant Name	Year	Average	Range Low-High	Sample Size	MCL	MCLG	MCL Violation	Typical Sources
Gross Alpha (pCi/L)	2021	1.68	0-5.32	8	15	0	No	Erosion of natural deposits
Combined Radium (pCi/L)	2021	2.55	0-5.7	8	5	0	No	Erosion of natural deposits
Combined Uranium (ppb)	2021	3.5	3-4	8	30	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	MCL	MCLG	MCL Violation	Typical Sources
Barium (ppm)	2021	0.02	0.01-0.03	8	2	2	No	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Chromium (ppb)	2021	0.88	0-2	8	100	100	No	Discharge from steel and pulp mills; erosion of natural deposits
Fluoride (ppm)	2021	0.45	0.37-0.55	8	4	4	No	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Nitrate (ppm)	2021	0.25	0-0.7	17	10	10	No	Runoff from fertilizer use; leaching from septic tanks, sewage, erosion of natural deposits
Nitrate-Nitrite (ppm)	2021	0.5	0.5-0.5	1	10	10	No	Runoff from fertilizer use; leaching from septic tanks, sewage, erosion of natural deposits
Selenium (ppb)	2021	2.13	2-3	8	50	50	No	Discharge from petroleum and metal refineries; erosion of natural deposits; discharge from mines

Secondary Contaminants**					
Contaminant Name	Year	Average	Range Low-High	Sample Size	Secondary Standard
Sodium (ppm)	2021	61.2	51.4-67.3	8	N/A

**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.

Unregulated Contaminants

EPA has implemented the Unregulated Contaminant Monitoring Rule (UCMR) to collect data for contaminants suspected to be present in drinking water and do not have health-based standards set under the Safe Drinking Water Act. EPA uses results of UCMR monitoring to learn about the occurrence of unregulated contaminants in drinking water and to decide whether or not these comtaminants will be regulated in the future. We performed monitoring and reported analytical results to EPA in accordance with its UCMR. Once EPA reviews results, results are made available in the EPA's National Contaminant Occurrence Database (NCOD) (epa.gov/dwucmr/national-contaminant-occurrence-database-ncod). Consumers can review results by accessing the NCOD. Contaminants detected during UCMR sampling and corresponding analytical results are provided below.

Contaminant Name	Year	Average	Range Low-High	Sample Size
Bromochloroacetic acid (ppb)	2019	3.32	0-6.12	32
Bromodichloroacetic acid (ppb)	2019	1.84	0-4.97	32
Chlorodibromoacetic acid (ppb)	2019	1.71	0-3.22	32
Tribromoacetic acid (ppb)	2019	1.75	0-3.35	32

Violations, Significant Deficiencies and Formal Enforcement Actions

No Violations or Formal Enforcement Actions

We are pleased to present to you this year's water quality report for the Denver Water service area. Our constant goal is to provide you with a safe and dependable supply of drinking water. Please contact Nicole Poncelet-Johnson at 303-628-5977; 303-628-6039 with any questions or for public participation opportunities that may affect Denver Water's water quality. Please see the water quality data from wholesale system(s) (either attached or included in this report) for additional information about your drinking water.

General Information

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. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline (1-800-426-4791) or by visiting epa.gov/ground-water-and-drinking-water.

Some people may be more vulnerable to contaminants in drinking water than the general population. Immunocompromised 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. 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 (1-800-426-4791).

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:** viruses and bacteria that may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- **Inorganic contaminants:** 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:** may come from a variety of sources, such as agriculture, urban stormwater runoff, and residential uses.
- **Radioactive contaminants:** can be naturally occurring or be the result of oil and gas production and mining activities.
- **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 stormwater runoff, and septic systems.

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

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 epa.gov/safewater/lead.

Source Water Assessment and Protection (SWAP)

The Colorado Department of Public Health and Environment may have provided us with a Source Water Assessment Report for the Denver Water water supply. For general information or to obtain a copy of the report please visit wqcdcompliance.com/ccr. The report is located under "Guidance: Source Water Assessment Reports." Search the table using 116001, DENVER WATER BOARD, or by contacting Nicole Poncelet-Johnson at 303-628-5977; 303-628-6039. 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 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. Potential sources of contamination in our source water area are listed on the next page.

Please contact us to learn more about what you can do to help protect your drinking water sources, any questions about the Drinking Water Quality Report, to learn more about our system, or to attend scheduled public meetings. We want you, our valued customers, to be informed about the services we provide and the quality water we deliver to you every day.

Sources (water type - source type)

MARSTON RESERVOIR (Surface Water-Intake)
STRONTIA SPRINGS RES INTAKE (Surface Water-Intake)
RALSTON RESERVOIR INTAKE (Surface Water-Intake)
S PLATTE DIVERSION CONDUIT 20 (Surface Water-Intake)

Potential Source(s) of Contamination:

EPA Abandoned Contaminated Sites, EPA Hazardous Waste Generators, EPA Chemical Inventory/Storage Sites, EPA Toxic Release Inventory Sites, Permitted Wastewater Discharge Sites, Aboveground, Underground and Leaking Storage Tank Sites, Solid Waste Sites, Existing/Abandoned Mine Sites, Other Facilities, Commercial/Industrial/Transportation, High Intensity Residential, Low Intensity Residential, Urban Recreational Grasses, Quarries / Strip Mines / Gravel Pits, Row Crops, Fallow, Pasture / Hay, Deciduous Forest, Evergreen Forest, Mixed Forest, Septic Systems, Oil / Gas Wells, Road Miles

Detected Contaminants

DENVER WATER BOARD 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, 2021 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. If no tables appear in this section then no contaminants were detected in the last round of monitoring.

Total Organic Carbon (Disinfection Byproducts Precursor) Removal Ratio of Raw and Finished Water							
Contaminant Name	Year	Average	Range Low-High	Sample Size	TT Minimum Ratio	TT Violation	Typical Sources
Total Organic Carbon Ratio	2021	0.45	-31.44-1.45	65	1.00	No	Naturally present in the environment

**If minimum ratio not met and no violation identified then the system achieved compliance using alternative criteria.

Summary of Turbidity Sampled at the Entry Point to the Distribution System					
Contaminant Name	Sample Date	Level Found	TT Requirement	TT Violation	Typical Sources
Turbidity (NTU)	June	Highest single measurement: 0.201 NTU	Maximum 1 NTU for any single measurement.	No	Soil runoff
Turbidity (%)	Dec.	Lowest monthly percentage of samples meeting TT requirement for our technology: 100%	In any month, at least 95% of samples must be less than 0.3 NTU	No	Soil runoff

Radionuclides Sampled at the Entry Point to the Distribution System								
Contaminant Name	Year	Average	Range Low-High	Sample Size	MCL	MCLG	MCL Violation	Typical Sources
Gross Alpha (pCi/L)	2021	0.77	0.5-1	3	15	0	No	Erosion of natural deposits
Combined Radium (pCi/L)	2021	.92	BRL-2.1	9	5	0	No	Erosion of natural deposits

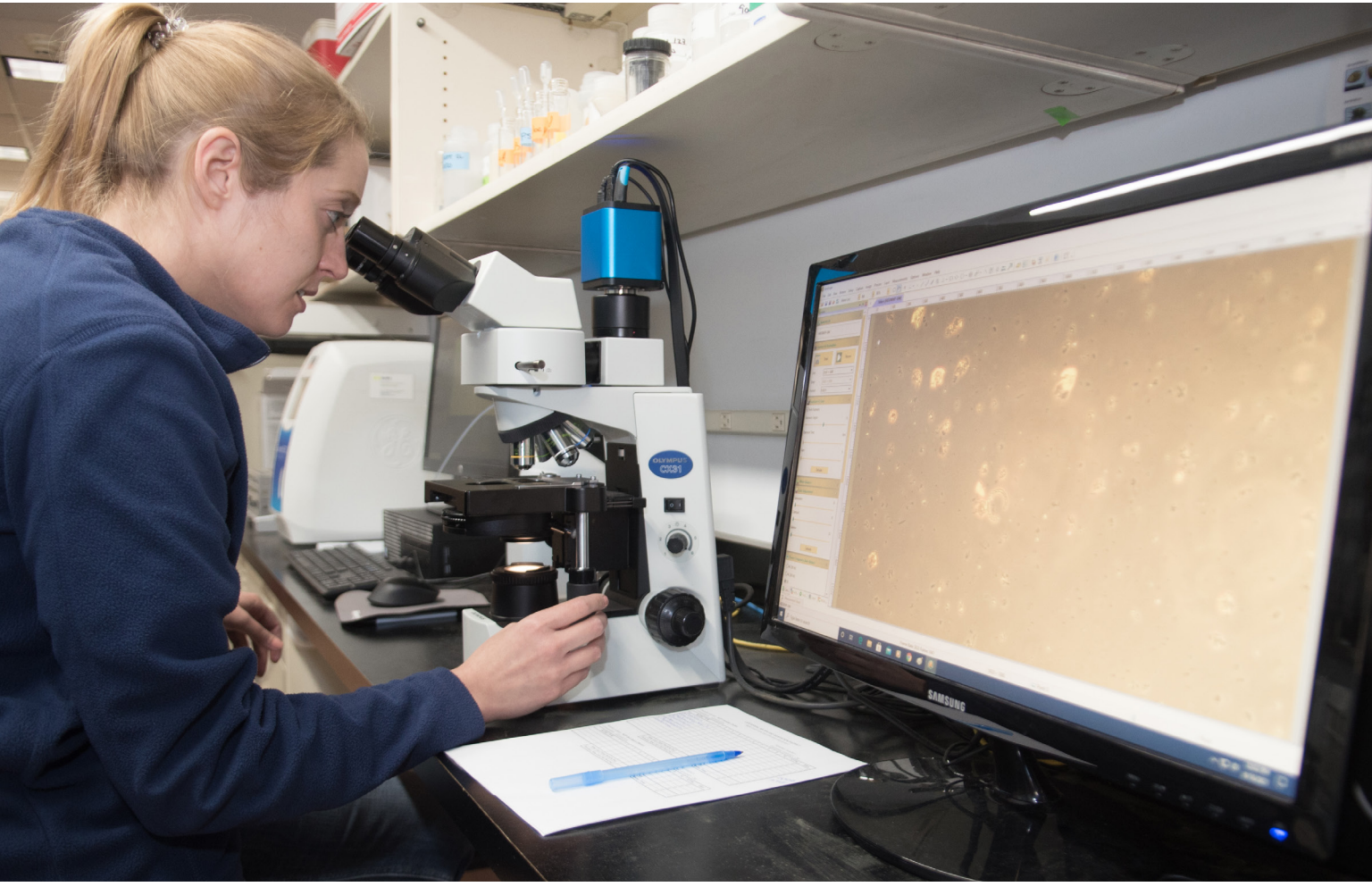
Inorganic Contaminants Sampled at the Entry Point to the Distribution System								
Contaminant Name	Year	Average	Range Low-High	Sample Size	MCL	MCLG	MCL Violation	Typical Sources
Barium (ppm)	2021	0.03	0.02-0.04	32	2	2	No	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Chromium (ppb)	2021	0.03	0-1	32	100	100	No	Discharge from steel and pulp mills; erosion of natural deposits
Fluoride (ppm)	2021	0.6	0.41-0.84	32	4	4	No	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Nitrate (ppm) septic	2021	0.07	0-0.2	32	10	10	No	Runoff from fertilizer use; leaching from tanks, sewage, erosion of natural deposits

Secondary Contaminants**					
Contaminant Name	Year	Average	Range Low-High	Sample Size	Secondary Standard
Sodium (ppm)	2021	20.10	9.1-28.8	32	N/A

*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.

Violations, Significant Deficiencies and Formal Enforcement Actions

No Violations or Formal Enforcement Actions



We are pleased to present to you this year's water quality report for the City of Aurora service area. Our constant goal is to provide you with a safe and dependable supply of drinking water. Please contact Ortilano BOBBY OLIGO at 303-739-6740 with any questions or for public participation opportunities that may affect the City of Aurora's water quality. Please see the water quality data from wholesale system(s) (either attached or included in this report) for additional information about your drinking water.

General Information

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. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline (1-800-426-4791) or by visiting epa.gov/ground-water-and-drinking-water.

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Source Water Assessment and Protection (SWAP)

The Colorado Department of Public Health and Environment may have provided us with a Source Water Assessment Report for the ECCV water supply. For general information or to obtain a copy of the report please visit wqcdcompliance.com/ccr. The report is located under "Guidance: Source Water Assessment Reports". Search the table using 103005, AURORA CITY OF, or by contacting ORTILANO BOBBY OLIGO at 303-739-6740. 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 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. Potential sources of contamination in our source water area are listed on the next page.

Please contact us to learn more about what you can do to help protect your drinking water sources, any questions about the Drinking Water Quality Report, to learn more about our system, or to attend scheduled public meetings. We want you, our valued customers, to be informed about the services we provide and the quality water we deliver to you every day.

Sources (water type - source type)

NC VW10A (Groundwater UDI Surface Water-Well)
NC VW10 (Groundwater UDI Surface Water-Well)
NC VW11 (Groundwater UDI Surface Water-Well)
NC VW12 (Groundwater UDI Surface Water-Well)
NC VW13 (Groundwater UDI Surface Water-Well)
NC VW14 (Groundwater UDI Surface Water-Well)
NC VW15 (Groundwater UDI Surface Water-Well)
NC VW 16 (Groundwater UDI Surface Water-Well)
NC VW18 (Groundwater UDI Surface Water-Well)
NC VW19 (Groundwater UDI Surface Water-Well)
NC VW20 (Groundwater UDI Surface Water-Well)
NC VW21 (Groundwater UDI Surface Water-Well)
NC VW22 (Groundwater UDI Surface Water-Well)
NC VW23 (Groundwater UDI Surface Water-Well)
NC VW24 (Groundwater UDI Surface Water-Well)
NC VW25 (Groundwater UDI Surface Water-Well)
NC VW 26 (Groundwater UDI Surface Water-Well)
CC 1R (Groundwater UDI Surface Water-Well)
CC 2R (Groundwater UDI Surface Water-Well)
CC 4R (Groundwater UDI Surface Water-Well)
CC 5R (Groundwater UDI Surface Water-Well)
CC SA6R (Groundwater UDI Surface Water-Well)
LFH1 (Groundwater-Well)
NC VW 19A (Groundwater UDI Surface Water-Well)
NC VW 10B (Groundwater UDI Surface Water-Well)
NC VW 11A (Groundwater UDI Surface Water-Well)
NC VW 12A (Groundwater UDI Surface Water-Well)
CC 3R (Groundwater UDI Surface Water-Well)
NC VW 18A (Groundwater UDI Surface Water-Well)
RAMPART SOUTH PLATTE RESERVIOR (Surface Water-Intake)
QUINCY RESERVIOR (Surface Water-Intake)
AURORA RESERVIOR (Surface Water-Intake)
DA1 WELL (Groundwater-Well)
DA2 WELL (Groundwater-Well)
DA3 WELL (Groundwater-Well)
NC VW 16A (Groundwater UDI Surface Water-Well)

Potential Source(s) of Contamination:

EPA Abandoned Contaminated Sites, EPA Hazardous Waste Generators, EPA Chemical Inventory/Storage Sites, EPA Toxic Release Inventory Sites, Permitted Wastewater Discharge Sites, Aboveground, Underground and Leaking Storage Tank Sites, Solid Waste Sites, Existing/Abandoned Mine Sites, Other Facilities, Commercial/Industrial/Transportation, High Intensity Residential, Low Intensity Residential, Urban Recreational Grasses, Quarries / Strip Mines / Gravel Pits, Row Crops, Fallow, Small Grains, Pasture / Hay, Deciduous Forest, Evergreen Forest, Mixed Forest, Septic Systems, Oil / Gas Wells, Road Miles

Detected Contaminants

AURORA CITY OF 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, 2021 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. If no tables appear in this section then no contaminants were detected in the last round of monitoring.

Total Organic Carbon (Disinfection Byproducts Precursor) Removal Ratio of Raw and Finished Water

Contaminant Name	Year	Average	Range Low-High	Sample Size	TT Minimum Ratio	TT Violation	Typical Sources
Total Organic Carbon Ratio	2021	1.7	1.3-2.87	26	1.00	No	Naturally present in the environment

**If minimum ratio not met and no violation identified then the system achieved compliance using alternative criteria.

Summary of Turbidity Sampled at the Entry Point to the Distribution System

Contaminant Name	Sample Date	Level Found	TT Requirement	TT Violation	Typical Sources
Turbidity (NTU)	May	Highest single measurement: 0.745 NTU	Maximum 1 NTU for any single measurement.	No	Soil runoff
Turbidity (%)	May	Lowest monthly percentage of samples meeting TT requirement for our technology: 99%	In any month, at least 95% of samples must be less than 0.3 NTU	No	Soil runoff

Radionuclides Sampled at the Entry Point to the Distribution System

Contaminant Name	Year	Average	Range Low-High	Sample Size	MCL	MCLG	MCL Violation	Typical Sources
Gross Alpha (pCi/L)	2017	0.43	0-0.9	3	15	0	No	Erosion of natural deposits
Combined Radium (pCi/L)	2017	2.9	1.8-4	2	5	0	No	Erosion of natural deposits
Combined Uranium (ppb)	2017	2.9	1.6-5.2	3	30	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	MCL	MCLG	MCL Violation	Typical Sources
Arsenic (ppb)	2021	0.33	0-1.18	10	10	0	No	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Barium (ppm)	2021	0.04	0.03-0.06	10	2	2	No	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Chromium (ppb)	2021	0.86	0-1.93	10	100	100	No	Discharge from steel and pulp mills; erosion of natural deposits
Fluoride (ppm)	2021	0.66	0.5-1	29	4	4	No	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Nitrate (ppm)	2021	0.3	0-0.9	28	10	10	No	Runoff from fertilizer use; leaching from septic tanks, sewage, erosion of natural deposits
Selenium (ppb)	2021	1.05	0-5.46	10	50	50	No	Discharge from petroleum and metal refineries; erosion of natural deposits; discharge from mines

Secondary Contaminants**					
Contaminant Name	Year	Average	Range Low-High	Sample Size	Secondary Standard
Sodium (ppm)	2021	22.63	17.1-26.6	3	N/A

**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.

Violations, Significant Deficiencies and Formal Enforcement Actions

No Violations or Formal Enforcement Actions

How can I learn more about my water?

If you have questions about this report or your water services, please contact Centennial Water's lab at 303-791-2185, ext. 3523. We want you to be informed about your water utility. Attending a board meeting is a great way to learn more about Centennial Water's water supply. Meetings are held at the Hendrick Office Building, 62 Plaza Dr., Highlands Ranch, CO 80129 or you can attend virtually through the Zoom platform. Visit centennialwater.org for a board meeting schedule and to view agendas and minutes. A Zoom link will be posted at the top of each agenda for the upcoming meeting.

Participate in a lead and copper sampling program

If you live in a single-family home in Highlands Ranch built between 1983-1987 we want to hear from you.

The EPA established the Lead and Copper Rule which regulates the amount of lead and copper in water. We are required to collect water samples from eligible homes to determine the amount of lead and copper levels in our water at the tap. This is not a new program and is something required of all water districts across the state.

Centennial Water has met lead and copper standards set by the EPA since monitoring began in 1991.

If you are interested in participating or to learn more about the program, scan the QR code.

Tips for Water Quality: Choose Phosphorous-free fertilizer

When it comes time to fertilize your lawn this year, choose a fertilizer that is safe for our water supply. Choose phosphorous-free fertilizer. Phosphorous is harmful to the water supply and should only be used when necessary.

When it rains or snows, the phosphorous runs off the lawn and pollutes nearby rivers, lakes and streams and can impact drinking water. Phosphorous is like junk food for algae and weeds. It feeds them until they grow out of control, turning ponds green and possibly killing fish.

For more tips on keeping our water quality clean, visit **lovecoloradowater.org/care.**