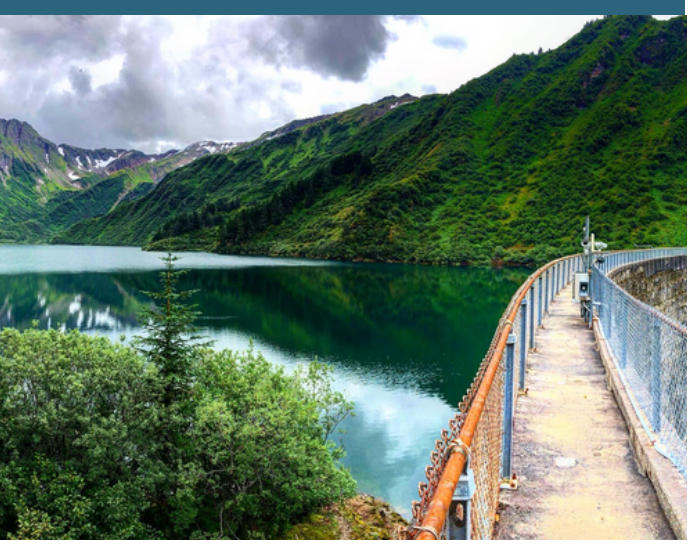
Fun Facts

- Only 3-3.5% of the earth's water is fresh, and only around 1% is available for use. Juneau's water is derived from high-quality natural resources but still requires treatment to eliminate bacteria and other naturally occurring substances.
- Turning off the tap while brushing your teeth can save 8 gallons of water per day and, while shaving, can save 10 gallons of water per shave. Assuming you brush your teeth twice daily and shave 5 times per week, you could save nearly 5,700 gallons per year.
- Letting your faucet run for five minutes while washing dishes can waste 10 gallons of water and uses enough energy to power a 60-watt light bulb for 18 hours.

Source: Environmental Protection Agency. "Statistics and Facts." Water Stats, accessed 5/15/2024, https://www.epa.gov/watersense/statistics-and-facts



FOR MORE INFORMATION

Thank you for reading this report and helping us protect Juneau's water supply. If you have any questions, comments, or would like more information please contact Brian McGuire, CBJ Utilities Superintendent at (907) 586-0393 or the ADEC at (907) 465-5066

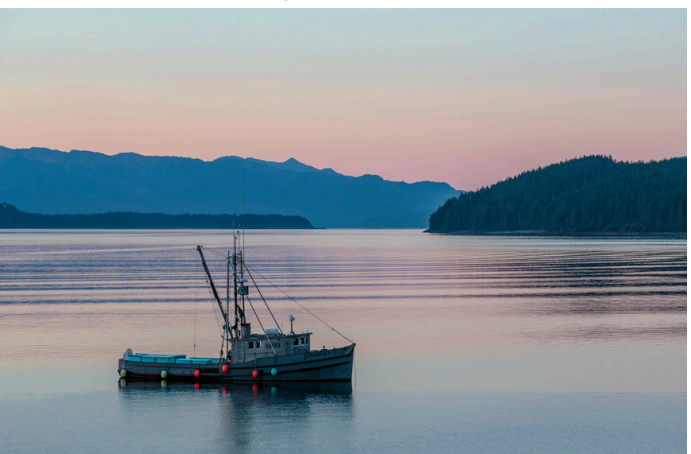
Your Water. Your Report.

Per the United States Environmental Protection Agency's (EPA) National Primary Drinking Water Regulations, all drinking water suppliers are required to provide the public with an annual statement describing the community's water supply and quality. The belief at the City & Borough of Juneau is that our local water resource is your water, and it is the Utility's job to protect its purity and deliver it safely so that is clean and delicious for all residents, visitors, and businesses.

Juneau's drinking water comes from groundwater and surface water sources. The primary water source is the Last Chance Basin (LCB) wellfield located in the Gold Creek watershed; it provides roughly two-thirds of Juneau's water. Surface water, collected at the Salmon Creek (SC) Reservoir, comes from snowmelt and rainfall. This is Juneau's secondary water source and supplies about one-third of the drinking water demand.

Juneau's water requires very little treatment compared to the rest of the United States. Both sources are gently chlorinated to kill any disease causing microorganisms that may be present. As required by the EPA, all surface water is also run through an additional filtration unit.

The CBJ Utility regularly monitors its waters for contaminants, including lead, which have been known to adversely affect water quality in other communities. In the fall of 2022, the reservoir tanks were inspected and cathodic protection systems repairs were made at each reservoir to prevent internal corrosion. Additionally, divers were employed to clean the sediment on the bottom of the tanks. Rigorous monitoring and maintenance programs like these have allowed CBJ to consistently deliver water that meets and exceeds drinking water standards as set by the EPA.



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ALASKA'S CAPITAL CITY

CBJ Utilities Division
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LEAD SERVICE LINE INVENTORY PROGRAM

In response to a water quality crisis in 2014 in Flint, Michigan, the EPA in 2024 mandated that all public drinking water supplies seek to ensure that their entire distribution systems - including privately owned service lines - be lead-free. To help accomplish this goal, the CBJ must inventory the entirety of our drinking water distribution system, including all water mains and service lines to every individual household, school, and business, regardless of ownership.

During 2024, the Utility will be contacting all property owners with privately owned water lines within the City and Borough of Juneau to engage in self-surveys and facilitated inspections in order to complete our federal requirements for this program. The composition of all water service lines will be identified as one of four categories: lead, galvanized containing lead, non-lead, or lead status unknown.

Upon completion of the LSLI, the results will be made available to the public through the Alaska Department of Environmental Conservation (ADEC) and as part of the descriptive information found within the CBJ's Parcel Viewer. Any property owner with a water supply service line that does or may contain lead will be immediately contacted, advised of the current risk, and provided with options for mitigation.

We look forward to partnering with the community to continue our legacy of delivering clean, pure, and delicious drinking water.

EPA

WATER QUALITY REPORT

2023

Denise Koch

ENGINEERING & PUBLIC WORKS DIRECTOR

CBJ's Utility staff maintains the critical infrastructure that delivers delicious high-quality drinking water to Juneau residents and visitors year after year. It's such an essential and reliable service that most of us rarely think about the treatment facilities, constantly evolving regulations, and 175 miles of distribution lines the Utility monitors, maintains, and updates every day. The next time you turn on your faucet, consider raising a glass to the team behind the tap – cheers!

Protect Your Water

PICK UP PET WASTE
Pet waste pollutes waterways with bacteria and excess nutrients. All pets must be leashed in the watershed areas.

RESPECTFUL RECREATION
Camping, shooting, recreational mining (except gold panning) and any hazardous substances are prohibited within the watershed boundaries.

REPORT SUSPICIOUS ACTIVITY
Call the Utilities Division at (907) 586-0393 if you see suspicious activity in or around our water sources or reservoirs.

GET EDUCATED
Contact the Utilities Division if you'd like more information or a tour of our facilities.

SIGN UP FOR PAPERLESS BILLING
Help the Utility conserve resources by receiving your bill by email! Sign up at www.bit.ly/cbj-paperless.

Drinking Water Monitoring & Test Results

TEST	UNITS	MAX CONTAMINANT LEVEL	MAX CONTAMINANT LEVEL GOAL	LAST CHACE BASIN	SALMON CREEK	DATE SAMPLED	SOURCE OF CONTAMINANT
Measured Before Treatment							
Turbidity	NTU	0.3	0	N/A	0.011 avg 0.031 max	Continuous	Turbidity data is recorded post filtration
Arsenic	mg/L	0.01	0	<0.001	<0.001	2022*	Erosion of natural deposits
Barium	mg/L	2	2	0.047	0.042	2022*	Erosion of natural deposits
Fluoride	mg/L	4	4	<0.1	<0.1	2022*	Naturally present in the environment (CBJ has not added fluoride since Jan. 2007)
Nitrate (as Nitrogen)	mg/L	10	10	0.33	<0.1	2023	Fertilizer runoff; sewage leaching; erosion of natural deposits
Selenium	mg/L	0.05	0.05	<0.002	<0.002	2015*	Erosion of natural deposits
Alpha Particles	pCi/L	15	0	1.1	0.26	2015*	Erosion of natural deposits
Radium 226	pCi/L	5	0	0.44	0.84	2015*	Erosion of natural deposits
Radium 228	pCi/L	5	0	1.8	0.22	2015*	Erosion of natural deposits
Measured in the Distribution System							
Total Coliform Bacteria	count	1 positive sample/month	0	No Violation		Weekly	Runoff from organic material
Haloacetic Acids (HAAS)	mg/L	0.06	N/A	0.0019 avg ND-0.0074		Quarterly	By-product of drinking water disinfection
Total Trihalomethanes (TTHM)	mg/L	0.08	N/A	0.0033 avg. 0.00071-0.00753		Quarterly	By-product of drinking water disinfection
Chlorine	mg/L	MRDL = 4	MRDL = 4	0.49 avg		Continuous	Disinfectant used to control microbes
Copper	mg/L	AL = 1.3	1.3	90th percentile = 0.320		2022*	Corrosion of household plumbing systems, erosion of natural deposits
Lead	mg/L	AL = 0.015	0	90th percentile = 0.0006		2022*	Corrosion of household plumbing systems, erosion of natural deposits

***This table presents a summary of the most recent water quality test results for the CBJ water system. ADEC and EPA limit the amount of certain contaminants in drinking water to ensure the safety of public health. Juneau's treated drinking water met all State and Federal standards for public health. Some data, though representative, is more than a year old. Per State requirements, some contaminants are monitored less than once per year due to infrequent concentration shifts.**

CITY AND BOROUGH OF JUNEAU
ALASKA'S CAPITAL CITY

ABBREVIATIONS

ADEC	**Alaska Department of Environmental Conservation**
AL	**Action Level** - The concentration of a contaminant which, if exceeded, triggers additional treatment or other requirements
CBJ	**City and Borough of Juneau**
EPA	**U.S. Environmental Protection Agency**
FDA	**U.S. Food & Drug Administration**
LCB	**CBJ's Last Chance Basin** - Water source
MCL	**Maximum Contaminant Level** - The highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the CMLGs as feasible using treatment technology
MCLG	**Maximum Contaminant Level Goal** - The level of a contaminate in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety
MGD	**Millions Gallons per Day**
mg/L	**Milligram per Liter** - Or parts per million
MRDL	**Maximum Residual Disinfectant Level** - The highest level of a disinfectant allowed in drinking water
N/A	**Not Applicable**
ND	**None Detected at specified level**
NTU	**Nephelometric Turbidity Unit** - The unit of measure for turbidity, or the light scatter create by particles suspended in water
PCi/l	**Pico Curies per Liter**
PPB	**Parts per Billion**
SC	**CBJ's Salmon Creek** - Water Source

EXEMPTIONS AND WAIVERS

The CBJ water system operates under waivers for synthetic organic chemicals and reduced asbestos monitoring as authorized by ADEC.

Potential Water Contaminants

CBJ's drinking water is regularly tested and required to provide the results annually to the public - ensuring that is clean, pure, and delicious. All drinking water may be reasonably expected to contain small amounts of certain contaminants. Contaminants often enter the source water naturally; as water travels over land or through the ground, it dissolves occurring minerals and may pick up substances from the presence of animals or human activity.

The presence of a contaminant does not necessarily indicate that the water poses a health risk. The EPA limits the amounts of contaminants in public water systems to ensure that water is safe to drink. The FDA establishes contaminant limits for bottled water.

SOURCE WATER PROTECTION

A Source Water Assessment was performed for CBJ watersheds to identify the potential for contamination. LCB received a "Medium" susceptibility designation common to groundwater sources. SC reservoir received a "Very High" susceptibility designation (due to potential exposure by wildlife and recreational uses) common for surface water sources. These ratings do not directly reflect the quality of the drinking water; they provide the Water Utility with information as to how prone the water sources are to possible contamination.

Copies of the Source Water Assessments for LCB and SC are available from the ADEC Drinking Water Program at (866) 956-7656, or the Alaska Resource Library at (907) 272-7547.

CONTAMINANTS THAT MAY BE PRESENT IN DRINKING WATER SOURCES

Microbial Contaminants are viruses and bacteria that may come from local wildlife or human activity and could affect source watersheds. The most common examples of these include: giardia, cryptosporidium, salmonella, campylobacter, Escherichia coli (E.coli), Hepatitis A, and Norwalk-type viruses.

Inorganic Contaminants can include a combination of metals, salts, compounds, particles, and mineral complexes which do not contain carbon. Inorganic contaminants include natural or man-made elements or compounds that can contaminate water or be concentrated in the water cycle. Some of the most common contaminants include carbon dioxide and other gases, salts like chloride, sodium, calcium, potassium, iron, and manganese. Inorganic contaminants commonly create a salty or bitter taste, discoloration, or even chemical scale/corrosion.

Organic Contaminants in drinking source waters are comprised of Synthetic Organic Compounds (SOCs) and Natural Organic Matter (NOM). SOCs are man-made chemicals typically from the petroleum, plastics, chemical, pharmaceutical, and agricultural industries. NOM is often due to trace organic compounds from decomposing plant and animal material in the environment. These include a variety of acids, proteins, algae, and microorganisms. Excepting the rare instance of harmful algal blooms, NOM is generally not a health threat.

Radionuclide Contaminants found in public drinking water sources occur naturally. Radioactive radium and uranium are found in small amounts in almost all rock and soil, and can dissolve in water. Radon, a radioactive gas, created through the decay of radium, can also naturally occur in groundwater. If it is not removed, radon in water will increase the risks of kidney damage and cancer.

Contaminants of Special Concern are determined through continual monitoring by the USEPA and currently include Lead and PFAS.

PFAS, or Per- and Polyfluoroalkyl Substances, are persistent synthetic compounds used in a variety of industrial and consumer product applications including non-stick cookware and firefighting foams. PFAS poses a significant threat to human and ecosystem health and the allowable limits in drinking water have recently been further restricted by the EPA to 2 parts per trillion (2 ng/l). There is currently no detectable PFAS in Juneau's source water.

Lead is a toxic metal that is persistent in the environment and can accumulate in the body over time. The USEPA has set the maximum contaminant level goal for lead in drinking water at zero because lead can be harmful to human health even at low exposure levels. The most common sources of lead in drinking water are lead pipes, faucets, and plumbing fixtures. Certain pipes that carry drinking water from the water source to the home may contain lead. Household plumbing fixtures, welding solder, and pipe fittings made prior to 1986 may also contain lead. There is currently no detectable lead in Juneau's source water.

For more information about contaminants in drinking water sources and potential health effects, contact the EPA's Safe Drinking Water Hotline (1-800-426-4791) or visit water.epa.gov/drink/contaminants.