

ANNUAL WATER QUALITY REPORT

Reporting Year 2025



Presented By



RALEIGH WATER DISTRICT



Our Commitment

Raleigh Water District is pleased to present to you this year's annual water quality report. This report is a snapshot of last year's water quality covering all testing performed between January 1 and December 31, 2025. Included are details about your source of water, what it contains, and how it compares to standards set by regulatory agencies. Our constant goal is to provide you with a safe and dependable supply of drinking water. We want you to understand the efforts we make to continually improve the water treatment process and protect our water resources. We are committed to ensuring the quality of your water and providing you with this information because informed customers are our best allies.

Where Does My Water Come From?

Bull Run Watershed

The Bull Run Watershed, Portland's protected surface water supply, is in the Mount Hood National Forest, 26 miles from Portland. The Portland Water Bureau and the U.S. Forest Service carefully manage the watershed to sustain and supply clean drinking water for nearly one million people. In a typical year, the watershed receives an astounding 135 inches of precipitation (rain and snow), which flows into the Bull Run River and then into two reservoirs that store nearly 10 billion gallons of drinking water.



Columbia South Shore Well Field

The Columbia South Shore Well Field, Portland's protected groundwater supply, provides drinking water from 25 active wells located in three different aquifers. The well field is between Portland International Airport and Blue Lake Park. Portland uses the well field for two purposes: to supplement the Bull Run supply in the summer and fall and to temporarily replace the Bull Run supply during turbidity events, maintenance activities, and emergencies.

Reporting UCMR5 Data

We participated in the fifth stage of the U.S. EPA's Unregulated Contaminant Monitoring Rule (UCMR5) program by performing additional tests on our drinking water. UCMR5 sampling benefits the environment and public health by providing the U.S. EPA with data on the occurrence of contaminants suspected to be in drinking water to determine if it needs to introduce new regulatory standards to improve drinking water quality. Unregulated contaminant monitoring data is available to the public, so please feel free to contact us if you are interested in obtaining that information. If you would like more information on the U.S. EPA's Unregulated Contaminant Monitoring Rule, please call the Safe Drinking Water Hotline at (800) 426-4791.

Community Participation

You are invited to participate in our public forum and voice your concerns about your drinking water. We meet the third Wednesday of the month for our board meetings at the district office and virtually via Webex.

Water Treatment Process

Portland treats our drinking water to keep our community safe. Currently, Portland's drinking water treatment is a three-step process:



1. Chlorine disinfects against organisms, such as bacteria and viruses, that could otherwise make people sick.
2. Ammonia stabilizes chlorine to form a longer-lasting disinfectant.
3. Sodium carbonate and carbon dioxide are added to Bull Run water, while sodium hydroxide is added to groundwater, to reduce the corrosion of metals such as lead.

Portland is in the process of changing our Bull Run treatment. Portland does not currently filter Bull Run drinking water. In response to a series of low-level detections of Cryptosporidium in Bull Run water, Portland is constructing a filtration plant to treat for Cryptosporidium. Portland anticipates the filtration plant will be online by 2029.

Important Health Information

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 from infections. These people should seek advice about drinking water from their health-care providers. U.S. Environmental Protection Agency (U.S. EPA)/Centers for Disease Control and Prevention (CDC) guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants are available from the Safe Drinking Water Hotline at (800) 426-4791 or epa.gov/safewater.



QUESTIONS?

For more information about this report, or for any questions relating to your drinking water or to request a paper copy of the report, please call Matt Steidler, District Manager, at (503) 292-4894.

Please share this information with anyone who drinks this water (or their guardians), especially those who may not have received this report directly (for example, people in apartments, nursing homes, schools, and businesses). You can do this by posting this report in a public place or distributing copies by hand, mail, email, or another method.



Substances That Could Be in Water

The sources of drinking water (both tap water and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs, and wells. As water travels over the surface of the land or through the ground, it dissolves naturally occurring minerals and, in some cases, radioactive material and can pick up substances resulting from the presence of animals or from human activity. Contaminants that may be present in source water include:

Microbial Contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife;

Inorganic Contaminants, such as salts and metals, which can occur naturally in the soil or groundwater or may result from urban stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming;

Pesticides and Herbicides, which may come from a variety of sources such as agriculture, urban 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 can also come from gas stations, urban stormwater runoff, and septic systems; and

Radioactive Contaminants, which can occur naturally or be the result of oil and gas production and mining activities.

To ensure that tap water is safe to drink, the U.S. EPA prescribes regulations that limit the amount of certain contaminants in water provided by public water systems. Food and Drug Administration (FDA) regulations establish limits for contaminants in bottled water, which must provide the same protection for public health.

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily mean that water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the Safe Drinking Water Hotline at (800) 426-4791 or visiting epa.gov/safewater.



Source Water Assessment

Source water assessments are completed to identify contaminants of concern for drinking water. Portland's most recent source water assessment from 2019 is available online or by calling (503) 823-7525.

The only contaminants of concern in the Bull Run Watershed are naturally occurring microorganisms that live in virtually all freshwater ecosystems, such as *Giardia*, *Cryptosporidium*, fecal coliform bacteria, and total coliform bacteria. Some of these organisms can make people sick. Portland's drinking water treatment controls all of these organisms except for *Cryptosporidium*. Portland is installing filtration to remove *Cryptosporidium* and other contaminants from drinking water by September 2029.



The Columbia South Shore Well Field is beneath homes and businesses with a variety of potential contaminant sources. The deep aquifers that are the primary sources of water supply have natural geological protection from pollutants present at the land surface. Portland, Gresham, and Fairview work together to protect the well field. The cities' Groundwater Protection Program works with residents and businesses in the well field to ensure that pollutants from this urban area do not impact the groundwater source.

Radon

Our system monitored for radon and found levels of <30 to 388 picocuries per liter (pCi/l), with an average level of 194 pCi/l. Radon is a radioactive gas that you cannot see, taste, or smell. It is found throughout the U.S. Radon can move up through the ground and into a home through cracks and holes in the foundation. Radon levels can build up in all types of homes. Radon can also get into indoor air when released from tap water from showering, washing dishes, and other household activities. Compared to radon entering the home through soil, the amount of radon entering the home through tap water will, in most cases, be a small source. Radon is a known human carcinogen. Breathing air containing radon can lead to lung cancer. Drinking water containing radon may cause increased risk of stomach cancer. If you are concerned about radon in your home, you may want to test the air. Testing is inexpensive and easy. You should pursue radon removal for your home if the level of radon in your air is 4 pCi/L or higher. There are simple ways to fix a radon problem that are not too costly. For additional information, call your state radon program or call the U.S. EPA Radon Hotline at (800) SOS-RADON.

What to Know About Lead

The Portland Water Bureau cares about the health of the families in our community and is committed to helping you reduce your exposure to lead. Lead can cause serious health effects in people of all ages, especially pregnant people, infants (both formula-fed and breastfed/chestfed), and young children.

Lead in drinking water is primarily from materials and parts used in service lines and in home plumbing. Portland is responsible for providing high-quality drinking water and removing lead pipes. While Portland has no known lead service lines, we cannot control the variety of materials used in the plumbing in your home. Because lead levels may vary over time, lead exposure is possible even when your tap sampling results do not detect lead at one point in time.

What you can do about lead

You can help protect yourself and your family by:

- Identifying and removing lead materials within your home plumbing and taking steps to reduce your family's risk.
- Using a filter certified by an American National Standards Institute-accredited certifier to reduce lead is effective in reducing lead exposures. Follow the instructions provided with the filter to ensure it is used properly.
- Using only cold water for drinking, cooking, and making baby formula. Boiling does not remove lead from water.
- Running your water to flush any lead out. Before using tap water for drinking, cooking, or making baby formula, flush your pipes for several minutes. You can do this by running your tap, taking a shower, or doing laundry or a load of dishes.
- Testing your water. If you are concerned about lead in your water and wish to have it tested, order a free lead-in-water test kit online or call (503) 823-7525.

Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available at the U.S. EPA's lead page.

Sources of lead in our water

Lead is rarely found in our source waters. In Portland and Raleigh, lead enters drinking water from household plumbing materials containing lead. These materials include lead-based solder used between 1970 and 1985 to join copper pipe and brass parts and faucets installed before 2014. The most common sources of lead exposure in Portland are lead-based paint and household dust. Learn more at the LeadLine by calling (503) 988-4000.

Portland reduces lead at the tap

Portland treats its water to reduce lead levels at the tap. Sodium carbonate and carbon dioxide are added to Bull Run water to increase the pH and alkalinity, and sodium hydroxide is added to groundwater to increase the pH. This treatment protects your water from any lead in your home plumbing materials.

Corrosion of pipes, plumbing fittings, and fixtures may cause lead and copper to enter drinking water. To assess corrosion of lead and copper, Portland conducts tap sampling for lead and copper at selected sites once per year. Portland treats water by adjusting pH and alkalinity to control corrosion, which was designated as the optimal corrosion control treatment by OHA. To ensure the treatment is operating effectively, Portland monitors water quality parameters set by OHA four times per year.

Improved treatment successfully lowers lead levels

In 2022 we began using improved corrosion control treatment to reduce lead levels at the tap. Since then, we have seen a noticeable reduction in lead levels in homes that have lead solder.

The U.S. EPA requires that 90 percent of homes routinely tested for lead must have lead levels below 15 parts per billion (ppb). Before our improved treatment, lead levels were reduced, but results were close to the 15 ppb action level and sometimes above it. After our improved water treatment, results are now well below the 15 ppb level. Raleigh's results of 0.98 to 5.03 ppb show that our improved water treatment is working to protect our community from lead in plumbing systems.

To address lead in drinking water, public water systems were required to develop and maintain an inventory of service line materials by October 16, 2024. Developing an inventory and identifying the location of lead service lines (LSL) is the first step for beginning LSL replacement and protecting public health. Please contact us if you would like more information about the inventory or any lead sampling that has been done. In 2024 we certified with the state that Raleigh has no known lead service lines. We reviewed records and conducted site inspections to make this determination. Find more information about our process and findings on our webpage at raleigh-h2o.com/lead-service-line-inventory-9f5643c.



Monitoring for *Cryptosporidium*

Data table of *Cryptosporidium* detections at the drinking water intake in 2025.

Total number of samples tested:	193
Total number of samples positive for <i>Cryptosporidium</i>:	54
Levels detected in Portland's water (oocysts/liter)	0-0.08
Source of contaminant	Animal wastes

Cryptosporidium is a potentially disease-causing microorganism that lives in virtually all freshwater ecosystems. Drinking water treatment for *Cryptosporidium* is required by state and federal regulations. For five years, the Oregon Health Authority (OHA) did not require the Portland Water Bureau to treat for *Cryptosporidium* based on data showing that *Cryptosporidium* was rarely found in the Bull Run Watershed. In 2017, after the start of low-level *Cryptosporidium* detections, the OHA determined that treatment is now necessary. Detections of *Cryptosporidium* from Bull Run have continued, primarily during the rainy season.

The Portland Water Bureau does not currently treat for *Cryptosporidium* but is required to do so under drinking water regulations. Portland is working to install filtration by September 30, 2027, under a compliance schedule with the OHA. In the meantime, Portland Water Bureau is implementing interim measures such as watershed protection and additional monitoring to protect public health. Consultation with public health officials continues to conclude that the general public does not need to take any additional precautions.

Exposure to *Cryptosporidium* can cause cryptosporidiosis, a serious illness. Symptoms can include diarrhea, vomiting, fever, and stomach pain. People with healthy immune systems recover without medical treatment. According to the CDC, people with severely weakened immune systems are at risk for more serious disease. Symptoms may be more severe and could lead to serious life-threatening illness. Examples of people with weakened immune systems include those with AIDS, those with inherited diseases that affect the immune system, and cancer and transplant patients who are taking certain immunosuppressive drugs.

The U.S. EPA advises that customers who are immunocompromised and receive their drinking water from the Bull Run Watershed consult with their health-care professional about the safety of drinking the tap water.

In March 2026, OHA informed the Portland Water Bureau that it plans to revise the Bilateral Compliance Agreement with a 24-month extended schedule to account for delays caused by the land use process and provide flexibility to address unforeseen site conditions and weather delays. A new deadline of September 2029 will allow the city to deliver this critical project without compromising construction safety or the integrity of the facility.

Definitions

90th %ile: The levels reported for lead and copper represent the 90th percentile of the total number of sites tested. The 90th percentile is equal to or greater than 90% of our lead and copper detections.

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

cyst/L: cysts per liter of water.

Herbicide: Any chemical(s) used to control undesirable vegetation.

MCL (Maximum Contaminant Level): The highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.

MCLG (Maximum Contaminant Level Goal): The 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.

MRDL (Maximum Residual Disinfectant Level): The highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.

MRDLG (Maximum Residual Disinfectant Level Goal): The level of a drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of the use of disinfectants to control microbial contaminants.

NA: Not applicable.

ND (Not detected): Indicates that the substance was not found by laboratory analysis.

NTU (Nephelometric Turbidity Units): Measurement of the clarity, or turbidity, of water. Turbidity in excess of 5 NTU is just noticeable to the average person.

oocyst/L: Oocyst per liter.

pCi/L (picocuries per liter): A measure of radioactivity.

Pesticide: Generally, any substance or mixture of substances intended for preventing, destroying, repelling, or mitigating any pest.

ppb (parts per billion): One part substance per billion parts water (or micrograms per liter).

ppm (parts per million): One part substance per million parts water (or milligrams per liter).

SMCL (Secondary Maximum Contaminant Level): These standards are developed to protect aesthetic qualities of drinking water and are not health based.

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



Test Results

Our water is monitored for many different kinds of substances on a very strict sampling schedule, and the water we deliver must meet specific health standards. Here, we only show those substances that were detected in our water (a complete list of all our analytical results is available upon request). Remember that detecting a substance does not mean the water is unsafe to drink; our goal is to keep all detects below their respective maximum allowed levels.

The state recommends monitoring for certain substances less than once per year because the concentrations of these substances do not change frequently. In these cases, the most recent sample data is included, along with the year in which the sample was taken.

REGULATED SUBSTANCES

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	MCL [MRDL]	MCLG [MRDLG]	AMOUNT DETECTED	RANGE LOW-HIGH	VIOLATION	TYPICAL SOURCE
Arsenic (ppb)	2025	10	0	1.03	0.50–1.03	No	Erosion of natural deposits; Runoff from orchards; Runoff from glass and electronics production wastes
Barium (ppm)	2025	2	2	0.01	0.0008–0.01	No	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits
Chlorine (ppm)	2025	[4]	[4]	2.05	0.20–2.05	No	Water additive used to control microbes
<i>Cryptosporidium</i> (oocyst/L)	2025	TT	NA	0.08	ND–0.08 ¹	No	Animal wastes
Fecal coliform and <i>E. coli</i> (percent positive samples)	2025	TT ²	0	0.6	NA	No	Human and animal fecal waste
Fluoride (ppm)	2025	4	4	0.096	0.025–0.096	No	Erosion of natural deposits; Water additive that promotes strong teeth; Discharge from fertilizer and aluminum factories
Giardia (cyst/L)	2025	TT	NA	4.9	ND–4.9	No	Animal wastes
Haloacetic Acids [HAA5] (ppb)	2025	60	NA	30	28.2–30	No	By-product of drinking water disinfection
Nitrate (ppm)	2025	10	10	0.11	0.01–0.11	No	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
Total Coliform Bacteria (positive samples)	2025	TT	NA	ND	NA	No	Naturally present in the environment
Total Trihalomethanes [TTHMs] (ppb)	2025	80	NA	45	32.7–45	No	By-product of drinking water disinfection
Turbidity ³ (NTU)	2025	TT	NA	3.3	NA	No	Soil runoff

Tap water samples were collected for lead and copper analyses from sample sites throughout the community

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	AL	MCLG	AMOUNT DETECTED (90TH %ILE)	RANGE LOW-HIGH	SITES ABOVE AL/TOTAL SITES	VIOLATION	TYPICAL SOURCE
Copper (ppm)	2025	1.3	1.3	0.00015	0.005–0.5	0/98	No	Corrosion of household plumbing systems; Erosion of natural deposits
Lead (ppb)	2025	15	0	4.9	0.05–13.4	0/98	No	Corrosion of household plumbing systems; Erosion of natural deposits

SECONDARY SUBSTANCES

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	SMCL	MCLG	AMOUNT DETECTED	RANGE LOW-HIGH	VIOLATION	TYPICAL SOURCE
Manganese (ppb)	2025	50	NA	23.9	1.9–43.8	No	Leaching from natural deposits

UNREGULATED SUBSTANCES

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	AMOUNT DETECTED	RANGE LOW-HIGH	TYPICAL SOURCE
Radon (pCi/L)	2025	194	<30–388	Found in natural deposits
Sodium (ppm)	2025	11.75	11–12	Found in natural deposits

¹ Total number of samples: 193. Total number of samples positive for *Cryptosporidium*: 54. Levels detected in positive samples: 0 - 0.08 oocyst per liter.

² A routine sample and a repeat sample are total coliform positive, and one is also fecal coliform or *E. coli* positive.

³ Turbidity is a measure of the cloudiness of the water. It is monitored because it is a good indicator of water quality and the effectiveness of disinfectants.

