Annual Drinking Water Quality Report
For the operating year of 2024

Southgate Water System

Mailing Address: PO Box 4002, Pasco WA 99302
Public Water System # 56344

Spanish (Espanol)
Este informe contiene informacion importante acerca de su agua potable. Haga que alguien lo traduzca para usted, or hable con alguien que lo entienda.

Who owns Southgate Water System?
In October 2024 the water system was purchased by Paul and Andy Christensen. We own and operate three water systems under our parent corporation, Columbia Basin Water. The web site is ColumbiaBasinWater.com, where you can pay your billing invoices. We live here locally and can be reached at the office number: (509) 492-4050 or by mobile phone: Paul - (509) 460-1202 or Andy – (503) 307-5321.

What is this report?
We're pleased to present to you this year's Annual Water Quality Report. This report is designed to inform you about the water quality and services we deliver to you every day. Our constant goal is to provide you with a safe and dependable supply of drinking water. 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. If you have any questions about this report or concerning your water utility, please contact Paul Christensen at the office number: (509) 492-4050 or by mobile phone (509) 460-1202.

Where does my water come from?
Our water source is groundwater from two wells. Well One (SO-1) is the smaller well located near 102804 E. Tripple Vista Drive. Well Two (SO-2) is the larger pump located lower on the north side of the mountain at 106011 E 297 PRSE. After the water comes out of the wells, we add disinfectant to protect you against microbial contaminants as required by the Washington State Department of Health Office of Drinking Water.

Is my water safe?
Last year, we conducted **12 Coliform** test samples within the system, and a **Nitrate** test sample at each well site. All Coliform tests were satisfactory. Results of the tested and detected contaminants are included in the following tables.

This report is a snapshot of last year's water quality. Included are details about where your water comes from, what it contains, and how it compares to standards set by regulatory agencies. We are committed to providing you with information because informed customers are our best allies. **We're pleased to report that our drinking water is safe and meets federal and state requirements**. If you desire a complete report of all water sample testing, please give me a call and a report will be mailed to you.

Do I need to take special precautions?
Some people may be more vulnerable to contaminants in drinking water than the general population.
Immuno-compromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ transplants, people with HIV/AIDS or other immune system disorders, some elderly, and infants can be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. EPA/Centers for Disease Control (CDC) guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants are available from the Safe Water Drinking Hotline (800-426-4791).

Source water assessment and its availability.
The Benton County Health Department in cooperation with the State Department of Health conducted a Sanitary Survey of our system. Items reviewed included the security of the well sites and the reservoir, cleanliness of the well house areas, protection of the well sites, chemical storage, and general operations.
Both wells are very deep wells (Well One = 1147 feet; Well Two = 1342 feet), which lowers the susceptibility of contamination from surface operations such as farming or domestic septic systems.
Please call us at 509-492-4050 if you would like more information about the assessment.

Why are there contaminants in my drinking water?
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 water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hotline (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.

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

Contaminants that may be present in source include:

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

Inorganic Contaminants, such as salts and metals, which can be naturally occurring or result from urban stormwater runoff, industrial, or domestic wastewater discharges, oil and gas production, mining, or farming;

Pesticides and Herbicides, 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 be naturally occurring or be the result of oil and gas production and mining activities.

Additional information for Nitrate:
Nitrate in drinking water at levels above 10 ppm is a health risk for infants of less than six months of age. High nitrate levels in drinking water can cause blue baby syndrome. Nitrate levels may rise quickly for short periods of time because of rainfall or agricultural activity. If you are caring for an infant, you should ask for advice from your health care provider. See table below for Southgate Water nitrate monitoring report.

Additional information for Lead: (Environmental Protection Agency - EPA)
If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. Southgate Water is responsible for providing high quality drinking water, but cannot control the variety of materials used in plumbing components. 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. If you are concerned about lead in your water, you may wish to have your water tested. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline or online at http://www.epa.gov/safewater/lead. See table below for Southgate Water Lead and Copper monitoring report.
In 2024 we completed the Lead Service Line Inventory report. Based on the years of construction of the system, observed materials found used during repairs, and dates of home building permits, it was determined we have no lead used in the construction of the water system.

Water Quality Data Table

The presence of contaminants in the water does not necessarily indicate that the water poses a health risk. The tables below list all the drinking water contaminants we detected and how they relate to the reporting standards. The EPA or the state requires us to monitor for certain contaminants less than once per year because the concentrations of these contaminants do not change, but the information is still relevant to this reporting period. Unless otherwise noted, the data presented in this table is from testing done in the calendar year of the report.

The water is tested twice per week at a test port located on Tripple Vista Drive to assure consistency in chlorine disinfection residuals. We take a coliform sample monthly that is tested by the Benton Franklin Health Department.

A Water Quality Monitoring Schedule is set by the Washington State Department of Health Office of Drinking Water. **The following table shows that Southgate Water had no violations in 2024.** Test results for this year's required tests, and information on sampling within the past five years are as follows:

Microbiological Contaminants

Contaminant	MCL	MCLG	Date Sampled	Level Detected	Violation	Major Sources in Drinking Water
Total Coliform Bacteria	Zero	Zero	Monthly	Satisfactory	No	Naturally present in the environment
Health Effects E. coli are bacteria whose presence indicates that the water may be contaminated with human or animal wastes. Human pathogens in these wastes can cause short-term effects, such as diarrhea, cramps, nausea, headaches, or other symptoms. They may pose a greater health risk for infants, young children, the elderly, and people with severely compromised immune systems.						
Fecal coliform and E.coli	TT	TT		TT	No	Human and animal fecal waste
Health Effects Fecal indicators are microbes whose presence indicates that the water may be contaminated with human or animal wastes. Human pathogens in these wastes can cause short-term health effects, such as diarrhea, cramps, nausea, headaches, or other symptoms. They may pose a special health risk for infants, young children, some of the elderly, and people with severely compromised immune systems.						

Radioactive Contaminants *(Next Sample 2029 and 2031)*

Contaminant	MCL in pCi/L	MCLG	Sample Date	Sample Location	Southgate Sample	Violation
Gross Alpha	15	N/A, zero	11/2024	Well 1	<3 ± 0.749	No
Radium 228	5	N/A, zero	11/24	Well 1	<0.158 ± 0.045	No
Gross Alpha	15	N/A, zero	05/2021	Well 2	<3 ± 0.459	No
Radium 226	5	N/A, zero	05/2021	Well 2	<1 ± 0.0371	No
Radium 228	-	N/A, zero	05/2021	Well 2	<1 ± 0.103	No
Major Sources in Drinking Water			Erosion of natural deposits			
Health Effects – Alpha Radiation Certain minerals are radioactive and may emit a form of radiation known as alpha radiation. Some people who drink water containing alpha emitters in excess of the MCL over many years may have an increased risk of getting cancer.						
Health Effects – Radium 226 and 228 Some people who drink water containing radium 226 or 228 in excess of the MCL over many years may have an increased risk of getting cancer.						

Inorganic Contaminants *(Next Sample 2026)*

Contaminant **Lead**	AL (in mg/L)	AL in CCR units	MCLG	Sample Date	Southgate (90th%)*	Violation	Major Sources in Drinking Water
This contaminant is converted to CCR units by multiplying mg/L results by 1000							
Lead – lead at consumers tap (ppm)	0.015	15	0	9/2023	1.03	No	Corrosion of household plumbing systems; Erosion of natural deposits.
Sites Sampled = 5 Number exceeding AL = Zero							
Health Effects Infants and children who drink water containing lead in excess of the action level could experience delays in their physical or mental development							

Contaminant **Copper**	AL in mg/L		MCLG	Sample Date	Southgate (90th%)*	Violation	Major Sources in Drinking Water
Copper – copper at consumers tap	1.3		1.3	9/2023	0.0980	No	Corrosion of household plumbing systems; Erosion of natural deposits.
	Sites Sampled = 5 Number exceeding AL = Zero						
Health Effects Copper is an essential nutrient, but some people who drink water containing copper in excess of the action level over a relatively short amount of time could experience gastrointestinal distress.							

***Lead and Copper 90th Percentile:** Out of every 10 homes sampled, 9 were at or below this level. When five homes are sampled, it is the home with the highest test level.

Contaminate	MCL in mg/L	SRL	Trigger	MCLG	Sample Date	Sample Location	Southgate Sample	Violation
Nitrate (measured as Nitrogen)	10	0.5	5	10	9/18/2024	Well 1	0.8	No
Nitrate (measured as Nitrogen)	10	0.5	5	10	9/18/2024	Well 2	0.6	No
Major Sources in Drinking Water Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits								
Health Effects Infants below the age of six months who drink water containing nitrate in excess of the MCL could become seriously ill and, if untreated, may die. Symptoms include shortness of breath and blue baby syndrome.								

(Next Sample 2026)

Contaminate	MCL in mg/L	SRL	Trigger	MCLG	Sample Date	Southgate Sample	Violation	Major Sources in Drinking Water
Barium (ppb)	2	0.1	2	2	9/2017	0.0240	No	Discharge of drilling wastes: Discharge from metal refineries: Erosion of natural deposits.
Nickel	0.1	-	0.1	0.1	9/2017	0.00231	No	Plated metals; Discharge from metal refineries; Erosion of natural deposits
Health Effects Some people who drink water containing barium in excess of the MCL over the years could experience an increase in their blood pressure. EPA has not found nickel to potentially cause health effects from acute exposure at levels above the MCL.								

Volatile Organic Compounds

(Next Sample 2026)

Contaminant	MCL in ug/L	MCL in CCR Units	Sample Date	Southgate Sample	Violation	Major Sources in Drinking Water
TTHMs [Total trihalomethanes]	0.008	80	9/2023	1.51	No	Bi-product of water treatment with chlorine
Health Effects	Some people who drink water containing trihalomethanes in excess of the MCL over many years may experience problems with their liver, kidneys, or central nervous systems, and may have an increased risk of getting cancer.					

Data Table Key: Unit Descriptions

mg/L	mg/L: number of milligrams of substance in one liter of water
ppm	ppm: parts per million, or milligrams per liter
ppb	ppb: parts per billion, or micrograms per liter
ppt	ppt: parts per trillion, or nanograms per liter
pCi/L	pCi/L: picocuries per liter (a measure of radioactivity)
ug/L	ug/L: micrograms per liter
AL	AL (Federal Action Level) EPA maximum contaminant level
NA	NA: not applicable
ND	ND: not detected
NR	NR: monitoring not required, but recommended
SRL	SLR: State Reporting Level: The minimum reporting level established by the Washington State Department of Health (DOH)
Trigger	Trigger Level: DOH drinking water response level. Systems with compounds detected at concentrations in excess of this level may be required to take additional samples or monitor more frequently.
CCR units	Consumer Confidence Report, multiplier applied to reporting units for convenience of comparison

Important Drinking Water Definitions

MCL	Maximum Contaminant Level: This highest level of a contaminant that is allowed in drinking water. MCLs are set as close 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.
TT	Treatment Technique: A required process intended to reduce the level of a contaminant in drinking water.
AL	Action Level: The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.
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	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.
SMCL	**Secondary Maximum Contaminant Level:** These standards are developed to protect the aesthetic qualities of water and are not health based.

We ask that all our customers help us protect our water sources, which are the heart of our community, our way of life, and our children's future.

Report prepared by:
Paul Christensen, System Owner/Operator
Cell Phone: 509-460-1202