2022 Consumer Confidence Report

Water System Information

Water System Name: Inverness Public Utility District

Report Date: July 1, 2023

Type of Water Source(s) in Use: Surface water that originates in springs and streams in the Inverness Ridge watershed above the town.

Name and General Location of Source(s): A network of small catchment basins above the First, Second and Third Valleys collects the water.

Drinking Water Source Assessment Information: An assessment of the surface water sources for IPUD was completed in 2022. The Assessment (Watershed Sanitary Survey) determined that the sources were not vulnerable to contaminants. A copy of the Assessment is available in the District Offices at 12781 Sir Francis Drake Blvd, Unit #5, Inverness, CA 94937.

Time and Place of Regularly Scheduled Board Meetings for Public Participation: Typically, 9:00 a.m. 4th Wednesday of each month, Firehouse Meeting Room, 50 Inverness Way, Inverness, CA 94937

For More Information, Contact: James K Fox or Shelley Redding at 415-669-1414

About This Report

We test the drinking water quality for many constituents as required by state and federal regulations. This report shows the results of our monitoring for the period of January 1 to December 31, 2022 and may include earlier monitoring data.

Importance of This Report Statement in Five Non-English Languages (Spanish, Mandarin, Tagalog, Vietnamese, and Hmong)

Language in Spanish: Este informe contiene información muy importante sobre su agua para beber. Favor de comunicarse Inverness Public Utility District] a 12781 Sir Francis Drake Blvd. Unit #5. 415-669-1414 para asistirlo en español.

Language in Mandarin: 这份报告含有关于您的饮用水的重要讯息。<mark>请用以下地址和电话联系</mark> Inverness Public Utility District以获得中文的帮助12781 Sir Francis Drake Blvd. Unit #5, 415-669-1414

Language in Tagalog: Ang pag-uulat na ito ay naglalaman ng mahalagang impormasyon tungkol sa inyong inuming tubig. Mangyaring makipag-ugnayan sa [Enter Water System's Name and Address] o tumawag sa [Enter Water System's Phone Number] para matulungan sa wikang Tagalog.

Language in Vietnamese: Báo cáo này chứa thông tin quan trọng về nước uống của bạn. Xin vui lòng liên hệ Inverness Public Utility District tại 12781 Sir Francis Drake Blvd. Unit #5, 415-669-1414 để được hỗ trợ giúp bằng tiếng Việt.

Language in Hmong: Tsab ntawv no muaj cov ntsiab lus tseem ceeb txog koj cov dej haus. Thov hu rau **Inverness Public Utility District** ntawm **12781 Sir Francis Drake Blvd. Unit #5, 415-669-1414** rau kev pab hauv lus Askiv.

Terms Used in This Report

Term	Definition
Maximum Contaminant Level (MCL)	The highest level of a contaminant that is allowed in drinking water. Primary MCLs are set as close to the PHGs (or MCLGs) as is economically and technologically feasible. Secondary MCLs are set to protect the odor, taste, and appearance of drinking water.
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 are set by the U.S. Environmental Protection Agency (U.S. EPA).
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 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.
Primary Drinking Water Standards (PDWS)	MCLs and MRDLs for contaminants that affect health along with their monitoring and reporting requirements, and water treatment requirements.
Public Health Goal (PHG)	The level of a contaminant in drinking water below which there is no known or expected risk to health. PHGs are set by the California Environmental Protection Agency.
Regulatory Action Level (AL)	The concentration of a contaminant which, if exceeded, triggers treatment or other requirements that a water system must follow.
Secondary Drinking Water Standards (SDWS)	MCLs for contaminants that affect taste, odor, or appearance of the drinking water. Contaminants with SDWSs do not affect the health at the MCL levels.
Treatment Technique (TT)	A required process intended to reduce the level of a contaminant in drinking water.
Variances and Exemptions	Permissions from the State Water Resources Control Board (State Board) to exceed an MCL or not comply with a treatment technique under certain conditions.
ND	Not detectable at testing limit.
ppm	parts per million or milligrams per liter (mg/L)
ppb	parts per billion or micrograms per liter (µg/L)
ppt	parts per trillion or nanograms per liter (ng/L)
ppq	parts per quadrillion or picogram per liter (pg/L)
pCi/L	picocuries per liter (a measure of radiation)

Sources of Drinking Water and Contaminants that May Be Present in Source 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, that may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- Inorganic contaminants, such as salts and metals, can be naturally occurring or result from urban stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming.
- Pesticides and herbicides, that may come from a variety of sources such as agriculture, urban stormwater runoff, and residential uses.
- Organic chemical contaminants, including synthetic and volatile organic chemicals, that are byproducts of industrial processes and petroleum production, and can also come from gas stations, urban stormwater runoff, agricultural application, and septic systems.
- Radioactive contaminants, that can be naturally occurring or be the result of oil and gas production and mining activities.

Regulation of Drinking Water and Bottled Water Quality

In order to ensure that tap water is safe to drink, the U.S. EPA and the State Board prescribe regulations that limit the amount of certain contaminants in water provided by public water systems. The U.S. Food and Drug Administration regulations and California law also establish limits for contaminants in bottled water that provide the same protection for public health.

About Your Drinking Water Quality

Drinking Water Contaminants Detected

Tables 1, 2, 3, 4, 5, 6, and 8 list all of the drinking water contaminants that were detected during the most recent sampling for the constituent. The presence of these contaminants in the water does not necessarily indicate that the water poses a health risk. The State Board allows us to monitor for certain contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of the data, though representative of the water quality, are more than one year old. Any violation of an AL, MCL, MRDL, or TT is asterisked. Additional information regarding the violation is provided later in this report.

Table 1. Sampling Results Showing the Detection of Coliform Bacteria

Complete if bacteria are detected.

Microbiological Contaminants	Highest No. of Detections	No. of Months in Violation	MCL	MCLG	Typical Source of Bacteria
None detected	(In the year)	0	0	0	Human and animal fecal waste

⁽a) Routine and repeat samples are total coliform-positive and either is *E. coli*-positive or system fails to take repeat samples following *E. coli*-positive routine sample or system fails to analyze total coliform-positive repeat sample for *E. coli*.

Table 2. Sampling Results Showing the Detection of Lead and Copper

Complete if lead or copper is detected in the last sample set.

Lead and Copper	Sample Date	No. of Samples Collected	90 th Percentile Level Detected	No. Sites Exceeding AL	AL	PHG	Typical Source of Contaminant
Lead (ppb)	8/23/22- 9/09/22	10	.005	1	15	0.2	Internal corrosion of household water plumbing systems; discharges from industrial manufacturers; erosion of natural deposits
Copper (ppm)	8/23/22- 9/09/22	10	.070	0	1.3	0.3	Internal corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives

Table 3. Sampling Results for Sodium and Hardness

Chemical or Constituent (and reporting units)	Sample Date	Level Detected	Range of Detections	MCL	PHG (MCLG)	Typical Source of Contaminant
Sodium (ppm)		Avg = 21 mg/L	19-23 mg/L	None	None	Salt present in the water and is generally naturally occurring
Hardness (ppm)		Avg = 34 mg/L	23-54 mg/L	None	None	Sum of polyvalent cations present in the water, generally magnesium and calcium, and are usually naturally occurring

Table 4. Detection of Contaminants with a Primary Drinking Water Standard

Chemical or Constituent (and reporting units)	Sample Date	Level Detected	Range of Detections	MCL [MRDL]	PHG (MCLG) [MRDLG]	Typical Source of Contaminant
Aluminum (μg/L		ND		1	0.6	Erosion of natural deposits; residue from some surface water treatment processes
Antimony (µg/L)		ND		6	1	Discharge from petroleum refineries, fire retardants; ceramics, electronics
Arsenic (µg/L)		ND		10	.004	Erosion of natural deposits; runoff from orchards, glass and electronics production waste
Barium (µg/L))		ND		1	2	Discharges of oil drilling wastes and from metal refineries; erosion of natural deposits
Beryllium (µg/L)		ND		4	1	Discharge from metal refineries, coal burning factories, and electrical / aerospace/defense industries
Cadmium (μg/L)	11/21/22	ND		5	0.04	Internal corrosion of galvanized pipes; erosion of natural deposits; runoff from waste batteries and paints
Chromium (µg/L)	11/21/22	ND				Erosion of natural deposits
Copper (µg/L))	11/21/22	ND		1.0	1.0	Erosion of natural deposits, leaching from wood preservatives
Fluoride (mg/L)	11/21/22	.14	0.0-0.14	2.0	1.0	Erosion of natural deposits
Manganese (μg/L)	11/21/22	ND			50	

Mercury (μg/L)	11/21/22	ND	.002	.0012	Erosion of natural deposits; discharge from refineries and factories; runoff from landfills and cropland
Nickle (µg/L)	11/21/22	ND	0.1	0.012	Erosion of natural deposits
Nitrate as N (μg/L)	11/21/22	ND	10	10	Runoff and leaching from fertilizer use; leaching from septic and sewage, erosion of natural deposits
Nitrite as N (μg/L)	11/21/22	ND	1	1	Runoff and leaching from fertilizer use; leaching from septic tanks and sewage; erosion of natural deposits
Perchlorate (µg/L)	11/21/22	ND	.006	.001	Environmental contamination from historic aerospace or other industrial operations
Selenium (µg/L)	11/21/22	ND	.05	.030	Discharge from petroleum, glass, and metal refineries
Thallium (µg/L)	11/21/22	ND	.002	.001	Leaching from ore processing sites; discharge from electronics, glass, and drug factories
Zinc (mg/L)	11/21/22	ND	5.0		Runoff/ leaching of natural deposits

Table 5. Detection of Contaminants with a Secondary Drinking Water Standard

Chemical or Constituent (and reporting units)	Sample Date	Level Detected	Range of Detections	SMCL	PHG (MCLG)	Typical Source of Contaminant
Aluminum		ND		200		Erosion of natural deposits; residue from some surface water treatment processes
Chloride (mg/L)	11/21/22	Avg = 14.33 mg/L	19-43 mg/L	500 mg/L		Runoff/ leaching from natural deposits; seawater influence
Color		15 CU	0 – 15			Naturally occurring organic material
Copper		ND		1.0		Internal corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
Foaming Agents [MBAs] (mg/L)		ND		0.5		Municipal and Industrial waste discharges
Iron (mg/L)		ND				Leaching from natural deposits; industrial wastes
Manganese (mg/L)		ND				Leaching from natural deposits
Odor		2.0	0 – 2.0			Naturally occurring organic material
Silver (mg/L)		ND				Industrial discharges
Turbidity		ND				Soil runoff
Zinc (mg/L)		ND				Runoff/leaching from natural deposits; industrial wastes
Total Dissolved Solids [TDS] (mg/L)		Avg. 130 mg/L	120 – 150 mg/L			Runoff/leaching from natural deposits
Specific Conductance (umhos/cm)		210 umhos/cm	180 – 240 umhos/cm			Substances that form ions when in water; seawater influence
Chloride (mg/L)		29.33 mg/L	19 – 43 mg/L			Runoff/leaching from natural deposits; seawater influence

Table 6. Detection of Unregulated Contaminants

Chemical or Constituent (and reporting units)	Sample Date	Level Detected	Range of Detections	Notification Level	Health Effects
Total Organic Carbon (mg/L)	Quarterly	Avg 1.47	.0879 mg/L- 1.84 mg/L	N//A	N/A

Additional General Information on 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 the water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the U.S. EPA's Safe Drinking Water Hotline (1-800-426-4791).

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. U.S. 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 Drinking Water Hotline (1-800-426-4791).

Lead-Specific Language: 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. [Enter Water System's Name] 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. [Optional: If you do so, you may wish to collect the flushed water and reuse it for another beneficial purpose, such as watering plants.] 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 (1-800-426-4791) or at http://www.epa.gov/lead.

Additional Special Language for Nitrate, Arsenic, Lead, Radon, and *Cryptosporidium*: [Enter Additional Information Described in Instructions for SWS CCR Document]

State Revised Total Coliform Rule (RTCR): [Enter Additional Information Described in Instructions for SWS CCR Document]

Summary Information for Violation of a MCL, MRDL, AL, TT, or Monitoring and Reporting Requirement

Table 7. Violation of a MCL, MRDL, AL, TT or Monitoring Reporting Requirement

Violation	Explanation	Duration	Actions Taken to Correct Violation	Health Effects Language
None				

For Systems Providing Surface Water as a Source of Drinking Water

Table 10. Sampling Results Showing Treatment of Surface Water Sources

Treatment Technique (a) (Type of approved filtration technology used)	Ultra and Nano Membrane Filtration
Turbidity Performance Standards (b) (that must be met through the water treatment process)	Turbidity of the filtered water must: 1 – Be less than or equal to 0.1 NTU in 95% of measurements in a month.
	2 – Not exceed 1.0 NTU for more than eight consecutive hours. 3 – SWRCB must be notified by telephone if water exceeds 1.0 NTU.
Lowest monthly percentage of samples that met Turbidity Performance Standard No. 1.	100%
Highest single turbidity measurement during the year	.03 NTU
Number of violations of any surface water treatment requirements	None

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

Summary Information for Violation of a Surface Water TT

Table 11. Violation of Surface Water TT

Violation	Explanation	Duration	Actions Taken to Correct Violation	Health Effects Language
None				
None				

⁽b) Turbidity (measured in NTU) is a measurement of the cloudiness of water and is a good indicator of water quality and filtration performance. Turbidity results which meet performance standards are considered to be in compliance with filtration requirements.