



**Dublin San Ramon
Services District**

Water, wastewater, recycled water

2023 ANNUAL WATER QUALITY REPORT

April 30, 2024

This report contains important information about your drinking water. Please contact Dublin San Ramon Services District (DSRSD) at 7051 Dublin Boulevard, Dublin CA 94568 or (925) 828-0515 for assistance.

Este informe contiene información importante sobre su agua potable. Póngase en contacto con Dublin San Ramon Services District (DSRSD) acudiendo a 7051 Dublin Boulevard, Dublin CA 94568 o llamando al (925) 828-0515 para recibir ayuda en español.

本报告包含您的饮用水相关的重要信息。如需中文帮助，请联系都柏林圣拉蒙服务区 (Dublin San Ramon Services District, DSRSD)，地址：7051 Dublin Boulevard, Dublin CA 94568 或电话：(925) 828-0515。

इस रपॉर्ट में आपके पीने के जल से सम्बंधित महत्वपूर्ण जानकारी है। हृदी में सहायता के लए, Dublin San Ramon Services District (DSRSD) को 7051 Dublin Boulevard, Dublin CA 94568 अथवा (925) 828-0515 पर संपर्क करें।

A Message from the General Manager

Dublin San Ramon Services District (DSRSD) is pleased to present the 2023 Annual Water Quality Report to provide our customers with important information about their potable (drinking) water. DSRSD purchases all of its potable water from Tri-Valley wholesaler Zone 7 Water Agency (Zone 7). The results of the water quality monitoring performed by Zone 7 and DSRSD confirm water delivered to customers met or exceeded all state and federal standards in 2023.

Addressing forever chemicals in the water

Per- and polyfluoroalkyl substances (PFAS) are a group of manmade chemicals that have been used extensively since the 1940s to make consumer products waterproof, stain-resistant, or nonstick. Recognizing that PFAS are contaminants of emerging concern in drinking water, the U.S. Environmental Protection Agency (U.S. EPA) created new standards for water agencies to detect and respond to PFAS, and the State of California is in the process of creating similar standards.

Zone 7 actively monitors for PFAS in its water supplies and takes action to protect the public from PFAS exposure. In 2023, Zone 7 opened a PFAS treatment facility at Stoneridge Well to remove PFAS from its groundwater. The first of its kind in northern California, this facility will help ensure that the drinking water de-

livered to our customers complies with the new regulatory limits for PFAS. See page 4 for more information.

Conservation as a way of life

Over the past several years Californians have come to expect extreme shifts in weather, moving from severe drought to historic wet weather events almost overnight. It is more crucial than ever that we work together to reduce water waste and save water for future droughts. DSRSD customers are eligible to apply for water-saving rebates through Zone 7 at www.dsrdsd.com/rebates.

Ensuring a reliable water supply

DSRSD recognizes the importance of a resilient water supply for our customers now and for the future. To address droughts and other future uncertainties, DSRSD is collaborating with Zone 7 and other Tri-Valley water agencies to develop a diverse and climate-resilient water portfolio. Learn more about the Tri-Valley's water supply challenges and solutions at www.trivalleywater.org.

Jan Lee, General Manager

SOURCES OF OUR POTABLE WATER

DSRSD purchases all of its potable water from Zone 7. This water comes from three sources: In 2023, about 95% was imported surface water from the California State Water Project and local rain runoff stored in Del Valle Reservoir, and about 5% was groundwater from local wells.

The surface water supply starts in the Sierra Nevada as rain and snow melt. Conveyed by the State Water Project from Lake Oroville on the Feather River in northern California, it travels through the Sacramento River, the Delta, and the South Bay Aqueduct to Zone 7's Del Valle and Patterson Pass treatment plants. When State Water Project allocations are restricted, more of our water comes from local sources. Learn more at <https://youtu.be/2F-T9DKNpDA?si=4nHihneBxOWII6RI>.

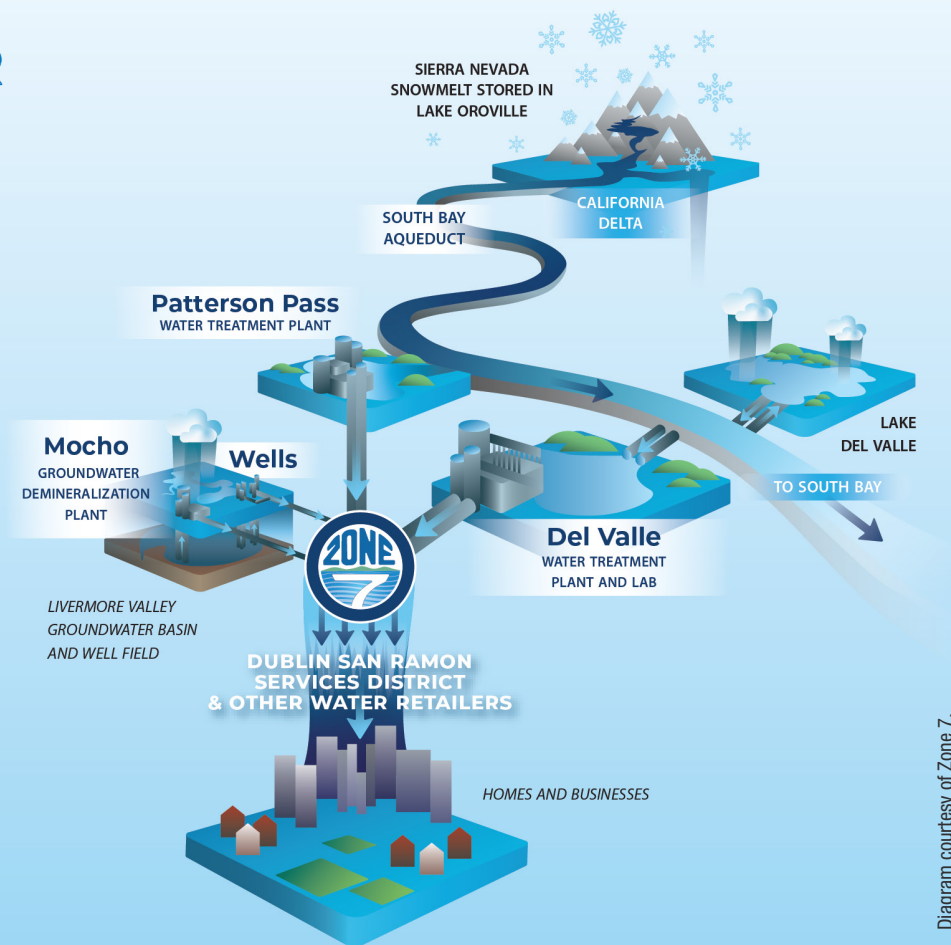


Diagram courtesy of Zone 7.

Water Quality Standards Regulate Contaminants

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 wastewater treatment plants, septic systems, agricultural livestock operations, and wildlife.
- Inorganic contaminants, such as salts and metals, that 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.

In order to ensure that tap water is safe to drink, the U.S. EPA and the State Water Resources Control Board (State Water Board) prescribe regulations that limit the amount of certain contaminants in water provided by public water systems. State Water Board regulations also establish limits for contaminants in bottled water that provide the same protection for public health.

Additional information on water safety is available from the State Water Board, Division of Drinking Water (DDW) at www.waterboards.ca.gov/drinking_water/safedrinkingwaterplan.

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 U.S. EPA's Safe Drinking Water Hotline 1(800) 426-4791.

Primary drinking water standards set maximum contaminant levels (MCL) and maximum residual disinfectant levels (MRDL) for substances that affect health, along with monitoring and reporting requirements for these substances and water treatment requirements. Secondary standards protect the odor, taste, and appearance of drinking water. Secondary standards do not have public health goals (PHG) because they are not based on health concerns.

How We Monitor Water Quality

Monitoring for Contaminants

DSRSD employees collect representative samples from numerous locations throughout the water distribution system. These samples undergo analysis in the District's laboratory, which is certified by the State Water Board DDW Environmental Laboratory Accreditation Program. Zone 7 monitors source water quality continuously online and through collecting samples for laboratory analysis. In all, DSRSD and Zone 7 test for more than 178 water quality parameters.

Treatment and Disinfection

Zone 7 disinfects and removes pollutants from surface water using a multi-barrier approach, and groundwater is chloraminated (chlorine and ammonia) to maintain a disinfectant residual in the distribution system. After receiving treated water from Zone 7, DSRSD maintains a consistent residual level of disinfectant in its distribution system and flushes pipelines to prevent bacterial growth.

Source Water Assessment

Zone 7 draws from a diverse portfolio of drinking water sources, including local and imported surface water as well as groundwater from wells. The agency carefully monitors all these sources to ensure their continued quality and to protect the safety of our water supply.

A source water assessment is conducted on each groundwater well as required by the State Water Board. Sanitary surveys for surface water supplies are conducted every five years. The latest sanitary survey for the California Delta and the State Water Project was conducted in 2022. Access to the sanitary survey can be found at www.zone7water.com/post/source-water-assessment-reports.

Protecting our source water is an important part of providing safe drinking water to the public that meets the stringent Zone 7 water quality goals. By monitoring for potential contaminants, the agency can proactively address threats to water quality. For example, groundwater sources can be vulnerable to releases from chemical/petroleum pipelines, leaking tanks, groundwater contamination plumes, septic tanks, and wastewater collection systems. Surface water can become contaminated as it travels through the Sacramento and San Joaquin watersheds and the Delta. After leaving the Delta, water is transported to Zone 7 via the South Bay Aqueduct. The aqueduct water quality can become polluted from local cattle grazing, wildfires, wildlife activities, and recreational activities in the watersheds of the Bethany and Del Valle reservoirs. In order to deliver high-quality water, Zone 7 proactively participates in activities to improve water supply reliability and the water quality of the South Bay Aqueduct.

Copies of any public outreach materials, source water assessment reports or sanitary surveys are available by calling Pony Yim, Zone 7 Water Quality Chemist, at (925) 454-5791.

2023 Water Quality Test Results

The tables on pages 7 and 8 show the average level and range of each contaminant detected in the DSRSD water supply in 2023. All water supplied to customers during 2023 met the regulatory standards set by the state and federal governments. Additional unregulated parameters, such as sodium and water hardness, are included in the tables to assist customers in making health or economic decisions.

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. 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.

Minimizing Exposure to Lead

Lead was not detected above the regulatory action level in the DSRSD water supply in the 2022 sampling event. 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. DSRSD 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 at www.epa.gov/lead.

Every three years, DSRSD is required to test the indoor tap water from a sample of homes built before 1986, when plumbing fixtures were allowed to contain lead. The District's next lead and copper sampling event will be in 2025; the last sampling event was conducted in 2022. The U.S. EPA requires that 90 percent of the samples be below the regulatory action level of 15 parts per billion. The District's results were much better than this standard. Out of the 48 homes included during the 2022 sampling event, no homes were at or above the regulatory action level. 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 www.epa.gov/lead.

Testing for Lead in Schools

In 2017, the State Water Board DDW required water systems to test for lead in schools if school districts requested to be tested. The California legislature then passed Assembly Bill 746 requiring water systems to test for lead in drinking water at all public K-12 schools by July 1, 2019. The testing involves sampling water at taps throughout the school—drinking fountains and kitchen facilities. DSRSD provides water to 20 public and 5 private K-12 schools in its service area. By the end of 2018, the District had tested all public schools and one private school (St. Raymond School was the only private school that requested lead testing). All tests were below the action level. Lead sampling information and results can be found at www.waterboards.ca.gov/drinking_water/certlic/drinkingwater/leadsamplinginschools.html.

PROTECTING OUR WATER SUPPLY IN THE AGE OF FOREVER CHEMICALS

With concern growing about the presence of “forever chemicals” known as PFAS in some water supplies, Zone 7 continues to actively monitor for PFAS in its water supplies and has been proactively addressing PFAS.

What are PFAS?

Per- and polyfluoroalkyl substances (PFAS) are a large group of manmade substances that have been extensively used since the 1940s in common consumer products designed to be waterproof, stain-resistant, or nonstick. In addition, they have been used in fire-retarding foam and various industrial processes. PFAS are contaminants of emerging concern in drinking water due to a host of health impacts and the tendency of PFAS to accumulate in groundwater. There is growing evidence that long-term exposure above specific levels to certain PFAS can lead to adverse health effects such as developmental effects to fetuses during pregnancy or breastfed infants; cancer; or liver, immunity, thyroid, and other effects. PFAS can be measured in nanograms per liter (ng/L). One ng/L is equivalent to one drop of water in 20 Olympic sized swimming pools.

PFAS Regulatory Update

The science on PFAS and impacts to the environment and public health have prompted regulatory actions in recent years.

Federal EPA Efforts

In April 2024, the U.S. EPA adopted the first national primary drinking water regulation, which established legally enforceable levels called Maximum Contaminant Levels (MCLs) for six (6) PFAS compounds. The regulation requires that water agencies complete initial monitoring for six PFAS compounds by 2027. When PFAS levels are found to exceed certain levels, the agencies have until 2029 to implement solutions to reduce PFAS. After 2029, water agencies that have PFAS in drinking water which violated one or more of the PFAS MCLs must take action to reduce levels of these PFAS in their drinking water and must provide notification to the public of the violation. See the table to the right for U.S. EPA enforceable levels:

California DDW Efforts

The State Water Board DDW is still in the process of establishing regulatory standards for PFAS chemicals in drinking water. While regulatory standards are being set, California has implemented drinking water advisory levels for four (4) PFAS compounds. See the table to the right for DDW current health-based advisory levels:



Diagram courtesy of Zone 7.

PER- AND POLYFLUOROALKYL SUBSTANCES (PFAS) FEDERAL LEVELS (ng/L)	
PER- AND POLYFLUOROALKYL SUBSTANCES (PFAS)	U.S. EPA MCL (ENFORCEABLE LEVELS) ²
Perfluorooctanoic acid (PFOA)	4 ng/L
Perfluorooctanesulfonic acid (PFOS)	4 ng/L
Perfluorohexanesulfonic acid (PFHxS)	10 ng/L
Perfluorobutanesulfonic acid (PFBS)	-
Perfluorononanoic acid (PFNA)	10 ng/L
Hexafluoropropylene oxide dimer acid (HFPO-DA, Gen X Chemicals)	10 ng/L
Mixtures containing two or more of PFHxS, PFNA, HFPO-DA and PFBS	1 (unitless) Hazard Index

PER- AND POLYFLUOROALKYL SUBSTANCES (PFAS) STATE LEVELS (ng/L)		
PER- AND POLYFLUOROALKYL SUBSTANCES (PFAS)	STATE WATER BOARD DDW (ADVISORY LEVELS) ¹	
	NOTIFICATION LEVEL	RESPONSE LEVEL
Perfluorooctanoic acid (PFOA)	5.1 ng/L	10 ng/L
Perfluorooctanesulfonic acid (PFOS)	6.5 ng/L	40 ng/L
Perfluorohexanesulfonic acid (PFHxS)	3 ng/L	20 ng/L
Perfluorobutanesulfonic acid (PFBS)	500 ng/L	5000 ng/L
Perfluorononanoic acid (PFNA)	No levels established	
Hexafluoropropylene oxide dimer acid (HFPO-DA, Gen X Chemicals)	No levels established	
Mixtures containing two or more of PFHxS, PFNA, HFPO-DA and PFBS	No levels established	

¹ When a contaminant is found at concentrations greater than its advisory level, certain notification requirements and recommendations apply.

² Although the federal limits have been finalized, water agencies will have until 2029 to comply with the enforceable levels.



Ribbon cutting ceremony at the Stoneridge PFAS treatment facility. Photo courtesy of Zone 7.

Actions Taken in Response to PFAS Detections

Zone 7 manages the water supply served to DSRSD. Zone 7 has conducted and completed a PFAS Potential Source Investigation and other PFAS studies that are available on Zone 7’s website. In addition to the studies, Zone 7 is actively monitoring for PFAS across its groundwater basin and surface water supply. In 2023, Zone 7 opened a new treatment facility at their Stoneridge well location which uses ion exchange treatment to remove PFAS. The agency is in the process of planning, designing, and building a second PFAS treatment facility at their Chain of Lakes well location. The second facility is projected to be in operation in Summer 2024. In addition, Zone 7 is currently conducting a study to determine the most effective treatment option for the Mocho wells location. A reverse osmosis (RO) membrane treatment facility already removes PFAS at these wells, but additional treatment capacity is required to meet the new PFAS standards. The study is expected to be finished by

the end of 2024, followed by design and construction phases.

Zone 7 continues to be proactive in operating its water supply systems to ensure the water supply from PFAS-affected groundwater wells remains below the response levels. These operational proactive measures include treatment at the Stoneridge Treatment Facility, blending well water and/or treatment through the Mocho Groundwater Demineralization Facility.

DSRSD is conducting testing for PFAS compounds during the EPA’s Unregulated Contaminant Monitoring Rule study in 2023-2024. The first quarter results are available in this Annual Water Quality Report.

How can you learn more about PFAS in your drinking water?

To learn more about PFAS in your water supply you can visit Zone 7’s PFAS page at www.zone7water.com/pfas-information.

JANUARY - DECEMBER 2023 WATER QUALITY DATA - CONTAMINANTS DETECTED IN TREATED WATER SUPPLY PER- AND POLYFLUOROALKYL SUBSTANCES (PFAS) GUIDANCE LEVELS, established by the State Water Board

SOURCES	PER- AND POLYFLUOROALKYL SUBSTANCES (PFAS)	RESPONSE LEVEL	NOTIFICATION LEVEL	CCRDL	SURFACE WATER		GROUNDWATER	
					AVERAGE	RANGE	AVERAGE	RANGE
§	Perfluorobutanesulfonic Acid (PFBS), ng/L	5000*	500	3	ND	NA	ND	ND - 5
§	Perfluorooctane Sulfonic Acid (PFOS), ng/L	40†	6.5	4	ND	NA	6	ND - 27
§	Perfluorooctanoic Acid (PFOA), ng/L	10†	5.1	4	ND	NA	ND	NA
§	Perfluorohexane Sulfonic Acid (PFxS), ng/L	20*	3	3	ND	NA	5	ND - 21‡
§	Perfluorohexanoic Acid (PFHxA), ng/L	NA	NA	3	ND	NA	ND	ND - 4

Abbreviations/Units: CCRDL = Consumer Confidence Report Detection Level (State Water Board established), ng/L = Nanograms per liter, NA = Not Applicable, ND = Monitored for but not detected at or above CCRDL.

* Response level for PFBS and PFHxS are based on a single sample result.

† Response level for PFOA and PFOS are based on running annual average values.

‡ A sample at the Mocho Groundwater Demineralization Plant (MGDP) exceeded the PFHxS response level due to a brief flow surge during well startup on Feb 2, 2023. Operational procedures were modified to prevent future incidents. Subsequent samples were all below the response level.

§ Various man-made sources.

TERMS USED

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

COL—Chain of Lakes

CCRD—Consumer Confidence Report Detection Level: The reporting level of a contaminant as defined by the U.S. EPA UCMR5 minimum reporting levels for 25 U.S. EPA 533 PFAS constituents.

DLR—Detection Limit for Purposes of Reporting: Established by the State Water Board, DDW.

MCL—Maximum Contaminant Level: 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.

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 are set by the U.S. EPA.

mg/L—Milligrams per liter, or parts per million (ppm)

µg/L—Micrograms per liter, or parts per billion (ppb)

µS/cm—Microsiemens per centimeter

MRL—Method Reporting Level

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: Monitored for, but not detected at or above DLR or MRL. ND or value in range column indicates more than one analysis was performed during the year.

ng/L - Nanograms per liter

NTU—Nephelometric Turbidity Units: A measurement of turbidity as determined by the ratio of the intensity of light scattered by the sample to the intensity of the incident light.

PHG—Public Health Goal: 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 EPA.

pCi/L—Picocuries per liter

RAA—Running Annual Average

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



Sources of Contaminants

The major sources of regulated contaminants are listed below and correspond to numbers in the columns labeled “Sources.”

- 1 Human and animal fecal waste
- 2 Byproduct of drinking water disinfection
- 3 Drinking water disinfectant added for treatment
- 4 Water additive that promotes strong teeth; erosion of natural deposits; discharge from fertilizer and aluminum factories
- 5 Soil runoff
- 6 Various natural and man-made sources
- 7 Erosion of natural deposits; discharge of drilling wastes; and discharge from metal refineries
- 8 Erosion of natural deposits; discharge from mines and industrial wastes.
- 9 Erosion of natural deposits and discharge from fertilizer and aluminum factories
- 10 Erosion of natural deposits; runoff from fertilizer use; and leaching from septic tanks and sewage
- 11 Erosion of natural deposits
- 12 Substances that form ions when in water; seawater influence
- 13 Runoff/leaching from natural deposits; seawater influence
- 14 Runoff/leaching from natural deposits; industrial wastes
- 15 Runoff/leaching from natural deposits
- 16 Naturally-occurring minerals
- 17 Erosion of natural deposits; internal corrosion of household water plumbing systems; discharges from industrial manufacturers
- 18 Erosion of natural deposits; internal corrosion of household water plumbing systems; leaching from wood preservatives

2023 WATER QUALITY TEST RESULTS

LEAD AND COPPER RULE						
This rule is applicable to DSRSD's direct customers only. Per DDW approval, compliance monitoring is conducted once every three years. Data from August - September 2022 monitoring is summarized below:						
SOURCES	CONTAMINANT	NO. OF SAMPLES COLLECTED	90 TH PERCENTILE LEVEL DETECTED	NUMBER OF SITES EXCEEDING AL	AL	PHG
17	Lead (µg/L)	48	5.1	None	15	0.2
18	Copper (mg/L)	48	0.59	None	1.3	0.3

UNREGULATED CONTAMINANT MONITORING RULE 4 (UCMR4)					
U.S. EPA's fourth Unregulated Contaminant Monitoring Rule (UCMR4) requires monitoring of 30 contaminants between 2018 and 2020. Unregulated contaminant monitoring helps U.S. EPA and the State Water Board to determine where certain contaminants occur and whether the contaminants need to be regulated. The detected contaminants are from 2019.					
SOURCES	UNREGULATED CONTAMINANTS (UNITS)	MCL	MRL	AVERAGE	RANGE
2	Haloacetic Acids (five) (HAA ₅) µg/L	No Standard	NA	3.2	<0.2 - 13
2	Haloacetic Acids (six) (HAA ₆) Brominated µg/L	No Standard	NA	5.6	<0.2 - 25
2	Haloacetic Acids (nine) (HAA ₉) µg/L	No Standard	NA	7.6	<0.2 - 31
14	Manganese µg/L	No Standard	0.40	0.45	NA

UNREGULATED CONTAMINANT MONITORING RULE 5 (UCMR5)					
UCMR5 which requires monitoring of 29 per- and polyfluoroalkyl substances (PFAS) and lithium was finalized in December 2021 with quarterly sample collection scheduled in 2023-2024. Contaminants were not detected in the samples for the sampling conducted in December 2023 and March 2024.					

January - December 2023 Water Quality Data, Contaminants Detected in the Water Supply

Primary and Secondary Drinking Water Standards, established by the State Water Board DDW.

See page 2 for definition of Primary and Secondary Standards.

PRIMARY DRINKING WATER STANDARDS - DSRSD DISTRIBUTION SYSTEM						
SOURCES	CONTAMINANTS (UNITS)	MCL	DLR (MRL)	PHG (MCLG), [MRDLG]		
1	E. Coli	**		(0)	Total Number of Positive Samples: 1***	
2	Total trihalomethanes (TTHMs), (µg/L)	80	1 ^Δ	NA	Highest Locational RAA: 36	Range of All Samples: 2.4 - 48
2	Haloacetic acids (five) (HAA ₅), (µg/L)	60	1 ^Δ	NA	Highest Locational RAA: 32	Range of All Samples: 1.0 - 53
3	Chloramines as Chlorine (mg/L)	MRDL = 4.0		[4]	Systemwide RAA: 2.3	Range of All Samples: 0.060 - 3.5
4	Fluoride (mg/L)	2	0.1	1	Systemwide Average: 0.8	Range of All Samples: 0.1 - 1

** Under the California Total Coliform Rule, the MCL is exceeded if there is: (a) Any E. coli positive repeat following a total coliform positive sample, (b) A total coliform positive repeat, following an E. coli positive routine sample, (c) Failure to take all required repeat samples following an E. coli positive routine sample, or (d) Failure to test for E. coli when any repeat sample tests positive for total coliform.

*** Although E. coli was detected, the water system was not in violation of the E. coli MCL.

Δ TTHMs each component DLR is 1 µg/L. HAAs each component DLR is 1 µg/L except Monochloroacetic acid that has DLR of 2 µg/L.



Lake Oroville. Photo courtesy of the California Department of Water Resources, 2024.

PRIMARY DRINKING WATER STANDARDS - TREATED WATER SUPPLY								
SOURCES	CONTAMINANTS (UNITS)	MCL	DLR (MRL)	PHG, (MCLG), [MRDLG]	SURFACE WATER		GROUNDWATER	
5	Turbidity (NTU)	TT = 1 NTU Maximum		NA	Highest Level Found = 0.1 NTU		NA	
		TT = 95% of samples ≤ 0.3 NTU		NA	% of samples ≤ 0.3 NTU = 100%		NA	
6	Total Organic Carbon	TT = Quarterly RAA Removal Ratio ≥ 1.0		NA	Lowest Quarterly RAA Ratio = 1.2		NA	
INORGANIC CHEMICALS					AVERAGE	RANGE	AVERAGE	RANGE
7	Barium (mg/L)	1	0.1	2	ND	NA	ND	ND - .26
8	Selenium (µg/L)	50	5	30	ND	NA	ND	ND - 7
9	Fluoride (mg/L)	2	0.1	1	ND	NA	ND	ND - 0.1
10	Nitrate as Nitrogen (mg/L)	10	0.4	10	ND	ND - 1.5	3	0.8 - 3.9
RADIONUCLIDES					AVERAGE	RANGE	AVERAGE	RANGE
11	Gross Alpha particle activity (pCi/L) [◇]	15	3	(0)	3	3	ND	ND - 5
11	Uranium (pCi/L)	20	1	0.43	ND	ND	ND	ND - 4

◇ Gross alpha data is from 2017 except Hopyard Well 9 that was sampled in 2022.

SECONDARY DRINKING WATER STANDARDS								
SOURCES	CONTAMINANTS (UNITS)	MCL	DLR (MRL)	PHG, (MCLG), [MRDLG]	SURFACE WATER		GROUNDWATER	
					AVERAGE	RANGE	AVERAGE	RANGE
12	Conductivity (µS/cm)	1600		--	333	137 - 645	792	270 - 1054
13	Chloride (mg/L)	500		--	35	8 - 115	85	30 - 126
14	Sulfate (mg/L)	500	0.5	--	38	16 - 75	54	15 - 97
15	Total Dissolved Solids (mg/L)	1000		--	195	75 - 368	485	157 - 718
5	Turbidity (NTU)	5	(0.05)	--	ND	ND - 0.11	ND	ND - 0.16
14	Color, Unit	15	0		ND	ND - 2.5	ND	NA
14	Manganese, µg/L	50	10		ND	ND - 22	ND	NA
5	Foaming Agents (MBAS), µg/L	500	100	--	ND	NA	ND	ND - 100
ADDITIONAL PARAMETERS — Included to assist consumers in making health or economic decisions, i.e. low sodium diet, water softening, etc.								
16	Alkalinity as calcium carbonate (mg/L)	—		—	76	37 - 114	253	82 - 368
16	Boron (µg/L)	—	100	—	82	ND - 200	625	500 - 850
16	Total Hardness as calcium carbonate (mg/L)	—		—	73	29 - 120	301	81 - 473
16	Potassium (mg/L)	—		—	2.0	1.0 - 4.4	1.9	0.7 - 2.5
16	Sodium (mg/L)	—		—	46	18 - 102	68	30 - 84
16	pH (units)	—		—	8.8	8.2 - 9.4	7.8	7.5 - 8.9
16	Silica (mg/L)	—		—	11	6.6 - 13	22	7.7 - 28

CONTAMINANTS NOT DETECTED IN ZONE 7 WATER SUPPLY

NONE of these contaminants were detected at or above the Detection Limit for Purposes of Reporting (DLR) in the Zone 7 water supply during 2023 monitoring.

PRIMARY DRINKING WATER STANDARDS			
Organic Chemicals: Volatile Organic Chemicals (VOCs)	Benzene Carbon Tetrachloride 1,2-Dichlorobenzene 1,4-Dichlorobenzene 1,1-Dichloroethane 1,2-Dichloroethane 1,1-Dichloroethylene cis-1,2-Dichloroethylene trans-1,2-Dichloroethylene	Dichloromethane 1,2-Dichloropropane 1,3-Dichloropropene Ethylbenzene Methyl-tert-butyl ether (MTBE) Monochlorobenzene Styrene 1,1,2,2-Tetrachloroethane Tetrachloroethylene	Toluene 1,2,4-Trichlorobenzene 1,1,1-Trichloroethane 1,1,2-Trichloroethane Trichloroethylene Trichlorofluoromethane 1,1,2-Trichloro-1,2,2-Trifluoroethane Vinyl Chloride Xylenes
Organic Chemicals: Synthetic Organic Chemicals (SOCs)	Alachlor Atrazine Bentazon Benzo(a)pyrene Carbofuran Chlordane 2,4-D Dalapon Dibromochloropropane (DBCP) Di(2-ethylhexyl)adipate Di(2-ethylhexyl)phthalate Dinoseb	Diquat Endothall Endrin Ethylene Dibromide (EDB) Glyphosate Heptachlor Heptachlor Epoxide Hexachlorobenzene Hexachlorocyclopentadiene Lindane Methoxychlor	Molinate Oxamyl Pentachlorophenol Picloram Polychlorinated Biphenyls Simazine Thiobencarb Toxaphene 2,3,7,8-TCDD (Dioxin) 1,2,3-Trichloropropane (TCP) 2,4,5-TP (Silvex)
Inorganic Chemicals	Aluminum Arsenic Antimony Asbestos Beryllium	Cadmium Chromium Cyanide Mercury Nickel	Nitrite (as nitrogen) Perchlorate Thallium Zinc
Radionuclides	Radium-226 Radium-228	Beta/photon emitters Tritium	Strontium-90

SECONDARY DRINKING WATER STANDARDS			
Aluminum	Copper	Iron	Methyl-tert-butylether (MTBE)
Odor-Threshold	Silver	Thiobencarb	

QUESTIONS AND ANSWERS ABOUT OUR WATER

Why does the taste of our tap water sometimes change?

Many factors can affect the taste of water. DSRSD's water is a blend of surface water and ground-water. The blend changes throughout the year and these variations can change taste and odor. Chlorine used to disinfect the water supply occasionally produces a chemical smell. Rapid algae growth in the Delta can cause an earthy or musty taste or smell. (These algae "blooms" can occur at any time but are most common from late spring through early fall.) None of the changes in taste or odor cause health concerns about water consumption.

Rotting food in the garbage disposal or bacteria in the P-trap under the drain can also cause a foul smell. To get rid of the odor, fill the sink with hot water, add an ounce of household bleach, and allow the water to drain slowly. If you have a water filter on your faucet or refrigerator, be sure to change it as often as recommended. Otherwise it becomes a breeding ground for bacteria that not only taste or smell foul but can make you sick.

Why does our water taste different than EBMUD's?

East Bay Municipal Utility District (EBMUD) gets most of its water from the Mokelumne River watershed and channels it into an aqueduct east of the Delta. The water never passes through the Delta and that's why it tastes different than DSRSD's water, which is a blend of surface water that has flowed through the Delta and groundwater extracted from local wells.

What is being done to improve water taste and address algae?

During warm months when algae blooms are more likely in the Delta, the California Department of Water Resources applies copper sulfate, and Zone 7 utilizes ozone to destroy some of the taste-and-odor-causing compounds released by algae. Ozonation improves overall water quality by destroying organic matter, reducing the formation of chlorine by-products, and treating other contaminants of emerging concern. Learn more at www.zone7water.com/post/earthymusty-taste-and-odor-water.

What do you advise about water softeners?

DSRSD discourages customers from installing salt-regenerated water softeners because they add excess amounts of salt to our wastewater, which in turn increases the salinity of recycled water used for irrigation. The salt in recycled water seeps back into our groundwater basin where it degrades the quality of our drinking water supply. Zone 7 operates a demineralization plant to remove salt from groundwater, but this is an expensive process. The more softened water that is used in DSRSD, the higher the costs for all customers.

If having soft water is important to you, please consider using an exchange tank service. An exchange tank service company will install portable water softening tanks at your home and replace them on a regular schedule. The company disposes of the brine in the tanks under controlled conditions so it never enters DSRSD's wastewater, recycled water, or groundwater basin. Learn more at www.dsrdsd.com/your-account/water-quality/water-softeners.

How hard is our water?

Naturally occurring calcium and magnesium cause water to be "hard." We measure hardness by the amount of calcium carbonate in the water, expressed either as milligrams per liter (mg/L) or grains per gallon (gpg). Our water in 2023 was soft to very hard, in the range of 28-199 mg/L or 1.6-11.6 gpg. Because our water is a variable blend of surface and groundwater, hardness changes throughout the year and by location in DSRSD. Visit www.zone7water.com/post/questions-about-hard-water.



Does our tap water contain fluoride?

Yes. Fluoride occurs naturally and is added to promote strong teeth. Voters in DSRSD's service area approved fluoridation in 1974, and treatment began in 1977. DSRSD complies with the optimal level of 0.7 milligrams of fluoride per liter of water (mg/L) and control range of 0.6 to 1.2 mg/L, as required by federal and state regulations. Information about fluoridation, oral health, and current issues is available from www.waterboards.ca.gov/drinking_water/certlic/drinkingwater/Fluoridation.html.



What is being done to improve water hardness?

Zone 7 has a demineralization plant to slow down the buildup of salts and minerals in our groundwater basin and reduce the hardness of groundwater pumped from the Mocho Well Field in western Pleasanton.

Contact Us

We encourage public interest and participation in District decisions affecting water service and other District business. Board meetings occur on the first and third Tuesday of every month at 6 p.m. at our district office:

DSRSD Boardroom
7051 Dublin Blvd.
Dublin, CA

The public is welcome. For agendas, minutes, and video recordings of past meetings, visit the District website.

District website:

www.dsrdsd.com

Technical information regarding water quality:

Kristy Fournier
Laboratory and Environmental
Compliance Manager
(925) 875-2322
fournier@dsrdsd.com

General information:

Erin Steffen
Public Affairs Program Administrator
/ Public Information Officer
(925) 875-2295
steffen@dsrdsd.com

Service or bill inquiries:

Customer Service
(925) 828-8524
customerservice@dsrdsd.com

Water conservation:

(925) 875-2245
www.dsrdsd.com/outreach/water-conservation

Board of Directors:

Ann Marie Johnson, President
Arun Goel, Vice President
Richard Halket, Director
Georgian Vonheeder-Leopold,
Director
Dinesh Govindarao, Director
board@dsrdsd.com



Photo courtesy of California Department of Water Resources, 2023.

The Del Valle Reservoir south of Livermore stores local rain runoff and is part of the Tri-Valley's surface water supply.

Service Area

A public agency founded in 1953, DSRSD distributes water, recycles water, and collects, treats, and disposes of wastewater for 196,000 people in Dublin, Pleasanton, and the southern and Dougherty Valley portions of San Ramon.

