Dublin San Ramon Services District
Water, wastewater, recycled water

This report contains important information about your drinking water. Translate it, or speak with someone who understands it.

Este informe contiene información muy importante sobre su agua potable. Tradúzcalo o hable con alguien que lo entienda bien.

此份有關你的食水報告, 內有重要資料和訊息, 請找他人為你翻譯及解釋清楚.

2022 ANNUAL WATER QUALITY REPORT

A MESSAGE FROM THE GENERAL MANAGER

The Dublin San Ramon Services District is pleased to present the calendar year 2022 Annual Water Quality Report to provide our customers with important information about their drinking water. The District purchases all of its potable water from Tri-Valley wholesaler Zone 7 Water Agency. DSRSD's trained staff work to deliver reliable, high-quality water service and are on-call 24/7/365. The results of the water quality monitoring performed by Zone 7 and DSRSD confirm water delivered to customers met—and in most cases exceeded—all state and federal standards in 2022. This is the essence of what water agencies do.

Conservation as a way of life

After three years of severe drought, the District is optimistic following a rainy season that alleviated dry conditions. As this drought eases, we look to our customers to practice water conservation as a way of life in California. DSRSD customers are eligible to apply for water-saving rebates through Zone 7 at www.dsrsd.com/rebates.

Ensuring a reliable water supply

The District continues to partner with Zone 7 on a diverse regional water portfolio to ensure water supply reliability. Collaborating with other Tri-Valley water retailers, DSRSD is working to address collective water needs now and for the future. Learn more about the Tri-Valley's water supply challenges and solutions at www.trivalleywater.org.

Dan McIntyre
General Manager

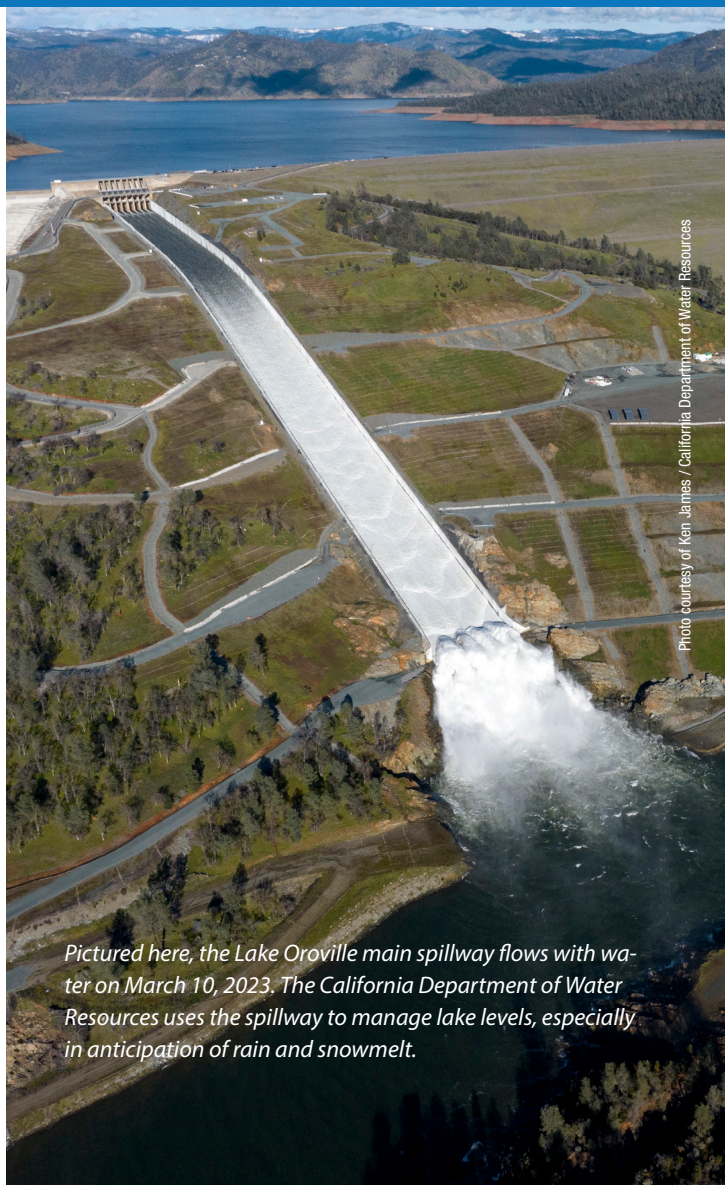

Photo courtesy of Ken James / California Department of Water Resources

Pictured here, the Lake Oroville main spillway flows with water on March 10, 2023. The California Department of Water Resources uses the spillway to manage lake levels, especially in anticipation of rain and snowmelt.

Sources of Our Potable Water

DSRSD purchases all of its potable (drinking) water from Zone 7. This water comes from three sources: About 67% is imported surface water from the California State Water Project and local rain runoff stored in Del Valle Reservoir, and about 33% is 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.

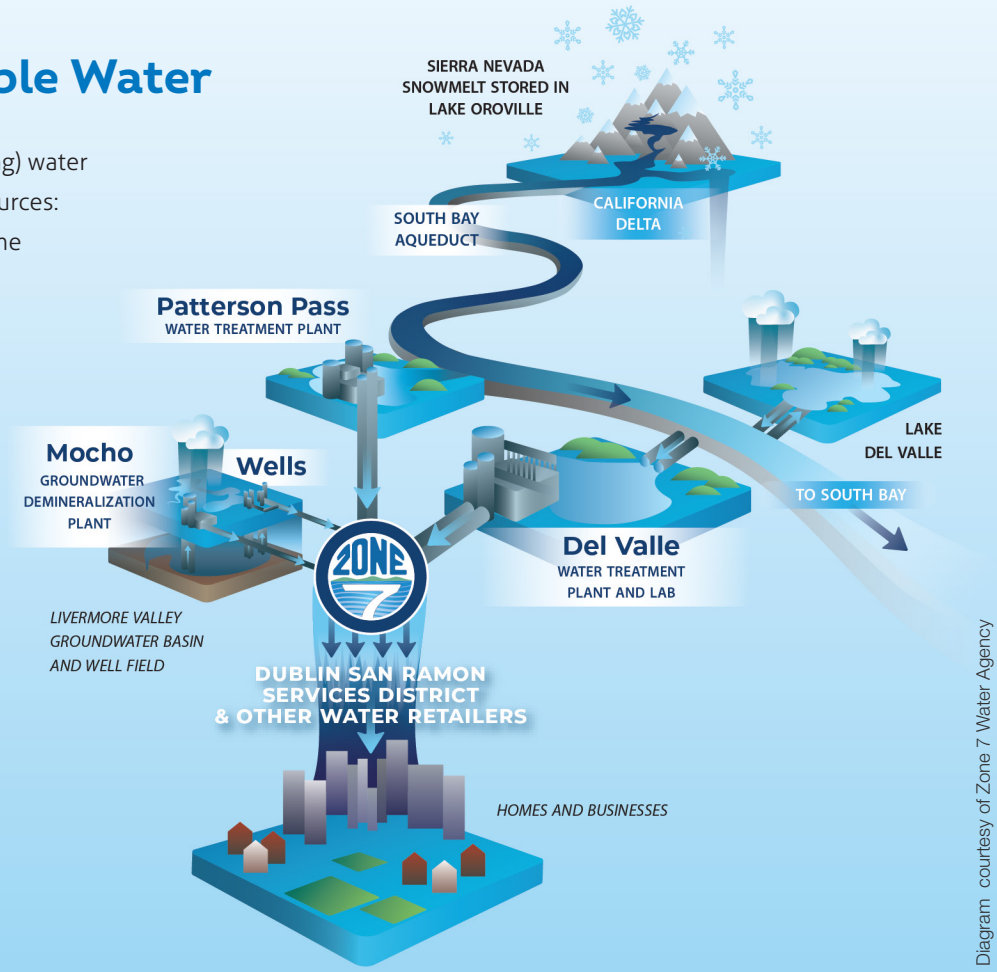

Diagram courtesy of Zone 7 Water Agency

SAFETY 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 sewage 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. Environmental Protection Agency (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 Resources Control Board, Division of Drinking Water 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 California State Water Resources Control Board Division of Drinking Water (DDW) Environmental Laboratory Accreditation Program. Zone 7 Water Agency monitors water quality continuously online, as well as with instantaneous or "grab" samples. In all, DSRSD and Zone 7 test for more than 100 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 Water Agency 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 California State Water Resources Control 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/sites/main/files/file-attachments/2021_swp_wss_final_june_2022_0.pdf?1680544783.

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 at (925) 454-5791.

2022 Water Quality Test Results

The tables on pages 6 and 7 show the average level and range of each contaminant detected in the DSRSD water supply in 2022. All water supplied to customers during 2022 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 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 California State Water Resources Control Board, Division of Drinking Water 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.

ENSURING A SAFE 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 unregulated 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 Regulatory Update

Over several years, the science on PFAS and their impacts on the environment and public health have prompted regulatory actions.

Currently, no regulatory standards have been put in place for PFAS. There is a federal process to set regulatory standards by the U.S. Environmental Protection Agency (EPA) and state process to set regulatory standards by the California State Water Resources Control Board Division of Drinking Water (DDW). The Federal Environmental Protection Agency (EPA) and California State Water Resource Control Board Division of Drinking Water (DDW) are in the process of establishing regulatory standards for PFAS chemicals in drinking water.

Federal EPA Efforts

In March 2023, the EPA published their proposed national primary drinking water regulation to establish legally enforceable levels called Maximum Contaminant Levels (MCLs) for six PFAS compounds. These MCLs have not been finalized nor adopted and are not enforceable at this time.

California DDW Efforts

While regulatory standards are being set, California has implemented drinking water advisory levels for four PFAS compounds including Perfluorooctane sulfonic acid (PFOS), Perfluorooctanoic acid (PFOA), Perfluorobutane sulfonic acid (PFBS), and Perfluorohexane sulfonate (PFHxS). See the following table for DDW current health-based advisory levels:

State Health Based Advisory Levels (ng/L)*

PFAS	Notification Level	Response Level
Perfluorooctanesulfonic acid (PFOS)	6.5	40
Perfluorooctanoic acid (PFOA)	5.1	10
Perfluorobutanesulfonic acid (PFBS)	500	5,000

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

Actions Taken in Response to PFAS Detections

Zone 7 Water Agency manages the water supply served to Dublin San Ramon Services District. Zone 7 has conducted and completed a PFAS Potential Source Investigation and a PFAS mobilization modeling study available on Zone 7 Water Agency's website. In addition to the studies, Zone 7 is actively monitoring for PFAS across its groundwater basin and surface water supply and is in the process of planning, designing, and building PFAS treatment facilities at two groundwater locations. Zone 7 continues to be proactive in operating their water supply systems to ensure the water supply from PFAS-affected groundwater wells remains below the Response Level. These operational changes include blending well water and/or treatment through the Mocho Groundwater Demineralization Facility.

DSRSD plans on conducting testing for PFAS compounds during the Environmental Protection Agency's Unregulated Contaminant Monitoring Rule study in 2023-2025. Results will be available in the Annual Water Quality Report of the testing year.

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 2022 WATER QUALITY DATA - CONTAMINANTS DETECTED IN TREATED WATER SUPPLY
Per- and Polyfluoroalkyl Substances (PFAS) DRINKING WATER STANDARDS, 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	4	ND	NA	5	ND - 7
**	Perfluoroctane Sulfonic Acid (PFOS), ng/L	40	6.5	4	ND	NA	20	ND - 32
**	Perfluoroctanoic Acid (PFOA), ng/L	10	5.1	4	ND	NA	ND	ND - 4
**	Perfluorohexane Sulfonic Acid (PFxS), ng/L	NA	NA	4	ND	NA	19	ND - 28
**	Perfluorohexanoic Acid (PFHxA), ng/L	NA	NA	4	ND	NA	4	ND - 5

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
** Various natural and man-made sources

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 2022 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

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

(SOCs continued)

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
Cyanide
Iron
Mercury
Nickel
Nitrite (as nitrogen)
Perchlorate
Thallium
Zinc

RADIONUCLIDES

Radium-226, Radium-228
Beta/photon emitters
Tritium, Strontium-90

Secondary Drinking Water Standards

Aluminum
Color
Copper
Foaming Agents (MBAS)
Manganese
Methyl-tert-butylether (MTBE)
Odor-Threshold
Silver
Thiobencarb

2022 WATER QUALITY TEST RESULTS

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

DLR–Detection Limit for Purposes of Reporting: Established by the State Water Resources Control Board, Division of Drinking Water.

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. Environmental Protection Agency (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–Minimum 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.

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

LEAD AND COPPER RULE

This rule is applicable to DSRSD's direct customers only. Per Division of Drinking Water approval, compliance monitoring is conducted once every three years.
Data from August - September 2022 monitoring is summarized below:

Sources	Contaminant	No. of Samples Collected	90th Percentile Level Detected	Number of Sites Exceeding AL	Action Level (AL)	PHG
16	Lead (µg/L)	48	5.1	None	15	0.2
17	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 Resources Control Board to determine where certain contaminants occur and whether the contaminants need to be regulated.

Sources	Unregulated Contaminants (units)	MCL	MRL	Average	Range
1	Haloacetic Acids (five) (HAA_5) µg/L	No Standard	NA	3.2	<0.2 - 13
1	Haloacetic Acids (six) (HAA_6) Brominated µg/L	No Standard	NA	5.6	<0.2 - 25
1	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

January - December 2022 Water Quality Data, Contaminants Detected in the Water Supply

Primary and Secondary Drinking Water Standards, Established by the State Water Board (SWRCB), Division of Drinking Water (DDW)

DSRSD DISTRIBUTION SYSTEM						
Sources	**Contaminants (units)**	**MCL**	**DLR (MRL)**	**PHG (MCLG) [MRDLG]**		
					Highest Locational Running Annual Average	**Range of All Samples**
1	Total trihalomethanes (TTHMs), (µg/L)	80	1*	NA	14	ND - 28
1	Haloacetic acids (five) (HAA_5), (µg/L)	60	1*	NA	4	ND - 9.0
2	Chloramines as Chlorine (mg/L)	Maximum Residual Disinfectant Level = 4.0		[4]	**System wide Running Annual Average:** 2.0	0.080 - 3.4
3	Fluoride (mg/L)	2.0	0.1	1	**System wide Average:** 0.73	0.46 - 1.0

* 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.

WATER SUPPLY SOURCES								
Sources	**Contaminants (units)**	**PRIMARY DRINKING WATER STANDARDS**			**Surface Water**		**Groundwater**	
		MCL	**DLR (MRL)**	**PHG, (MCLG), [MRDLG]**				
4	Turbidity (NTU)	TT = 1 NTU Maximum		NA	Highest Level Found = 0.2 NTU		NA	
		TT = 95% of samples ≤ 0.3 NTU		NA	% of samples ≤ 0.3 NTU = 100		NA	
5	Total Organic Carbon	TT = Quarterly RAA Removal Ratio ≥ 1.0		NA	Lowest Quarterly RAA Ratio = 1.0		NA	
	Inorganic Chemicals				**Avg.**	**Range**	**Avg.**	**Range**
6	Barium (µg/L)	1000	100	2000	ND	ND	133	ND - 299
7	Selenium (µg/L)	50	5	30	ND	ND	ND	ND - 6
8	Fluoride (mg/L)	2	0.1	1	ND	ND - 01	ND	ND - 0.2
9	Nitrate as Nitrogen (mg/L)	10	0.4	10	ND	ND - 0.8	3	2-4
	Radionuclides							
10	Gross Alpha particle activity (pCi/L)**	15	3	(0)	3	3	5	NA
10	Uranium (pCi/L)	20	1	0.43	ND	ND	1	ND - 4
	SECONDARY DRINKING WATER STANDARDS, established by State Water Board							
11	Conductivity (µS/cm)	1600		--	571	495 - 673	965	705 - 1090
12	Chloride (mg/L)	500		--	91	57-132	101	66 - 132
13	Sulfate (mg/L)	500	0.5	--	50	38 - 59	65	37 - 92
14	Total Dissolved Solids (mg/L)	1000		--	314	263 - 371	584	436 - 680
4	Turbidity (NTU)	5	(0.05)	--	ND	ND - 0.1	ND	ND - 0.2
	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)	—		—	87	59 - 109	303	231 - 361
16	Boron (µg/L)	—	100	—	164	100 - 210	709	340 - 1100
16	Total Hardness as calcium carbonate (mg/L)	—		—	107	89 - 128	363	288 - 460
16	Potassium (mg/L)	—		—	3.2	2.5 - 4.3	2.1	1.6 - 2.6
16	Sodium (mg/L)	—		—	79	59 - 106	74	35 - 105
16	pH (units)	—		—	8.5	8.1 - 8.7	7.5	7.4 - 7.7
16	Silica (mg/L)	—		—	8.2	4.7 - 14	27	24 - 30

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

Does our tap water contain fluoride?

Yes. Fluoride occurs naturally and is added to promote strong teeth. Voters in the District's service area approved fluoridation in 1974, and treatment began in 1977. The District 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.

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 groundwater. 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 these changes in taste or odor affect the safety of the water.

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 Department of Water Resources (DWR) 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?

The District 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 the District, 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

Zone 7's upgraded its Patterson Pass Water Treatment Plant with ozonation.

Photos courtesy of Zone 7 Water Agency.

them on a regular schedule. The company disposes of the brine in the tanks under controlled conditions so it never enters the District's wastewater, recycled water, or groundwater basin.

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 is generally moderately hard to very hard, in the range of 137 - 374 mg/L or 8.0 - 21.9 gpg. Because our water is a variable blend of surface and groundwater, hardness changes throughout the year and by location in the District. Visit www.zone7water.com/post/questions-about-hard-water.

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.

WATER CONSERVATION: A WAY OF LIFE IN CALIFORNIA

Did you know the average US household uses approximately 400 gallons of water per day or 100 gallons per person per day? Luckily, there are many low-cost and no-cost ways to conserve water. Small changes can make a big difference.

- Take shorter showers—a 5-minute shower uses 4 to 5 gallons of water compared to up to 50 gallons for a bath.
- Shut off water while brushing teeth, washing hair, and shaving to save up to 500 gallons a month.
- Use a water-efficient shower head. They are inexpensive, easy to install, and can save up to 750 gallons a month.
- Run clothes washers and dishwashers only when full. This saves up to 1,000 gallons a month.
- Fix leaking toilets and faucets. Faucet washers are inexpensive and take only a few minutes to replace. To check your toilet for a leak, place a few drops of food coloring in the tank and wait. If it seeps into the toilet bowl without flushing, you have a leak. Fixing it or replacing it with a new, more efficient model can save up to 1,000 gallons a month.
- Adjust sprinklers so only your lawn is watered—not sidewalks or driveways. Irrigate during the cooler parts of the day to reduce evaporation.
- Teach kids about water conservation to help future generations use water wisely. Make it a family effort to reduce next month's water bill.

Visit www.epa.gov/watersense for more information and DSRSD's webpage on fixing leaks at www.dsrsd.com/outreach/water-conservation/fixing-leaks.

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.

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www.dsrsd.com

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Photo courtesy of California Department of Water Resources, 2019.

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, southern San Ramon, Dougherty Valley, and Pleasanton.