

City of Escondido

Water Quality Report

Reporting for Calendar Year 2020

Escondido's drinking water meets or exceeds all state and federal health standards for water quality.



Electronic copies of this report are available for review in English and in Spanish on the City of Escondido's website at:

www.escondido.org/water-quality-reports.aspx

You may obtain a printed version of this report in English or in Spanish at the Utility Billing counter in Escondido City Hall. If you would like a printed version of either report mailed to your home, you can request a copy by calling 760-839-4662 or by sending an email to: water@Escondido.org



What is this report about?

The City of Escondido Utilities Department is pleased to present its annual Water Quality Report for calendar year 2020. The Water Division routinely monitors and tests our water supplies for the entire range of elements that have the potential to degrade the quality of your drinking water. As this report explains, Escondido meets or exceeds all State and Federal regulations for its water supplies, and provides its customers with drinking water of the highest quality.

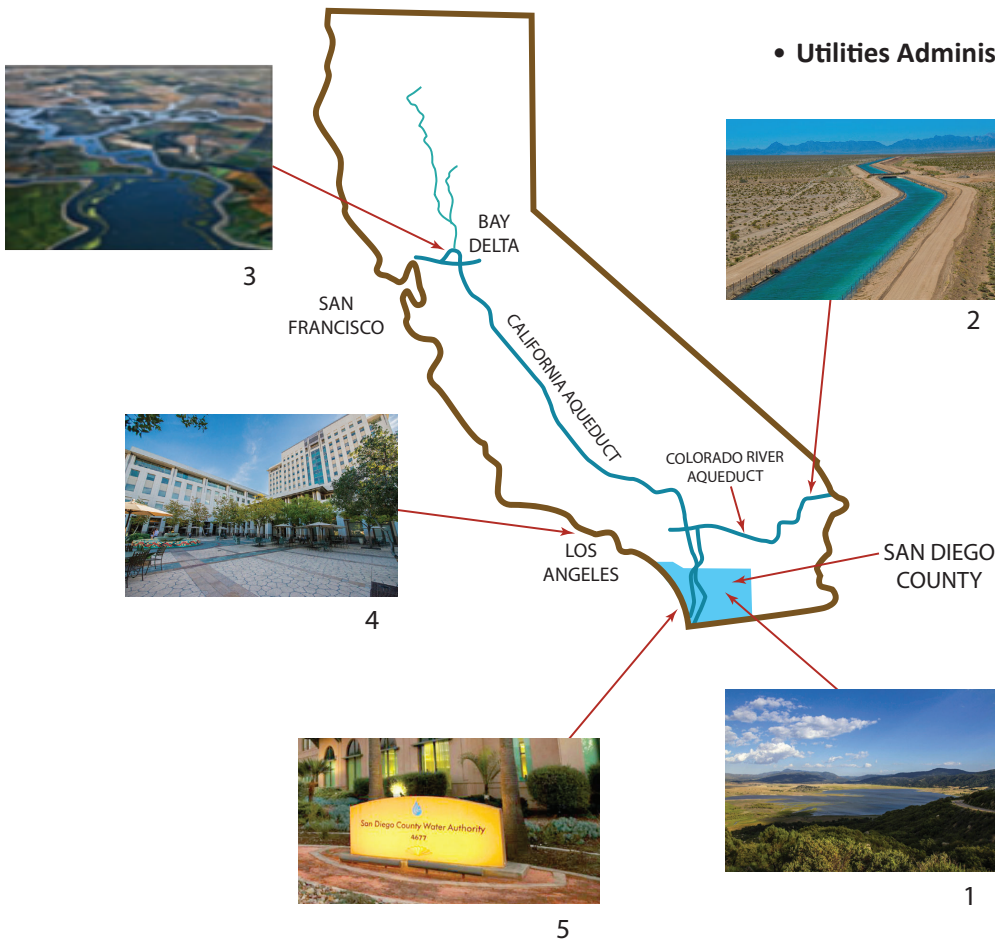
This report shows the results of our monitoring for the period of January 1, 2020 through December 31, 2020, giving our customers a snapshot of the quality of water we provided last year. Included are details about where your water comes from, what it contains, and how it compares to state standards.

If you have questions or concerns regarding the water quality data presented in this report, please contact:

- **Nicki Branch, Laboratory Superintendent:**
760-839-6290, ext. 7063

For questions regarding any other information contained in this report, please contact:

- **Utilities Administration: 760-839-4662**



Escondido Water Sources Infrastructure Map

1. **Local Water Source: Lake Henshaw**
2. **Imported Water Source: Colorado River Aqueduct**
3. **Imported Water Source: Bay Delta**
4. **Metropolitan Water District of Southern California (MWD)**
5. **San Diego County Water Authority (SDCWA)**



Where does my water come from?



The City's Water Division uses two sources for your drinking water. The first one is local water, which originates from the watershed and well fields located near Lake Henshaw. Water from Lake Henshaw is transferred to Lake Wohlford via the San Luis Rey River, and a canal originally constructed during the period 1894 to 1895.

The second water source is imported water that is purchased from the San Diego County Water Authority (SDCWA). This is "surface water" from the Colorado River Basin, and lakes and rivers in Northern California. The Metropolitan Water District (MWD) imports this water to Southern California via a 242-mile-long aqueduct that carries Colorado River water from Lake Havasu, and a 444-mile-long aqueduct bringing water from the Sacramento-San Joaquin Delta. Since 2009, MWD has doubled the amount of water stored in reservoirs like Diamond Valley Lake in southwest Riverside County, and today has 13 times more water storage capacity than it did in 1980. SDCWA purchases this imported water from MWD and distributes it to water agencies throughout San Diego County, including the City of Escondido.



The raw water from these two sources is treated and disinfected at the Escondido-Vista Water Treatment Plant (WTP), jointly owned by the City of Escondido and the Vista Irrigation District, to protect you against microbial contaminants. The WTP was constructed in 1976 and has capacity to produce 75 million gallons of potable (drinking) water per day. Water treatment at the plant includes mechanical and chemical removal of impurities, followed by inactivation of pathogens (e.g. viruses, bacteria, etc.) through disinfection. The result is clear and healthful water, meeting all state and federal requirements. Drinking water is then distributed to our customers through over 400 miles of water pipeline.



To ensure that tap water is safe to drink, the U.S. Environmental Protection Agency (USEPA) and the State Water Resources Control Board (SWRCB), Division of Drinking Water, prescribe regulations that limit the amount of certain contaminants in water provided by public water systems. California Department of Public Health and U.S. Food and Drug Administration regulations also establish limits for contaminants in bottled water that provide the same protection for public health.



What were the findings of the local and imported source water assessments?

Sanitary Surveys for Imported Water Sources

As reported on the previous page, the Water Division purchases water from the San Diego County Water Authority (SDCWA), who in turn purchases a majority of its water from the Metropolitan Water District (MWD). Large water wholesalers such as MWD are required by the State Water Board to conduct an initial source water assessment, which is then updated every five years through a survey of source water quality called a watershed sanitary survey. Watershed sanitary surveys examine possible sources of drinking water contamination, including stormwater runoff, recreational activities, wastewater discharges, wildlife, fires, and other watershed-related factors that could affect water quality. The surveys then recommend actions to better protect these source waters. The most recent surveys for Metropolitan's source waters are the:

- Colorado River Watershed Sanitary Survey - 2015 Update (will be updated again in December 2021)
- State Water Project Watershed Sanitary Survey – 2016 Update (will be updated again in June 2022)

Treatment to remove specific contaminants can be more expensive than measures to protect water at the source, which is why Metropolitan and other water agencies invest resources to support improved watershed protection programs.

Sanitary Survey for Local Water Source

In April 2016, the City of Escondido, together with the Vista Irrigation District (VID), prepared a sanitary survey of the local watershed. This survey assesses activities within the watershed that have the potential to influence the quality of water delivered from Lake Henshaw, Dixon Lake, and Lake Wohlford. While the survey identifies a number of activities that have the potential to adversely affect water quality, including residential septic facilities, highway run-off, and agricultural and recreational activities, no contaminants from these activities were detected in the local water supply in 2016. This survey is due to be updated in 2021. A copy of the 2016 Watershed Sanitary Survey, which contains a Source Water Assessment Program, is available for review on the City's website via the following link:

[www.escondido.org/Data/Sites/1/media/PDFs/Utilities/Water_Sanitary_Survey_Update_-_2016\).pdf](http://www.escondido.org/Data/Sites/1/media/PDFs/Utilities/Water_Sanitary_Survey_Update_-_2016).pdf)

Why is there anything in my 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.

The following contaminants may potentially be present at very low concentrations in our water sources:

- 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, 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, that are by-products of industrial processes and petroleum production, and can also come from gas stations, urban stormwater runoff, agricultural application and septic systems.
- Radioactive contaminants, which can be naturally occurring or be the result of oil and gas production and mining activities.

Should I take Precautions?

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 visiting the U.S. Environmental Protection Agency's (USEPA) website at:

www.epa.gov/ground-water-and-drinking-water

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. USEPA/Centers for Disease Control (CDC) guidelines on appropriate means to lessen the risk of infection by *Cryptosporidium* and other microbial contaminants are also available at USEPA's website:

www.epa.gov/ground-water-and-drinking-water



How does Escondido Collect and Test its Waters?

At the Water Treatment Plant (WTP), the Plant Operations staff collect water samples continuously during various stages of the treatment process. Testing is performed on alkalinity and turbidity in the raw water source; during the period that the water is being treated, monitoring takes place for coagulation, settling, and for fluoride and chlorine levels. Constant adjustments are made to the treatment process based upon the results from sampling and testing performed at the WTP.

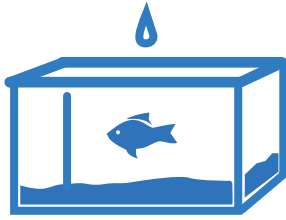
In addition, samples are collected from various points in the distribution system by both Water Distribution and Laboratory staff, and then tested at the Laboratory on a weekly basis. In 2020, over 4,056 water samples were collected from the distribution system, and 27,313 lab analyses were conducted for 164 separate water constituents.

Recently, the City of Escondido Water Quality Lab used an ambitious approach to incorporate new and more stringent quality control processes. This approach placed Escondido in a leadership role as one of only two California labs already compliant with new accreditation standards for California's 600 certified water quality testing labs.

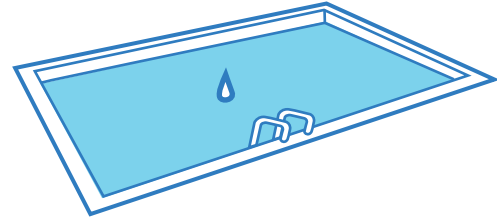
Sampling and testing Escondido's source waters, from the time they arrive at the WTP to the time that drinking water is delivered to your home, is of the utmost importance to safeguard your water supply and to ensure that the water is of the highest quality.



What do the terms in the following tables mean?



Milligrams Per Liter: mg/L
Parts per million (ppm)
One drop in a 10-gallon aquarium



Micrograms Per Liter: (µg/L)
Parts per billion (ppb)
One drop in a residential swimming pool

Colony-Forming Units (CFU)

Detection Limit for Reporting (DLR):

A detected contaminant is any contaminant detected at or above its detection level for purposes of reporting.

Disinfectants/Disinfection Byproducts Rule (D/DBPR)

Entry Point to Distribution (EPTD)

Locational Running Annual Average (LRAA):

The average of sample analytical results for samples taken at a particular monitoring location during the previous four calendar quarters.

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, set by the U.S. Environmental Protection Agency (USEPA), are not regulatory standards, not enforceable and are not required to be met by public water systems.

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.

Micromhos Per Centimeter (umho/cm):

A measure of a substance's ability to convey electricity.

PicoCuries Per Liter (pCi/L):

A measure of radioactivity.

Primary Drinking Water Standards (PDWS):

MCLs for contaminants that affect health along with their monitoring and reporting requirements, and water treatment requirements.

Public Health Goals (PHG):

The level of a contaminant in drinking water below which there is no known or expected risk to health. PHGs, set by the California Environmental Protection Agency, are not regulatory standards, not enforceable and are not required to be met by public water systems.

Not Applicable (N/A)

Nephelometric Turbidity Units (NTU):

Turbidity is a measure of the cloudiness of the water. It is a good indicator of the effectiveness of the water treatment process and distribution system.

Regulatory Action Level (AL) / Notification Level (NL):

The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.

Running Annual Average (RAA)

Treatment Technique (TT):

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

Unregulated Contaminant Monitoring Rules 4 (UCMR4)

Water Treatment Plant (WTP)

2020 Water Quality Data Tables

The following tables list all of the regulated drinking water contaminants that were detected during the calendar year of this report. The presence of “contaminants” in the water does not necessarily indicate that the water poses a health risk. Unless otherwise noted, the data presented in these tables is from testing performed in the calendar year of the report. The EPA and the State require that monitoring for certain contaminants be performed less than once per year because the concentrations of these contaminants do not change frequently.

PARAMETER (a)	Units	State MCL	PHG	Range	Average	DLR	Violation	Typical Source/Comments
			(MCLG)					
Clarity (Turbidity) (b, c)								
Turbidity of Combined Filter Effluent in WTP (at 4 hour intervals)	NTU	TT = 1	N/A	0.03 - 0.11	0.05	-	No	Soil runoff.
	%	95%(<0.3)		Highest NTU = 0.11	%(<0.3NTU) = 100 %			
Turbidity in the Distribution System	NTU	5	N/A	0.05 - 0.25	0.07	-	No	Sediment in distribution system.
				Highest NTU = 0.25				
Microbiological Contaminants (d, e)								
Total Coliform Bacteria (Monthly) in the Distribution System	%	5	0	0.00 - 3.21	0.36	-	No	Naturally present in the environment.
				Monthly Highest = 3.21 %				
E.coli (Monthly Positive Number) in the Distribution System	Count	TT	0	0 - 0	0	-	No	Human and animal fecal waste.
				Total Positive Number = 0				
Heterotrophic Plate Count Bacteria in the Distribution System	CFU/mL %	500 95%(<500)	N/A	< 1 - 63	< 1	-	No	Naturally present in the environment.
				% (<500 CFU/ml) = 100 %				
Heterotrophic Plate Count Bacteria in EPTD	CFU/mL	TT = 500	N/A	< 1 - < 1	< 1	-	No	Naturally present in the environment.
PARAMETER	Units	State MCL	PHG	Range	Average	DLR	Violation	Typical Source/Comments
		MCL [MRDL]	(MCLG) [MRDLG]					
Disinfectants / Disinfection Byproducts in the Distribution System								
Total Trihalomethanes (TTHMs) Locational RAA (LRAA) Highest Locational RAA	µg/L	80	N/A	23 - 60	37	1	No	Byproducts of drinking water chlorination. Sampled quarterly in distribution system. (Stage 2 D/DBPR) (f)
				34 - 54	44			
				N/A	54			
Haloacetic Acids (HAA5) Locational RAA (LRAA) Highest Locational RAA	µg/L	60	N/A	10 - 35	18	1	No	Byproducts of drinking water chlorination. Sampled quarterly in distribution system. (Stage 2 D/DBPR) (f)
				17 - 22	18			
				N/A	22			
Total Chlorine Residual (Cl2) Running Annual Average(RAA) Highest Running Annual Ave.	mg/L	[4.0]	[4.0]	0.8 - 3.4	2.6	-	No	Addition of chlorine and ammonia as a combined disinfectant, chloramine. Calculated quarterly with monthly average values.
				2.58 - 2.63	2.60			
				N/A	2.63			
Chlorite (ClO2-) Monthly Average	mg/L	1	0.05	0.05 - 0.40	0.23	0.02	No	Byproducts of drinking water chlorination. Monitored during pre-chlorination with chlorine dioxide.
				1.09 - 0.40	0.23			
Chlorate (ClO3-) Monthly Average	µg/L	(NL=800)	N/A	100 - 470	340	20	No	Byproducts of drinking water chlorination. Monitored during pre-chlorination with chlorine dioxide.
				150 - 450	340			
PARAMETER	Units	State MCL	PHG	Range	Average	DLR	Violation	Typical Source/Comments
		MCL [MRDL]	(MCLG) [MRDLG]					
Inorganic Contaminants - Primary Standards (Finished Water)								
Barium (Ba)	mg/L	1	2	ND - 0.11	ND	0.1	No	Discharges of oil drilling wastes and from metal refineries
Fluoride (F-)	mg/L	2	1	0.59 - 0.78	0.68	0.1	No	Erosion of natural deposits. Adding fluoride helps prevent dental caries in consumers. (Control Range: 0.6 - 1.2 ppm. Optimal Level: 0.7 ppm)
Inorganic Contaminants - Secondary Standards (Finished Water)								
Color	Units	15	N/A	1 - 1	1	-	No	Decaying vegetation or other naturally occurring organic materials.
Chloride (Cl-)	mg/L	500	N/A	78 - 130	98	-	No	Runoff / leaching from natural deposits. Seawater influence.
Corrosivity	SI	Non- corrosive	N/A	-0.06-0.44	0.28	-	No	Natural or industrial-influenced balance of hydrogen, carbon, and oxygen in the water. Affected by temperature and other factors.
Foaming Agents (MBAS)	µg/L	500	N/A	ND - 64	ND	(50)	No	Municipal and industrial waste discharges. (There is no State DLR, but analyzed laboratory DLR = 50 µg/L)
Specific conductance	umho/cm	1600	N/A	612 - 1042	787	-	No	Substances that form ions when in water. Seawater influences.
Sulfate (SO4)2-	mg/L	500	N/A	80 - 290	165	0.5	No	Runoff / leaching from natural deposits. Industrial wastes.
Total Dissolved Solids	mg/L	1000	N/A	338 - 663	479	-	No	Runoff / leaching from natural deposits. Industrial wastes.
Turbidity	NTU	5	N/A	0.05 - 0.10	0.06	-	No	Soil runoff.
Zinc (Zn)	mg/L	5	N/A	ND - 0.09	ND	0.05	No	Runoff/Leaching from natural deposits. Industrial wastes.

PARAMETER	Units	State	PHG	Range	Average	DLR	Violation	Typical Source/Comments
		MCL	(MCLG)					
Inorganic Contaminants - Unregulated (Finished Water)								
Boron	mg/L	(NL=1)	N/A	0.11 - 0.13	0.13	0.1	No	The State is considering setting concentration limits for boron. State regulations now require monitoring, though no limit is set.
Chlorate	µg/L	(NL=800)	N/A	150 - 530	350	20	No	Byproduct of drinking water chlorination. Monitored during pre-chlorination with chlorine dioxide.
Manganese	µg/L	50	N/A	0.98 - 4.8	2.1	(0.4)	No	Leaching from natural deposits. (State DLR = 20 µg/L) UCMR4 list 1 chemical contaminants (UCMR4 DLR = 0.4 µg/L)
PARAMETER	Units	State	PHG	Range	Average	DLR	Violation	Typical Source/Comments
		MCL	(MCLG)					
Radionuclides Contaminants (Finished Water): Sampled in Year 2018								
Gross Alpha Particle Activity	pCi/L	15	0	ND - 3.12	ND	3	No	Erosion of natural deposits.
Gross Beta Particle Activity	pCi/L	50	0	ND - 6.91	ND	4	No	Decay of natural and man-made deposits.
Uranium	pCi/L	20	0.43	1.3 - 2.0	1.7	1	No	Erosion of natural deposits.
PARAMETER	Units	State AL	PHG	90th Percentile of 60 Samples	# of Sites > AL	DLR	Violation	Typical Source/Comments
Inorganic Contaminants - Copper / Lead in Residential Taps : Sampled in Year 2018 (g)								
Copper (Cu)	mg/L	1.3	0.3	0.46	0	0.05	No	Corrosion of household plumbing systems.
Lead (Pb)	µg/L	15	0.2	< 5	0	5	No	Corrosion of household plumbing systems. Erosion of natural deposits.
PARAMETER	Units	State	PHG	Range	Average	DLR	Violation	Typical Source/Comments
		MCL	(MCLG)					
Additional Analyzed (Finished Water)								
Total Alkalinity as CaCO ₃	mg/L	N/A	N/A	85 - 120	104	-	No	Erosion of natural deposits. Leaching.
Bicarbonate (HCO ₃ ⁻)	mg/L	N/A	N/A	100 - 140	125	-	No	Erosion of natural deposits. Leaching.
pH	Units	N/A	N/A	7.93 - 8.06	8.00	-	No	
Hardness as CaCO ₃	mg/L	N/A	N/A	130 - 250	193	-	No	Leaching. Hardness is mostly due to the presence of magnesium and calcium, usually naturally occurring.
Calcium (Ca)	mg/L	N/A	N/A	32 - 62	48	-	No	Erosion of natural deposits. Leaching.
Magnesium (Mg)	mg/L	N/A	N/A	13 - 23	18	-	No	Erosion of natural deposits. Leaching.
Sodium (Na)	mg/L	N/A	N/A	63 - 90	77	-	No	Leaching. Sodium refers to the salt present in the water and is generally naturally occurring.
Potassium (K)	mg/L	N/A	N/A	3.3 - 4.7	4.0	-	No	Erosion of natural deposits. Leaching.
Silica (SiO ₂)	mg/L	N/A	N/A	7.0 - 8.7	8.0	-	No	Erosion of natural deposits. Leaching.
Total Chlorine Residual (Cl ₂)	mg/L	[4.0]	[4.0]	2.5 - 3.5	3.0	-	No	Addition of chlorine and ammonia as a combined disinfectant, chloramine.
Total Trihalomethanes (TTHMs)	µg/L	80	N/A	23 - 47	35	1	No	Byproducts of drinking water chlorination.
Haloacetic Acids (HAA5)	µg/L	60	N/A	11 - 25	16	1	No	Byproducts of drinking water chlorination.
Chlorite (ClO ₂ ⁻)	mg/L	1	0.05	0.15 - 0.42	0.25	0.02	No	Byproducts of drinking water chlorination. Monitored during pre-chlorination with chlorine dioxide.
Total Organic Carbon (TOC)	mg/L	TT	N/A	1.5 - 3.4	2.0	0.3	No	TOC provides a medium for the formation of disinfectant by-products. These by-products include TTHMs and HAA5.

Data Table Notes

- (a) Data shown are annual averages and ranges.
- (b) This table reflects the clarity or turbidity produced at the WTP and in the distribution system.
- (c) The turbidity level of the filtered water shall be less than or equal to 0.3 NTU in 95% of the measurements taken each month and shall not exceed 1.0 NTU at any time.
- (d) total coliform MCLs: No more than 5% of the monthly samples may be total coliform positive.
- (e) The City of Escondido Water Distribution System consists of approximately 440 miles of pipelines. Tests are performed each week at various points along the system for compliance with bacteriological and physical parameters. Of concern to all customers is the bacteriological quality of the drinking water. The distribution system table indicates the number of positive samples found in the system.
- (f) Data are calculated from the average of quarterly samples.
- (g) The Federal and State standards for lead and copper are Action Levels. If the Action Levels are exceeded, treatment may be required. The data presented in the table is the 90th percentile contaminant level from all tests performed.

Fluoride

California state law requires that water utilities serving more than 10,000 customers supplement naturally occurring fluoride to improve oral health. The levels of fluoride in Escondido's treated water are maintained within a range of 0.6 – 1.2 mg/L, with an optimum level of 0.7 mg/L as required by the California Department of Public Health. More information about fluoridation and oral health is available from the California Water Boards at:

www.waterboards.ca.gov/drinking_water/certlic/drinking_water/Fluoridation.html



Lead and Copper Rule

Lead in drinking water is primarily from materials and components associated with individual customer's service lines and home plumbing. The City of Escondido is responsible for providing high quality drinking water, but cannot control the variety of materials used in plumbing components. The Lead and Copper Rule requires the collection of special samples from designated residents every three years; these tests were last performed in 2018. The data tables in this report show the levels of copper and lead found in the 60 homes of these selected customers, and are an indication of the degree of leaching within the customer-owned copper plumbing and brass faucets.

Resident samples for the Lead and Copper Rule were collected and tested again in June 2021, and will be reported in the 2021 Water Quality Report. The next Lead and Copper Rule sampling will be performed on resident water systems in 2024.

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. 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 the 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/ground-water-and-drinking-water/proposed-revisions-lead-and-copper-rule



Total Coliform Rule

All water systems are required to comply with the state Total Coliform Rule, and are also required to comply with the federal Revised Total Coliform Rule. The new federal rule maintains protection for public health by ensuring the integrity of the drinking water distribution system and monitoring for the presence of microbials (i.e., total coliform and E. coli bacteria). The U.S. EPA anticipates greater public health protection as the new rule requires water systems that are vulnerable to microbial contamination to identify and fix problems. Water systems that exceed a specified frequency of total coliform occurrences are required to conduct an assessment to determine if any sanitary defects exist. If found, these must be corrected by the water system.



Frequently Asked Questions from Our Customers

What is hard water?

Water is considered “hard” when two non-toxic minerals, calcium and magnesium, are present in water in substantial amounts. The term “hard” refers to the difficulty of getting soap to lather when used with this water. You may see the effects of hardness around your kitchen and bathrooms. Hardness is the cause for white scaling in tea kettles and on shower heads and faucets. In some instances, water-related appliances (e.g., dishwashers, water heaters, etc.) may be affected by the level of hardness. When this is the case, the manufacturer of the appliance may ask you to verify the level of hardness in your water. In 2020, hardness ranged from 8 to 15 grains per gallon (130 – 250 mg/L as CaCO₃).

Why does water sometimes taste or smell strange?

When your water tastes or smells strange, the problem might be in the water or it might not. The taste of drinking water is affected by its mineral content as well as the presence of chlorine, which is used to protect against potential bacterial contamination. Sometimes plumbing can cause a metallic flavor, especially if the water has been sitting in pipes for many hours. Taste, however, does not indicate a higher or lower degree of water quality.

Harmless algae in the water can cause musty or fishy odors, especially during the hot summer months. Even after chlorine has been added to disinfect the water, these odors may persist. In addition, many people mistakenly confuse odors from their sink drain with the smell of their tap water. The odor may actually be coming from the drain, where bacteria grow on food, soap, hair, and other things that are trapped there. Gases in the drain that smell get stirred up when water goes down the pipe. Odor can also come from bacteria growing in water heaters - usually ones that have been turned off for a while or have the thermostat set too low.

For odor, consider these questions: Does it come from only one faucet? Does it go away after running the water for a few minutes? If the answer is yes to either question, the source of the odor is probably within your plumbing system. If no to both questions, please call Water Distribution staff at 760-839-4668.

How do I test for a leak in my home?

Many times a leak is not visible on the surface, either in the yard or in the house. A quick way to test your private side plumbing for a leak is to shutoff all water sources throughout your property, and check to see if the “tattletale” indicator on your meter is spinning. If it is spinning, you may have a leak on your property.

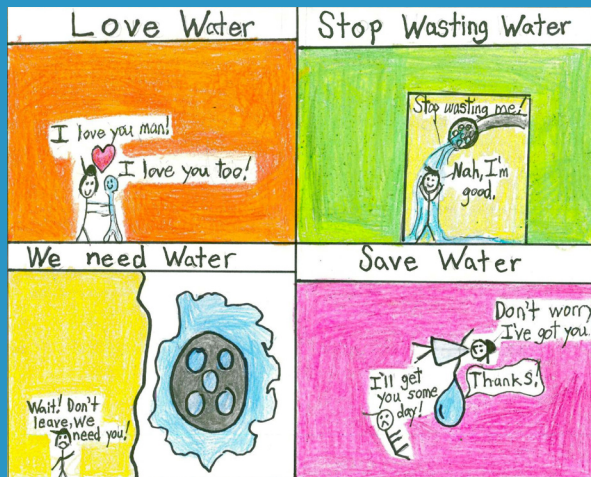
Another way to determine if you have a leak is to write down the reading on your water meter. For the next two hours, make sure that all water sources in your home remain unused (such as faucets, toilets, washing machine, and garden hoses), and turn off any “automatic” water sources (such as the icemaker and irrigation system). After the two- hour period has expired, reread your meter. If the reading on the meter has increased, you have a leak.



Why are backflow devices important?

When customers’ private pipes intersect with water system pipelines, a cross-connection is created. Without necessary protections, contamination can result from backflow, or reverse flow, due to changes in water pressure in the distribution system. A backflow device prevents the flow of potentially contaminated water from a customer’s pipelines into the water distribution system. In compliance with state law, Escondido’s Water Division requires an approved backflow device for any building that includes a fire protection sprinkler system; commercial, industrial, agricultural, and multi-family accounts; as well as properties with wells. Backflow protection may also be required on accounts considered “high risk”, such as chemical processing, medical and dental facilities, flower growers, and recreational vehicle dump stations.

Conservation—A California Way of Life



Show you love water like Taylor, one of our local students, by using it wisely:

- 💧 Turn off the water when you don't need it.
- 💧 Run only full loads of laundry and dishes.
- 💧 Stop irrigation runoff—water the plants, not the sidewalk.
- 💧 Turn off your irrigation before, during, and after rain.
- 💧 Fix irrigation leaks as soon as they're discovered.

When you see water waste or pollution, report it to 760-839-4886 or use the Report It! App. Download it at www.escondido.org/report-it

What is California Friendly Landscaping?

A California-friendly landscape can:

- 💧 Beautify your property – add color and texture for curb appeal.
- 💧 Save water – choose plants that need minimal extra water and group higher water users together.
- 💧 Reduce maintenance – use mulch to block weeds.
- 💧 Protect natural resources and the environment – plan for rain water to sink in instead of run off.

We have the resources to help:

www.watersmartsd.org has information on rebates, water-saving tips, workbooks and how-to videos. Live workshops are online for now, and cover topics including:

- 💧 Plan Ahead: Understanding Soil and Site Assessments
- 💧 Design: Shape your Space
- 💧 Plants: Inspiring Choices for our Region
- 💧 Water and Irrigation: Utilizing a Precious Resource
- 💧 Installation and Maintenance: Protecting Your Investment

You can do it!

Go from this:



To this:



Improving Escondido's Water System



Vista Verde Reservoir Replacement

The Vista Verde Reservoir Replacement Project was constructed in two phases: Phase I consisted of building a temporary water tank and upgrading the pump station; and Phase II constructed two, 1-million-gallon (MG), partially-buried, pre-stressed concrete tanks; a valve structure; an access driveway; and associated piping. Phase II also demolished the original 750,000-gallon steel tank and salvaged the temporary, bolted steel tank. This project was completed in March of 2019 for just under \$10 million. The use of dual tanks greatly improves system reliability in the Vista Verde Pressure Zone, protects water quality, and allows for taking one tank out of service for routine maintenance.



Lindley Reservoir Replacement

The two major elements of the Lindley Reservoir Tank Replacement Project are: 1) construction of two, 1.5 MG, partially buried concrete water tanks and related valves, pipelines, etc.; and 2) demolition and removal of the existing 2 MG, above ground, steel water tank. In addition to increased storage capacity (2 MG to 3 MG), two reservoir tanks will protect water quality and provide more reliable and efficient water storage, as one tank will remain in service while the other undergoes maintenance. The budget for this project is a little over \$16.3 million, and is funded by a \$15 million loan from the California Infrastructure and Economic Development Bank and \$1.3 million from the Water Enterprise Fund. Construction began on the project in August of 2020, and the tanks are anticipated to be operational by early Fall of 2022.



Lake Wohlford Dam Replacement

The magnitude of the cost of the dam replacement project and the risk that it could grow even larger led City staff to engage with the California Division of Safety of Dams (DSOD) to study alternatives for rehabilitating the existing dam. Based on the results of the study and the response from DSOD, it appears that no alternative is preferable to construction of a new dam. Rehabilitation is unlikely to cost less; will not restore lake capacity to its original volume, and will not gain quick regulatory approval. Therefore, the City is moving forward with the full dam replacement project. The cost of this project is estimated to be \$68 million, with \$14.9 million in Prop 1E grant funding having already been secured. Staff is pursuing additional project funding through the FEMA Building Resilient Infrastructure and Communities grant program, and a loan through the US EPA's Water Infrastructure Finance and Innovation Act. Construction of the project is anticipated to begin in late 2021, pending City Council approval.

Utilities Administration

201 N. Broadway
Escondido, CA 92025
760-839-4662

Hours: Monday – Friday, 8:00 a.m. – 5:00 p.m.

Utilities Water Division

Christopher W. McKinney, Director of Utilities
Reed Harlan, Deputy Director of Utilities / Water
Clay Clifford, Water Treatment Plant Superintendent
Federico Jimenez, Water Distribution Superintendent
Darren Southworth, Canal Superintendent

Escondido City Council

760-839-4638

Paul McNamara, Mayor
Michael Morasco, Deputy Mayor (District 4)
Consuelo Martinez, Council Member (District 1)
Tina Inscoe, Council Member (District 2)
Joe Garcia, Council Member (District 3)

Escondido City Manager's Office

760-839-4631

Sean McGlynn, City Manager
Christopher W. McKinney, Deputy City Manager
Joanna Axelrod, Deputy City Manager
Rob Van De Hey, Deputy City Manager

The Escondido City Council is the governing authority for the City's Water Division. Unless the City Council schedules otherwise or cancels a meeting, regular meetings are convened on the first four Wednesdays of every month at 5:00 p.m. in the City Council Chambers, 201 N. Broadway. For your convenience, City Council meetings are aired live on Cox Communications Channel 19 (Escondido ONLY) and AT&T U-verse Channel 99. The meetings are also streamed live at: www.escondido.org/meeting-broadcasts.aspx. Re-broadcasts of the meetings are aired on Sunday and Monday nights at 6:00 p.m. on Cox Channel 19 (Escondido ONLY) and AT&T U-verse Channel 99, and archived meetings are available for viewing online at the City Council link listed above.