

# Eastern Municipal Water District



## Your 2014 Water Quality

CONSUMER CONFIDENCE  
REPORT

Issued July 2015



## Why You Should Read This Report

This year's drinking water  
quality report...

- Examines how EMWD ensures your drinking water is safe, high quality, and reliable
- Provides science-based data and facts about the sources, quality, and safety of your drinking water
- Explains how customers can always choose how they wish to receive future water quality reports

## Inside this report...

### Page 4

- Regulations
- Contaminants
- Nitrate

### Page 5

- Sensitive populations
- Arsenic
- Unregulated contaminants
- Lead and copper

### Page 6

- Source water map

### Page 7-8

- The communities we serve

### Page 9

- Protecting your drinking water

### Page 10

- Facts about total coliform bacteria

### Page 11

- Abbreviations and definitions

### Page 12

- Distribution system data

### Page 13 – 15

- Water quality tables

### Back Page

- Public meeting information
- Contact information
- Drought information



Proudly Serving You for 65 Years

[www.emwd.org](http://www.emwd.org)

Eastern Municipal Water District (EMWD) wants you, our valued customer, to be confident your drinking water is safe. This annual water quality report provides important information about the source(s) of your water and the tests used to ensure your tap water is safe and healthy to drink.

## Our Continuing Commitment to You

EMWD and its trained, certified water quality professionals are committed to...

- Providing high quality, safe drinking water at the lowest price possible
- Monitoring and testing the water we serve to optimize quality and ensure it is always safe to drink
- Finding and developing new water supply sources to ensure continued reliability for our customers
- Providing educated staff to answer any questions from our customers

**Our Vision:** To provide essential services to our community at a level that exceeds the performance of any other public or private agency.

**Our Mission:** To deliver value to our customers and the communities we serve by providing safe, reliable, economical and environmentally sustainable water, wastewater and recycled water services.

### Drought Status Update!

EMWD is asking all customers to reduce outdoor watering **50 percent**.

See back page for more information!

This report contains important information about the quality of your water. If you would like to obtain this information in Spanish, visit us at [www.emwd.org](http://www.emwd.org) and select "Español" or call (951) 928-3777 ext. 4221 for a Spanish copy by mail.

Este informe contiene información importante con sobre la calidad de su agua. Si usted desea obtener información en español, visitenos en [www.emwd.org](http://www.emwd.org) y seleccione "Español" o llame (951) 928-3777, ext. 4221 para solicitar una copia por correo.



# Dear EMWD Customer,

Once again, it is my pleasure to present Eastern Municipal Water District's (EMWD) annual water quality report. I'm happy to report that EMWD continued to provide consistently high quality drinking water throughout 2014, and met or surpassed all drinking water quality standards established by the U.S. Environmental Protection Agency (EPA) and regulated by the California State Water Resources Control Board (State Board).

Protecting public health with a high quality water supply is our highest priority. EMWD achieves such high quality tap water by managing our water sources, using state-of-the-art water treatment processes, efficiently maintaining and operating our facilities, and conducting rigorous monitoring and testing of the water we serve. Water samples are collected throughout the year from EMWD's 31 drinking water sources to carefully test for 200 contaminants and impurities. In 2014, EMWD's laboratory personnel collected 6,090 water samples and performed 40,813 tests to monitor and ensure quality.

While groundwater or surface waters can have trace measurable contaminants, EMWD protects your health and safety by treating or otherwise ensuring the water we deliver meets or surpasses all regulated drinking water standards. EMWD supports science-based standards that provide health benefits to the public in an economically balanced manner.

The State Board requires that EMWD customers receive a copy of this report which summarizes the results of water quality tests and provides – among other important information such as EMWD's current drought status – specific details about sources and quality of the water



served in your community. The guidelines for distributing this report allow for electronic delivery of the report instead of a paper copy in the mail. By delivering these reports electronically, we are able to reduce costs and eliminate unwanted paper waste associated with printing and mailing the full report to our more than 142,000 accounts.

Please note that you may change your delivery preference at any time, and EMWD will gladly furnish customers with a paper copy of this report upon request through our web site at [www.emwd.org/ccr](http://www.emwd.org/ccr) or by calling us at (951) 928-3777, extension 4378.

I strongly encourage you to read this report and if you have any water quality questions, please feel free to contact Amy Mora, Senior Environmental Analyst, at (951) 928-3777, extension 6337. I also encourage you to make note of the drought status information and get the latest updates on our website at [www.emwd.org/drought](http://www.emwd.org/drought).

Thank you for being a customer of EMWD –  
we're here to serve you.

A handwritten signature in black ink that reads "Paul D. Jones II".

Paul D. Jones II, P.E.  
GENERAL MANAGER  
EASTERN MUNICIPAL WATER DISTRICT

This report contains important and useful information about the sources, quality, and safety of your drinking water and describes how EMWD meets all drinking water standards as set by the U.S. Environmental Protection Agency (EPA) and enforced by the California State Water Resources Control Board (State Board).

## About Regulations

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

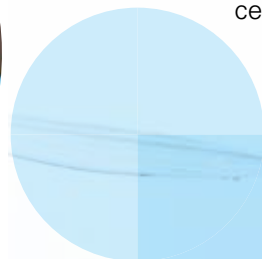
### CONTAMINANTS THAT MAY BE PRESENT IN SOURCE WATER INCLUDE:

- **Microbial contaminants**, such as viruses and bacteria, may come from sewage treatment plants, septic systems, agricultural livestock, and wildlife.
- **Inorganic contaminants**, such as salts and metals, can be naturally occurring or result from urban storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining or farming.
- **Organic chemical contaminants**, including synthetic and volatile organic chemicals may be by-products of industrial processes or petroleum production, and can also come from gas stations, urban storm water runoff, agricultural application, and septic systems.
- **Pesticides and herbicides** may come from a variety of sources such as agriculture, urban storm water runoff, and residential uses.
- **Radioactive contaminants** can be naturally-occurring or be the result of oil and gas production and mining activities.

### ABOUT NITRATE

Nitrate in drinking water at levels above 45 parts per million (ppm) is a health risk for infants of less than six months of age. Such nitrate levels in drinking water can interfere with the capacity of an infant's blood to carry oxygen, resulting in a serious illness; symptoms include shortness of breath and blueness of the skin.

Nitrate levels above 45 ppm may also affect the ability of the blood to carry oxygen in other individuals, such as pregnant women and those with certain specific enzyme deficiencies. If you are caring for an infant, or you are pregnant, you should seek advice from your health care provider.



## SENSITIVE POPULATIONS

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised individuals such as those 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 their drinking water from their health care providers. EPA and Centers for Disease Control and Prevention (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 at 1(800) 426-4791.

## ARSENIC

While your drinking water meets the federal and state standard for arsenic, some of our sources do contain low levels of arsenic. The arsenic standard balances the current understanding of arsenic's possible health effects against the costs of removing arsenic from drinking water. The EPA continues to research the health effects of low levels of arsenic, which is a mineral known to cause cancer in humans at high concentrations and is linked to other health effects such as skin damage and circulatory problems.

## UNREGULATED CONTAMINANTS

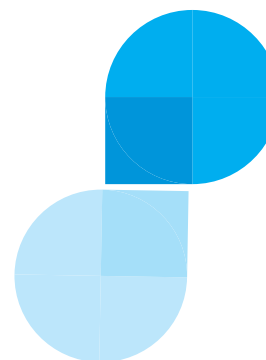
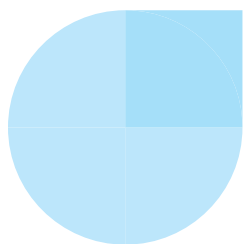
Unregulated contaminant monitoring helps EPA and the State Board determine where certain contaminants occur and whether the contaminants need to be regulated.

## LEAD AND COPPER

Lead and copper are rarely found in source waters; however both of these metals can enter drinking water by leaching from household plumbing and fixtures. Water that sits in your pipes for long periods of time may dissolve tiny amounts of lead and/or copper (parts per billion levels) into household water. The EPA has developed a rule to minimize the levels of these metals in drinking water.

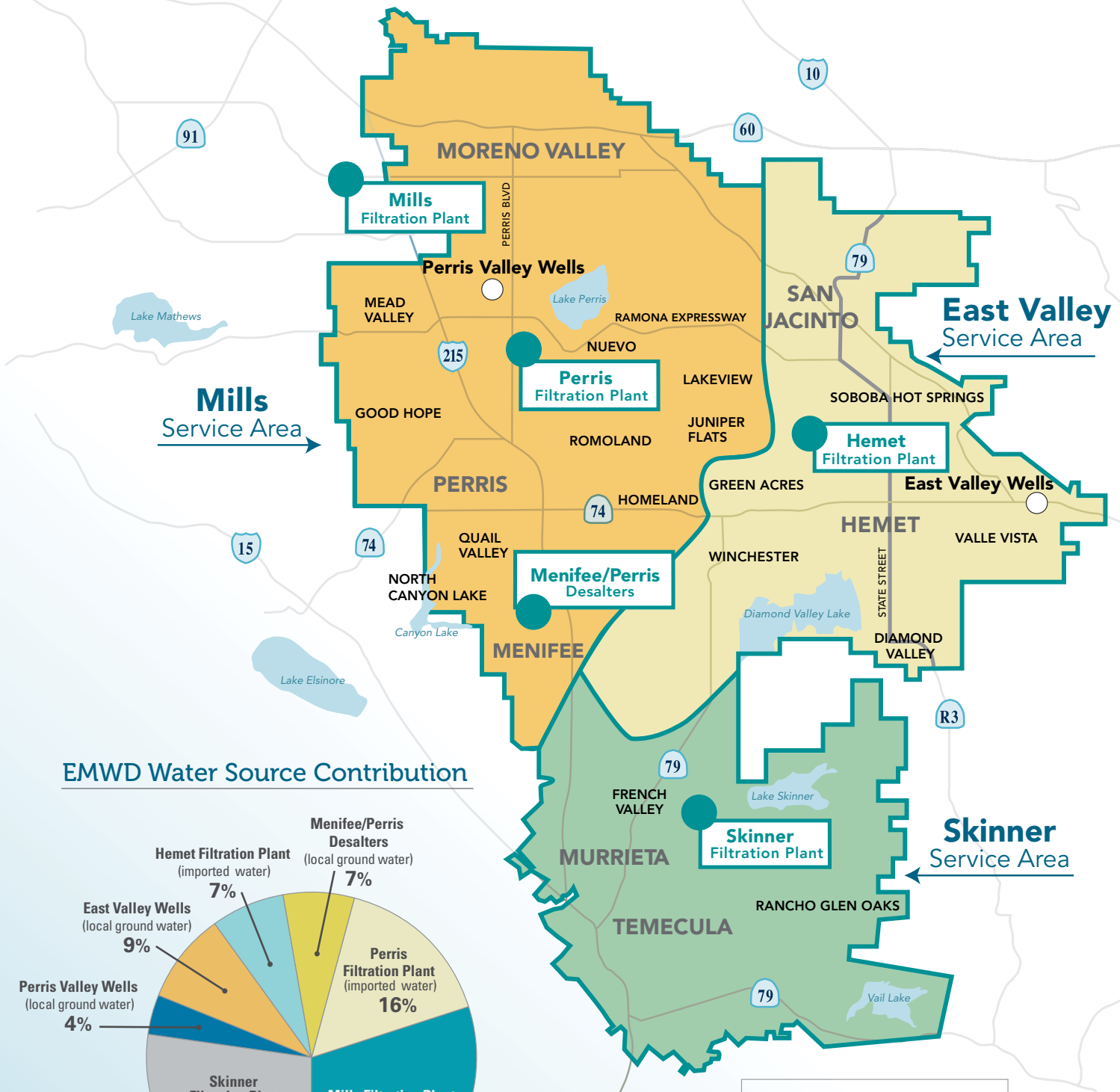
The Lead and Copper Rule was developed to protect public health by establishing an action level of 15 parts per billion (ppb) for lead and 1300 ppb for copper at the tap.

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. EMWD is responsible for providing high quality drinking water, but cannot control the variety of materials used in plumbing components. If your water has been sitting in your household plumbing 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 at 1(800) 426-4791 or at [www.epa.gov/safewater/lead](http://www.epa.gov/safewater/lead).

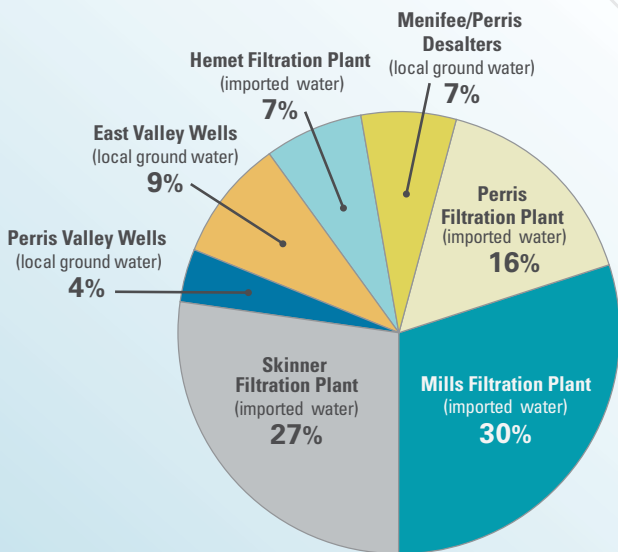


# The source of Your Tap Water

To help you find specific details about your tap water, we have organized this report according to the communities we serve.



## EMWD Water Source Contribution



Total Annual Water Usage: 30.7 Billion Gallons



## The Communities We Serve...

### MILLS service area

Water for this service area comes from a combination of sources:

- The Henry J. Mills Filtration Plant\* treats imported surface water supplied solely from northern California through the State Water Project (SWP). The Mills Filtration Plant uses chloramine for final disinfection.

Water from the Mills Filtration Plant is blended with several other EMWD water sources:

- Three Perris Valley Wells serve a limited area of Perris – along Perris Boulevard south of the Ramona Expressway.
- The Perris Water Filtration Plant (PWFP) treats both Colorado River and SWP waters. However, due to the drought, the PWFP received only SWP water January through February 19, 2014 and has been treating only Colorado River water since February 19, 2014. This plant uses the latest ultrafiltration technology to remove particulate contaminants to produce quality, potable water. The PWFP serves Lakeview, Nuevo, Romoland, Homeland, and Juniper Flats. This plant uses chloramine for final disinfection.
- The Menifee & Perris Desalters convert salty groundwater into potable water using a reverse osmosis process. Menifee, North Canyon Lake, and Quail Valley are the only communities within the Mills Service Area to receive blended water from this desalination plant. The Menifee & Perris Desalters use chloramine for final disinfection.



### COMMUNITIES SERVED:

Good Hope

Homeland

Juniper Flats

Lakeview

Mead Valley

Menifee\*\*

Moreno Valley

North Canyon Lake

Nuevo

Perris

Quail Valley

Romoland

\* The Mills and Skinner Filtration Plants are owned and operated by The Metropolitan Water District of Southern California (MWD)

\*\* Typically served by the Mills Filtration Plant and occasionally served by the Skinner Filtration Plant



## EAST VALLEY service area

This service area is split into two regions:

### WEST OF STATE STREET

- The Hemet Water Filtration Plant (HWFP) treats both Colorado River and SWP waters. Due to the drought, the HWFP received only SWP water from January through July 14, 2014 and has been treating only Colorado River water since July 14, 2014. This plant uses the latest ultrafiltration technology to remove particulate contaminants and produce quality, drinking water. This treatment plant uses chloramine for final disinfection. Local groundwater also supplies this area.

#### COMMUNITIES SERVED:

Diamond Valley	Hemet	Winchester***
Green Acres	San Jacinto	

### EAST OF STATE STREET

- A system of deep groundwater wells serves these communities. These wells are treated by adding free chlorine for final disinfection.

#### COMMUNITIES SERVED:

Hemet	San Jacinto	Soboba Hot Springs	Valle Vista
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## SKINNER service area

Water for this service area comes from:

- The Robert A. Skinner Filtration Plant\* treats water from the Colorado River and from the SWP. The Skinner Filtration Plant uses chloramine for final disinfection.

#### COMMUNITIES SERVED:

French Valley	Murrieta	Temecula
Menifee**	Rancho Glen Oaks****	Winchester***

\* The Mills and Skinner Filtration Plants are owned and operated by The Metropolitan Water District of Southern California (MWD)

\*\* Typically served by the Mills Filtration Plant and occasionally served by the Skinner Filtration Plant

\*\*\* Typically served by the Hemet Water Filtration Plant and occasionally served by the Skinner Filtration Plant

\*\*\*\* This area is served water produced by Rancho California Water District



Photo Courtesy of The Metropolitan Water District of Southern California



# Protecting Your Drinking Water

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily indicate that water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hotline at 1(800) 426-4791.

The sources of drinking water (both tap water and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs, and wells. As water travels over the surface of the land or through the ground, it dissolves naturally-occurring minerals and, in some cases, radioactive material, and can pick up substances resulting from the presence of animals or from human activity. The land that the water comes into contact with is called the watershed; everything that happens to or in the watershed can affect the quality of your drinking water supply.

EMWD uses several sources of water to serve its customers, including surface water from the Colorado River and the SWP, as well as local groundwater.

An initial assessment of all the watersheds, both surface water and groundwater, was completed in 2002. The Colorado River, a surface water source, was reassessed in 2010 and found to be most vulnerable to recreational activities, urban and storm water runoff, increasing urbanization in the watershed, and wastewater.

Water from the SWP, also a surface water source, was reassessed in 2011 and found to be most vulnerable to urban and storm water runoff, wildlife, agriculture, recreational activities, and wastewater.

An assessment of each of EMWD's wells was completed in 2013. Two sources were considered vulnerable to airports and airplane maintenance associated with a contaminant detected in the water supply. In addition, other EMWD wells were considered most vulnerable to the following due to proximity (not associated with any contaminants): commercial and industrial activities, residential activities, agriculture, and other activities such as recreation and transportation.



You can view vulnerability assessments on line at [www.waterboards.ca.gov/drinking\\_water/certlic/drinkingwater/DWSAP.shtml](http://www.waterboards.ca.gov/drinking_water/certlic/drinkingwater/DWSAP.shtml) and then click on "Summary of Assessments." You can also call (951) 928-3777, ext. 3327 for a copy of EMWD's vulnerability assessments.



Protecting the sources of drinking water helps protect our health. It's everyone's responsibility, and here are a few ways you can help:

- Eliminate excess use of lawn and garden fertilizers and pesticides – they contain hazardous chemicals that can reach your drinking water source.
- Pick up after your pets.
- Dispose of chemicals properly; take used motor oil to a recycling center.

# Facts about Total Coliform Bacteria

## Water agencies test for the presence of coliform bacteria as an indicator of drinking water quality.



Coliform bacteria are naturally present in the environment and are generally not harmful. Coliform bacteria may occur in soil, vegetation, animal waste, sewage, and surface waters.

Eastern Municipal Water District routinely tests for the presence of coliform bacteria as an indicator of the sanitary quality of drinking water. EMWD analyzed 3,067 coliform samples in 2014, four of which were total coliform positive. The maximum allowed by EPA for coliforms is no more than 5 percent in any month. The highest monthly coliform result was 1.1 percent, which complies with this standard. EMWD also tests for *E. coli* bacteria, which indicate fecal or sewage contamination. Zero samples tested positive for *E. coli* in 2014.

We are required to monitor your drinking water for specific contaminants on a regular basis. Results of regular monitoring are an indicator of whether or not your drinking water meets health standards. On May 2, 2014 in Quail Valley, we did not complete all monitoring or testing for coliform bacteria, and therefore cannot be sure of the quality of your drinking water during that time. Subsequent samples taken in Quail Valley met health standards.

A positive coliform test result does not necessarily mean a maximum contaminant level (MCL) has been exceeded, or that there is a problem in the water system. More information and general guidelines on ways to lessen the risk of infection by microbes are available from the EPA's Safe Drinking Water Hotline at 1(800) 426-4791 or at <http://water.epa.gov/drink/info/>.



One part per  
**million (ppm)**  
IS LIKE

**1 second in 11.6 days**

**1 teaspoon in  
1302 gallons**

**1 drop in  
13.6 gallons**

One part per  
**billion (ppb)**  
IS LIKE

**1 second in 31.7 years**

**1 teaspoon in  
1.3 million gallons**

**1 drop in  
13,563 gallons**

One part per  
**trillion (ppt)**  
IS LIKE

**1 second in 31,710 years**

**1 teaspoon in  
1.3 billion gallons**

**1 drop in  
13,563,368 gallons**

# Abbreviations & Definitions

## ABBREVIATIONS:

<b>AL</b>	Action Level	<b>MRL</b>	Minimum Reporting Level: set by EPA for unregulated contaminant monitoring	<b>ppt</b>	parts per trillion or nanograms per liter (ng/L)
<b>CFU/mL</b>	Colony-Forming Units per milliliter	<b>NA</b>	Not Applicable: no State or Federal standards are established	<b>RAA</b>	Running Annual Average
<b>DLR</b>	Detection Limits for purposes of Reporting: State-determined level that a test can detect the chemical	<b>ND</b>	None Detected: sample was taken and chemical was not detected	<b>TON</b>	Threshold Odor Number
<b>grains/gallon</b>	grains per gallon: a measure of water hardness. One grain/gallon equals 17.1 ppm or mg/L	<b>NL</b>	Notification Level	<b>TT</b>	Treatment Technique
<b>HPC</b>	Heterotrophic Plate Count: a bacteriological test that counts the number of bacteria per milliliter of sample	<b>NR</b>	No Range: all result(s) were the same value	<b>µS/cm</b>	microSiemen per centimeter; or micromho per centimeter (µmho/cm)
<b>LRAA</b>	Locational Running Annual Average	<b>NTU</b>	Nephelometric Turbidity Units	"—"	Samples not required
<b>MCL</b>	Maximum Contaminant Level	<b>pCi/L</b>	picoCuries per Liter	"="	Equal
<b>MCLG</b>	Maximum Contaminant Level Goal	<b>PHG</b>	Public Health Goal	">"	Greater than
<b>MRDL</b>	Maximum Residual Disinfectant Level	<b>ppb</b>	parts per billion or micrograms per liter (µg/L)	"<"	Less than
<b>MRDLG</b>	Maximum Residual Disinfectant Level Goal	<b>ppm</b>	parts per million or milligrams per liter (mg/L)	"≤"	Less than or equal to
				"#"	Number
				"%"	Percent

## DEFINITIONS:

**90<sup>th</sup> Percentile:** The value in a data set in which 90 percent of the set is less than or equal to this value.

**Disinfection By-Product:** Compounds which are formed from mixing of organic or mineral precursors in the water with ozone, chlorine or chloramine. Bromate, Total Trihalomethanes, and Haloacetic Acids are disinfection by-products.

**Locational Running Annual Average (LRAA):** The RAA at one sample location.

**Maximum Contaminant Level (MCL):** The highest level of a contaminant that is allowed in drinking water. Primary MCLs are set as close to the PHGs (or MCLGs) as is economically and technologically feasible. Secondary MCLs are set to protect the odor, taste, and appearance of drinking water.

**Maximum Contaminant Level Goal (MCLG):** The level of a contaminant in drinking water below which there is no known or expected risk to health. MCLGs are set by the EPA.

**Maximum Residual Disinfectant Level (MRDL):** The highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.

**Maximum Residual Disinfectant Level Goal (MRDLG):** The level of a disinfectant added for water treatment 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.

**Notification Level (NL):** Notification levels are health-based advisory levels established by the State Board for chemicals in drinking water that lack maximum contaminant levels (MCLs).

**Primary Drinking Water Standard (Primary Standard):** MCLs and MRDLs for contaminants that affect health along with their monitoring and reporting requirements, and water treatment requirements.

**Public Health Goal (PHG):** The level of a contaminant in drinking water below which there is no known or expected risk to health. PHGs are set by the California Environmental Protection Agency.

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

**Running Annual Average (RAA):** The yearly average which is calculated every 3 months using the previous 12 months' data.

**Secondary Drinking Water Standard (Secondary Standard):** MCLs for contaminants that do not affect health but are used to monitor the aesthetics of the water.

**Treatment Technique (TT):** A required treatment process intended to reduce the level of a contaminant in drinking water.

We are required to monitor your drinking water for specific contaminants on a regular basis. Results are an indicator of whether or not your drinking water meets health standards.



## Eastern Municipal Water District Distribution System Data for 2014

Parameter	Units	State or Federal Maximum Contaminant Level (MCL)	California Public Health Goal (PHG)	State Detection Limit for Reporting (DLR)	Range Average	EMWD's Entire Distribution System	Service Area		
							Mills	East Valley	Skinner
<b>MICROBIOLOGICAL</b>									
<b>Total Coliform Bacteria</b>	# positive coliforms	<b>A</b>	MCLG = 0	NA	# positives in 2014 <b>Highest monthly %</b>	4 <b>1.1</b>	4 ---	0 ---	0 ---
<b>Fecal Coliform Bacteria (<i>E. coli</i>)</b>	# positive <i>E. coli</i>	<b>B</b>	MCLG = 0	NA	# positives in 2014	0	0	0	0
<b>Heterotrophic Plate Count (HPC)</b>	# HPCs > 500 CFU/mL	TT <b>C</b>	NA	NA	# HPC>500 in 2014 <b>Lowest monthly %</b>	11 <b>98.8</b>	10 ---	0 ---	1 ---
<b>DISINFECTION BY-PRODUCTS AND DISINFECTANT RESIDUALS</b>									
<b>Bromate (Mills &amp; Skinner plants only)</b>	ppb	RAA = 10	0.1	1.0	Range <b>Highest RAA</b>	--- ---	ND - 23 <b>4.8</b> <b>D</b>	--- ---	ND - 8.0 <b>3.6</b>
<b>Haloacetic Acids (5) (HAA5s) <b>E</b></b>	ppb	LRAA = 60	NA	<b>E</b>	Range <b>Highest LRAA</b>	<1.0 - 38 <b>28</b>	<1.0 - 38 <b>28</b>	<1.0 - 37 <b>26</b>	<1.0 - 27 <b>17</b>
<b>Total Trihalomethanes (TTHMs) <b>F</b></b>	ppb	LRAA = 80	NA	1	Range <b>Highest LRAA</b>	14 - 47 <b>49</b> <b>F</b>	18 - 36 <b>46</b>	14 - 47 <b>49</b> <b>F</b>	16 - 40 <b>28</b>
<b>Total Chlorine Residual chlorine and chloramines</b>	ppm	MRDL = 4	MRDLG = 4	NA	Range <b>Average</b>	<0.2 - 3.3 <b>1.6</b>	<0.2 - 3.3 <b>1.5</b>	<0.2 - 3.2 <b>1.7</b>	<0.2 - 3.2 <b>1.9</b>
<b>PHYSICAL PARAMETERS</b>									
<b>Color</b>	Units	15	NA	NA	Range <b>Average</b>	<2.5 - 50 <b>&lt;2.5</b>	<2.5 - 15 <b>&lt;2.5</b>	<2.5 - 50 <b>G</b> <b>&lt;2.5</b>	<2.5 - 2.5 <b>&lt;2.5</b>
<b>Odor Threshold</b>	TON	3	NA	1	Range <b>Average</b>	NR <b>1</b>	NR <b>1</b>	NR <b>1</b>	NR <b>1</b>
<b>pH</b>	pH unit	6.5 - 8.5	NA	NA	Range <b>Average</b>	6.8 - 8.9 <b>H</b> <b>8.1</b>	6.8 - 8.9 <b>H</b> <b>8.1</b>	7.6 - 8.6 <b>H</b> <b>8.2</b>	7.7 - 8.4 <b>8.0</b>
<b>Turbidity</b>	NTU	5	NA	0.1	Range <b>Average</b>	0.1 - 3.7 <b>0.2</b>	0.1 - 2.3 <b>0.2</b>	0.1 - 3.7 <b>0.2</b>	0.1 - 0.7 <b>0.2</b>
<b>METALS AS A BY-PRODUCT OF CORROSION OF CONSUMER'S PLUMBING <b>I</b></b>									
<b>Copper</b>	ppb	AL = 1300	300	50	NA	90th percentile of 50 samples: 140 ppb <b>Zero samples exceeded the Action Level</b>			
<b>Lead</b>	ppb	AL = 15	0.2	5	NA	90th percentile of 50 samples: <5 ppb <b>Zero samples exceeded the Action Level</b>			
<b>UNREGULATED CONTAMINANT MONITORING <b>J</b></b>									
<b>Chlorate</b>	ppb	NL = 800	NA	MRL = 20	Range <b>Average</b>	ND - 1800 <b>120</b> <b>J</b>	ND - 1800 <b>150</b> <b>J</b>	37 - 190 <b>95</b>	34 - 88 <b>62</b>
<b>Total Chromium</b>	ppb	50	NA	MRL = 0.2 DLR= 10	Range <b>Average</b>	ND - 1.0 <b>0.2</b>	ND - 1.0 <b>0.3</b>	ND - 0.2 <b>ND</b>	NR <b>ND</b>
<b>Chromium-6</b>	ppb	10	0.02	MRL = 0.03 DLR= 1	Range <b>Average</b>	ND - 1.3 <b>0.35</b>	ND - 1.3 <b>0.49</b>	ND - 0.38 <b>0.16</b>	0.06 - 0.12 <b>0.08</b>
<b>Molybdenum</b>	ppb	NA	NA	MRL = 1	Range <b>Average</b>	ND - 9.9 <b>4.8</b>	ND - 9.9 <b>4.5</b>	3.5 - 7.2 <b>5.7</b>	3.4 - 4.5 <b>3.8</b>
<b>Strontium</b>	ppb	NA	NA	MRL = 0.3	Range <b>Average</b>	200 - 860 <b>440</b>	270 - 830 <b>460</b>	200 - 360 <b>290</b>	680 - 860 <b>780</b>
<b>Vanadium</b>	ppb	NL = 50	NA	MRL = 0.2	Range <b>Average</b>	ND - 18 <b>7.4</b>	3.3 - 18 <b>8.4</b>	2.6 - 13 <b>7.8</b>	ND - 4.6 <b>1.2</b>

The State Board allows EMWD to monitor for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of EMWD's data, though representative, are more than one year old.

EMWD supports science-based standards that provide health benefits to the public in an economically balanced manner. Should more stringent standards be set, EMWD will meet them. EMWD's water has met and will continue to meet all regulations.

Unregulated contaminant monitoring helps EPA and the State Board determine where certain contaminants occur and whether the contaminants need to be regulated.

# Eastern Municipal Water District 2014 Water Quality Table

					Moreno Valley, Perris, Menifee & North Canyon Lake								
Parameter	Units	State or Federal Maximum Contaminant Level (MCL)	California Public Health Goal (PHG)	State Detection Limit for Reporting (DLR)	Mills Filtration Plant		Perris Valley Wells		Perris Filtration Plant		Menifee & Perris Desalters		Major Sources in Drinking Water
Percent of total water delivered by EMWD	%				30%		4%		16%		7%		
					Range	Average	Range	Average	Range	Average	Range	Average	
PRIMARY STANDARDS—Mandatory Health-Related Standards													
CLARITY					Highest NTU	% ≤ 0.3			Highest NTU	% ≤ 0.1			
Combined Filter Effluent Turbidity	NTU and %	L	NA	NA	0.09	100	---	---	0.16	99.96	---	---	Soil runoff
ORGANIC CHEMICAL													
Trichloroethylene (TCE)	ppb	5	1.7	0.5	NR	ND	ND - 1.2	0.6	NR	ND	NR	ND	Discharge from metal degreasing sites and other factories
INORGANIC CHEMICALS													
Aluminum	ppb	1000 <span style="color: orange;">M</span> 200	600	50	ND - 190	120	NR	ND	NR	ND	NR	ND	Residue from water treatment process; natural deposits erosion
Arsenic <span style="color: orange;">N</span>	ppb	10	0.004	2	NR	ND	NR	ND	NR	2.7	NR	ND	Natural deposits erosion; runoff from orchards; glass and electronics production wastes
Barium	ppm	1	2	0.1	NR	ND	0.2 - 0.4	0.3	NR	0.1	NR	ND	Discharges of oil drilling wastes and from metal refineries; natural deposits erosion
Fluoride (Naturally-occurring)	ppm	2.0	1.0	0.1	---	---	0.2 - 0.4	0.4	ND - 0.4	0.3	ND - 0.1	ND	Erosion of natural deposits; discharge from fertilizer and aluminum factories
Fluoride (Treatment related) <span style="color: orange;">O</span>	ppm	2.0	1.0	0.1	0.7 - 1.0	0.8	---	---	---	---	---	---	Water additive to promote strong teeth
Nitrate (as NO <sub>3</sub> )	ppm	45	45	2	NR	ND	20 - 30	25	ND - 3.3	ND	ND - 12	9.6	Runoff/leaching from fertilizer use; septic tank and sewage; natural deposits erosion
Perchlorate	ppb	6	6	4	NR	ND	ND - 4.6	ND	NR	ND	NR	ND	Rocket propellant, fireworks, explosives, and industrial discharge; runoff/leaching from fertilizer use.
Selenium	ppb	50	30	5	NR	ND	NR	ND	NR	ND	NR	ND	Runoff/leaching from livestock lots (feed additive), discharge from petroleum, glass and metal refineries; discharge from mines and chemical manufacturers; erosion of natural deposits
RADIOLOGICALS													
Gross Alpha Particle Activity	pCi/L	15	MCLG = 0	3	ND - 4	ND	ND - 6	4	NR	ND	NR	13	Erosion of natural deposits
Gross Beta Particle Activity	pCi/L	50	MCLG = 0	4	NR	ND	NR	ND	NR	7	NR	7	Decay of natural and man-made deposits
Uranium	pCi/L	20	0.43	1	ND - 4	2	1 - 4	2	NR	2	NR	ND	Erosion of natural deposits
SECONDARY STANDARDS—Aesthetic Standards													
Chloride	ppm	500	NA	NA	94 - 97	96	220 - 450	330	85 - 110	95	130 - 220	180	Runoff/leaching from natural deposits; seawater influence
Color	Units	15	NA	NA	NR	1	NR	<2.5	NR	<2.5	NR	<2.5	Naturally-occurring organic materials
Iron	ppb	300	NA	100	NR	ND	NR	ND	NR	ND	NR	ND	Leaching from natural deposits
Manganese	ppb	50	NL = 500	20	NR	ND	NR	ND	NR	ND	NR	ND	Leaching from natural deposits
Odor Threshold	TON	3	NA	1	NR	2	NR	1	NR	1	NR	1	Naturally-occurring organic materials
Specific Conductance	µS/cm	1600	NA	NA	NR	620	1040 - 1370 <span style="color: orange;">K</span>	1230	480 - 1180	900	560 - 950	780	Substances that form ions in water; seawater influence
Sulfate	ppm	500	NA	0.5	62 - 65	64	53 - 69	61	48 - 240	190	24 - 40	32	Runoff/leaching from natural deposits; industrial wastes
Total Dissolved Solids (TDS)	ppm	1000	NA	NA	330 - 350	340	660 - 940 <span style="color: orange;">K</span>	780	280 - 670	530	310 - 610	450	Runoff/leaching from natural deposits; seawater influence
Turbidity <span style="color: orange;">P</span>	NTU	5	NA	0.1	NR	ND	0.2 - 1.8	1.1	0.1 - 0.2	0.1	NR	0.1	Soil runoff
UNREGULATED CONTAMINANT MONITORING <span style="color: orange;">J</span>													
Chlorate	ppb	NA	NL = 800	MRL = 20	ND - 33	22	ND - 170	55	110 - 150	120	68 - 620	340	Agricultural defoliant or desiccant; disinfection by-product; used in production of chlorine dioxide
Chromium-6	ppb	10	0.02	MRL = 0.03 DLR = 1	0.18 - 0.57	0.34	0.44 - 1.3	0.97	0.06 - 0.11	0.08	0.12 - 0.16	0.14	Discharge from electroplating factories, leather tanneries, wood preservation, chemical synthesis, refractory production, and textile manufacturing facilities; erosion of natural deposits
Molybdenum	ppb	NA	NA	MRL = 1	2 - 3	2	ND - 11	6	3 - 4	3	ND - 2	1	Naturally-occurring element found in ores and present in plants, animals and bacteria; used in a chemical reagent
Perfluoroheptanoic Acid (PFHpA)	ppt	NA	NA	MRL = 10	NR	ND	ND - 22	ND	NR	ND	NR	ND	Manmade chemical; used in products to make them stain, grease, heat and water resistant
Perfluorohexanesulfonic Acid (PFHxS)	ppt	NA	NA	MRL = 30	NR	ND	ND - 120	38	NR	ND	NR	ND	Manmade chemical; used in products to make them stain, grease, heat and water resistant
Perfluorooctanesulfonic Acid (PFOS)	ppt	NA	NA	MRL = 40	NR	ND	ND - 82	ND	NR	ND	NR	ND	Surfactant or emulsifier; used in fire-fighting foam, circuit board etching acids, alkaline cleaners, floor polish, and as a pesticide
Perfluorooctanoic Acid (PFOA)	ppt	NA	NA	MRL = 20	NR	ND	ND - 53	ND	NR	ND	NR	ND	Used as surfactant or emulsifier, in Teflon, fire-fighting foams, cleaners, cosmetics, greases and lubricants, paints, polishes, adhesives and photographic films
Strontium	ppb	NA	NA	MRL = 0.3	190 - 330	260	340 - 820	550	250 - 280	260	240 - 340	290	Naturally-occurring element; historically used in production of cathode-ray tube televisions
Vanadium	ppb	NA	NL = 50	MRL = 0.2	3.6 - 5.4	4.2	4.4 - 16	12	3.3 - 5.3	4.5	2.7 - 4.4	3.6	Naturally-occurring; industrial waste discharge
OTHER PARAMETERS													
Alkalinity (Total)	ppm	NA	NA	NA	86 - 90	88	120 - 230	160	90 - 150	130	42 - 140	66	Naturally-occurring carbonates; measures water's ability to neutralize acid
Boron	ppb	NL = 1000	NA	100	NR	170	380 - 620	490	120 - 190	140	110 - 230	190	Runoff/leaching from natural deposits; industrial wastes
Calcium	ppm	NA	NA	NA	26 - 28	27	83 - 190	130	29 - 79	66	39 - 69	54	Naturally-occurring mineral
Hardness as Calcium Carbonate <span style="color: orange;">Q</span>	grains/gallon	NA	NA	NA	7.0 - 7.1	7.1	18 - 37	27	7.6 - 18	15	8.2 - 14	11	Naturally-occurring; the sum of calcium and magnesium in the water
Magnesium	ppm	NA	NA	NA	NR	13	24 - 43	32	14 - 27	23	8.9 - 18	13	Naturally-occurring mineral
Sodium	ppm	NA	NA	NA	72 - 78	75	92 - 170	130	66 - 120	90	56 - 110	79	Naturally-occurring mineral

ND - NONE DETECTED      NR - NO RANGE

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Unregulated contaminant monitoring helps EPA and the State Board determine where certain contaminants occur and whether the contaminants need to be regulated.

# Eastern Municipal Water District 2014 Water Quality Table

					Murrieta		
Parameter	Units	State or Federal Maximum Contaminant Level (MCL)	California Public Health Goal (PHG)	State Detection Limit for Reporting (DLR)	Skinner Filtration Plant		Major Sources in Drinking Water
Percent of total water delivered by EMWD	%				27%		
					Range	Average	
PRIMARY STANDARDS—Mandatory Health-Related Standards							
CLARITY							
Combined Filter Effluent Turbidity	NTU and %	L	NA	NA	Highest NTU	% ≤ 0.3	
					0.09	100	Soil runoff
ORGANIC CHEMICAL							
Trichloroethylene (TCE)	ppb	5	1.7	0.5	NR	ND	Discharge from metal degreasing sites and other factories
INORGANIC CHEMICALS							
Aluminum	ppb	1000 <span style="color: orange;">M</span> 200	600	50	NR	ND	Residue from water treatment process; natural deposits erosion
Arsenic <span style="color: orange;">N</span>	ppb	10	0.004	2	NR	ND	Natural deposits erosion; runoff from orchards; glass and electronics production wastes
Barium	ppm	1	2	0.1	NR	0.1	Discharges of oil drilling wastes and from metal refineries; natural deposits erosion
Fluoride (Naturally-occurring)	ppm	2.0	1.0	0.1	---	---	Erosion of natural deposits; discharge from fertilizer and aluminum factories
Fluoride (Treatment related) <span style="color: orange;">O</span>	ppm	2.0	1.0	0.1	0.7 - 0.9	0.8	Water additive to promote strong teeth
Nitrate (as NO <sub>3</sub> )	ppm	45	45	2	NR	ND	Runoff/leaching from fertilizer use; septic tank and sewage; natural deposits erosion
Perchlorate	ppb	6	6	4	NR	ND	Rocket propellant, fireworks, explosives, and industrial discharge; runoff/leaching from fertilizer use.
Selenium	ppb	50	30	5	NR	ND	Runoff/leaching from livestock lots (feed additive), discharge from petroleum, glass and metal refineries; discharge from mines and chemical manufacturers; erosion of natural deposits
RADIOLOGICALS							
Gross Alpha Particle Activity	pCi/L	15	MCLG = 0	3	ND - 5	ND	Erosion of natural deposits
Gross Beta Particle Activity	pCi/L	50	MCLG = 0	4	NR	5	Decay of natural and man-made deposits
Uranium	pCi/L	20	0.43	1	1 - 2	2	Erosion of natural deposits
SECONDARY STANDARDS—Aesthetic Standards							
Chloride	ppm	500	NA	NA	90 - 93	92	Runoff/leaching from natural deposits; seawater influence
Color	Units	15	NA	NA	NR	1	Naturally-occurring organic materials
Iron	ppb	300	NA	100	NR	ND	Leaching from natural deposits
Manganese	ppb	50	NL = 500	20	NR	ND	Leaching from natural deposits
Odor Threshold	TON	3	NA	1	NR	1	Naturally-occurring organic materials
Specific Conductance	µS/cm	1600	NA	NA	910 - 950	930	Substances that form ions in water; seawater influence
Sulfate	ppm	500	NA	0.5	190 - 210	200	Runoff/leaching from natural deposits; industrial wastes
Total Dissolved Solids (TDS)	ppm	1000	NA	NA	570 - 580	580	Runoff/leaching from natural deposits; seawater influence
Turbidity <span style="color: orange;">P</span>	NTU	5	NA	0.1	NR	ND	Soil runoff
UNREGULATED CONTAMINANT MONITORING <span style="color: orange;">J</span>							
Chlorate	ppb	NA	NL = 800	MRL = 20	34 - 77	48	Agricultural defoliant or desiccant; disinfection by-product; used in production of chlorine dioxide
Chromium-6	ppb	10	0.02	MRL = 0.03 DLR = 1	0.05 - 0.08	0.07	Discharge from electroplating factories, leather tanneries, wood preservation, chemical synthesis, refractory production, and textile manufacturing facilities; erosion of natural deposits
Molybdenum	ppb	NA	NA	MRL = 1	NR	4	Naturally-occurring element found in ores and present in plants, animals and bacteria; used in a chemical reagent
Perfluoroheptanoic Acid (PFHpA)	ppt	NA	NA	MRL = 10	NR	ND	Manmade chemical; used in products to make them stain, grease, heat and water resistant
Perfluorohexanesulfonic Acid (PFHxS)	ppt	NA	NA	MRL = 30	NR	ND	Manmade chemical; used in products to make them stain, grease, heat and water resistant
Perfluorooctanesulfonic Acid (PFOS)	ppt	NA	NA	MRL = 40	NR	ND	Surfactant or emulsifier; used in fire-fighting foam, circuit board etching acids, alkaline cleaners, floor polish, and as a pesticide
Perfluorooctanoic Acid (PFOA)	ppt	NA	NA	MRL = 20	NR	ND	Used as surfactant or emulsifier, in Teflon, fire-fighting foams, cleaners, cosmetics, greases and lubricants, paints, polishes, adhesives and photographic films
Strontium	ppb	NA	NA	MRL = 0.3	750 - 1000	840	Naturally-occurring element; historically used in production of cathode-ray tube televisions
Vanadium	ppb	NA	NL = 50	MRL = 0.2	NR	ND	Naturally-occurring; industrial waste discharge
OTHER PARAMETERS							
Alkalinity (Total)	ppm	NA	NA	NA	120 - 130	120	Naturally-occurring carbonates; measures water's ability to neutralize acid
Boron	ppb	NL = 1000	NA	100	NR	110	Runoff/leaching from natural deposits; industrial wastes
Calcium	ppm	NA	NA	NA	65 - 70	68	Naturally-occurring mineral
Hardness as Calcium Carbonate <span style="color: orange;">Q</span>	grains/gallon	NA	NA	NA	15 - 16	16	Naturally-occurring; the sum of calcium and magnesium in the water
Magnesium	ppm	NA	NA	NA	24 - 25	25	Naturally-occurring mineral
Sodium	ppm	NA	NA	NA	86 - 90	88	Naturally-occurring mineral

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# Eastern Municipal Water District 2014 Water Quality Table

					Hemet & San Jacinto				
Parameter	Units	State or Federal Maximum Contaminant Level (MCL)	California Public Health Goal (PHG)	State Detection Limit for Reporting (DLR)	East Valley Wells		Hemet Filtration Plant		Major Sources in Drinking Water
Percent of total water delivered by EMWD	%				9%		7%		
					Range	Average	Range	Average	
<b>PRIMARY STANDARDS—Mandatory Health-Related Standards</b>									
<b>CLARITY</b>									
Combined Filter Effluent Turbidity	NTU and %	L	NA	NA	---	---	0.09	100	Soil runoff
<b>ORGANIC CHEMICAL</b>									
Trichloroethylene (TCE)	ppb	5	1.7	0.5	NR	ND	NR	ND	Discharge from metal degreasing sites and other factories
<b>INORGANIC CHEMICALS</b>									
Aluminum	ppb	1000 <span style="color: orange;">M</span> 200	600	50	NR	ND	ND - 58	ND	Residue from water treatment process; natural deposits erosion
Arsenic <span style="color: orange;">N</span>	ppb	10	0.004	2	ND - 9.0	3.4	NR	2.2	Natural deposits erosion; runoff from orchards; glass and electronics production wastes
Barium	ppm	1	2	0.1	ND - 0.1	ND	NR	0.1	Discharges of oil drilling wastes and from metal refineries; natural deposits erosion
Fluoride (Naturally-occurring)	ppm	2.0	1.0	0.1	0.1 - 0.5	0.3	ND - 0.3	0.2	Erosion of natural deposits; discharge from fertilizer and aluminum factories
Fluoride (Treatment related) <span style="color: orange;">O</span>	ppm	2.0	1.0	0.1	---	---	---	---	Water additive to promote strong teeth
Nitrate (as NO <sub>3</sub> )	ppm	45	45	2	ND - 17	3.4	ND - 2.2	ND	Runoff/leaching from fertilizer use; septic tank and sewage; natural deposits erosion
Perchlorate	ppb	6	6	4	NR	ND	NR	ND	Rocket propellant, fireworks, explosives, and industrial discharge; runoff/leaching from fertilizer use.
Selenium	ppb	50	30	5	ND - 12	ND	NR	ND	Runoff/leaching from livestock lots (feed additive), discharge from petroleum, glass and metal refineries; discharge from mines and chemical manufacturers; erosion of natural deposits
<b>RADIOLOGICALS</b>									
Gross Alpha Particle Activity	pCi/L	15	MCLG = 0	3	ND - 4	ND	NR	4	Erosion of natural deposits
Gross Beta Particle Activity	pCi/L	50	MCLG = 0	4	ND - 11	ND	NR	ND	Decay of natural and man-made deposits
Uranium	pCi/L	20	0.43	1	ND - 1	ND	NR	1	Erosion of natural deposits
<b>SECONDARY STANDARDS—Aesthetic Standards</b>									
Chloride	ppm	500	NA	NA	10 - 71	26	88 - 100	96	Runoff/leaching from natural deposits; seawater influence
Color	Units	15	NA	NA	NR	<2.5	NR	<2.5	Naturally-occurring organic materials
Iron	ppb	300	NA	100	ND - 120	ND	NR	ND	Leaching from natural deposits
Manganese	ppb	50	NL = 500	20	ND - 47	ND	NR	ND	Leaching from natural deposits
Odor Threshold	TON	3	NA	1	NR	1	NR	1	Naturally-occurring organic materials
Specific Conductance	µS/cm	1600	NA	NA	340 - 840	490	470 - 1160	760	Substances that form ions in water; seawater influence
Sulfate	ppm	500	NA	0.5	12 - 180	57	47 - 250	130	Runoff/leaching from natural deposits; industrial wastes
Total Dissolved Solids (TDS)	ppm	1000	NA	NA	180 - 500	280	270 - 650	440	Runoff/leaching from natural deposits; seawater influence
Turbidity <span style="color: orange;">P</span>	NTU	5	NA	0.1	0.1 - 1.1	0.4	NR	0.1	Soil runoff
<b>UNREGULATED CONTAMINANT MONITORING <span style="color: orange;">J</span></b>									
Chlorate	ppb	NA	NL = 800	MRL = 20	ND - 760	200	82 - 170	140	Agricultural defoliant or desiccant; disinfection by-product; used in production of chlorine dioxide
Chromium-6	ppb	10	0.02	MRL = 0.03 DLR = 1	ND - 1.4	0.23	0.06 - 0.09	0.07	Discharge from electroplating factories, leather tanneries, wood preservation, chemical synthesis, refractory production, and textile manufacturing facilities; erosion of natural deposits
Molybdenum	ppb	NA	NA	MRL = 1	3 - 15	7	2 - 3	2	Naturally-occurring element found in ores and present in plants, animals and bacteria; used in a chemical reagent
Perfluoroheptanoic Acid (PFHpA)	ppt	NA	NA	MRL = 10	NR	ND	NR	ND	Manmade chemical; used in products to make them stain, grease, heat and water resistant
Perfluorohexanesulfonic Acid (PFHxS)	ppt	NA	NA	MRL = 30	NR	ND	NR	ND	Manmade chemical; used in products to make them stain, grease, heat and water resistant
Perfluorooctanesulfonic Acid (PFOS)	ppt	NA	NA	MRL = 40	NR	ND	NR	ND	Surfactant or emulsifier; used in fire-fighting foam, circuit board etching acids, alkaline cleaners, floor polish, and as a pesticide
Perfluorooctanoic Acid (PFOA)	ppt	NA	NA	MRL = 20	NR	ND	NR	ND	Used as surfactant or emulsifier, in Teflon, fire-fighting foams, cleaners, cosmetics, greases and lubricants, paints, polishes, adhesives and photographic films
Strontium	ppb	NA	NA	MRL = 0.3	220 - 390	310	240 - 290	260	Naturally-occurring element; historically used in production of cathode-ray tube televisions
Vanadium	ppb	NA	NL = 50	MRL = 0.2	2.7 - 20	7.2	2.1 - 2.9	2.5	Naturally-occurring; industrial waste discharge
<b>OTHER PARAMETERS</b>									
Alkalinity (Total)	ppm	NA	NA	NA	110 - 160	140	85 - 140	110	Naturally-occurring carbonates; measures water's ability to neutralize acid
Boron	ppb	NL = 1000	NA	100	ND - 130	ND	120 - 190	160	Runoff/leaching from natural deposits; industrial wastes
Calcium	ppm	NA	NA	NA	35 - 75	55	26 - 79	49	Naturally-occurring mineral
Hardness as Calcium Carbonate <span style="color: orange;">Q</span>	grains/gallon	NA	NA	NA	5.8 - 14	9.5	7.0 - 17	12	Naturally-occurring; the sum of calcium and magnesium in the water
Magnesium	ppm	NA	NA	NA	2.9 - 14	6.0	13 - 27	19	Naturally-occurring mineral
Sodium	ppm	NA	NA	NA	25 - 79	35	62 - 120	83	Naturally-occurring mineral

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## Footnotes

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- A** Total coliform MCLs: No more than 5.0% of the monthly samples may be total coliform-positive. Compliance is based on distribution system samples. EMWD analyzed 3,067 coliform samples in 2014, four of which were total coliform positive. The highest monthly coliform result was 1.1%. The MCL was not violated in 2014.
- 
- B** Fecal coliform/*E. coli* MCLs: An MCL violation is the occurrence of two (2) consecutive total coliform-positive samples, one of which contains fecal coliform or *E. coli*. There were zero detected fecal coliforms. The MCL was not violated in 2014.
- 
- C** HPCs were tested only in distribution system samples which had no detectable chlorine residual. No less than 95% of all distribution system samples in one month may have no detectable chlorine residual and an HPC greater than 500 colony forming units per mL. The HPC results were no less than 98.8% in any month in 2014. Six samples in the Mills service area had no chlorine residual but HPCs were not measured, so they were counted as "HPC > 500 CFU/mL."
- 
- D** Bromate is a disinfection by-product resulting from the use of ozone. Currently, Mills and Skinner Filtration plants use ozone. The MCL is based on the Running Annual Average (RAA), so values above the MCL are acceptable, so long as the RAA complies with the MCL.
- 
- E** DLR = 1.0 ppb for each HAA5 analyte (dichloroacetic acid, trichloroacetic acid, monobromoacetic acid, and dibromoacetic acid) except for monochloroacetic acid which has a DLR = 2.0 ppb. Locational Running Annual Averages and ranges are calculated from 12 samples sites collected quarterly throughout the distribution system. HAA5s are a by-product of drinking water chlorination.
- 
- F** Total Trihalomethanes are the sum of the following analytes: bromodichloromethane, bromoform, chloroform, and dibromochloromethane. Locational Running Annual Averages (LRAA) and ranges are calculated from 12 sample sites collected quarterly throughout the distribution system. TTHMs are a by-product of drinking water chlorination. The highest LRAA for the East Valley Service area included a TTHM of 61 from 2013.
- 
- G** High color (over 15) represents one sample site in the East Valley Service area. EMWD responded to this high value by flushing the area and resampling, and the resample complied with state standards.
- 
- H** The recommended Federal secondary MCL for pH is a range of 6.5 to 8.5. The State Board does not regulate pH in drinking water. In 2014 six samples out of 839 were slightly over the 8.5 limit.
- 
- I** Lead and copper are regulated as a Treatment Technique under the Lead and Copper Rule, which requires systems to take water samples at the consumers' tap every three years. Results are from 2013. Neither lead nor copper are typically found in the source waters but can get into water by way of internal corrosion of household plumbing.
- 
- J** Unregulated contaminant monitoring spanned four consecutive quarters from late 2013 through 2014. The chlorate value above the notification level of 800 ppb represents one sample in the Lakeview area. All other chlorate samples in this area were less than the NL. Chlorate is an agricultural defoliant or desiccant, a disinfection by-product, and is used in the production of chlorine dioxide.
- 
- K** Values are from blended Well 57 and raw well values from other wells in area. Well 57 is blended on site with distribution system water to improve Total Dissolved Solids.
- 
- L** The turbidity level of the combined filter effluent at the Mills and Skinner Filtration plants shall be less than or equal to 0.3 NTU in 95% of the measurements taken each month and shall not exceed 1 NTU at any time. For Perris and Hemet Water Filtration plants, the turbidity level of the combined filter effluent shall be less than or equal to 0.1 NTU in 95% of the measurements taken each month and shall not exceed 1 NTU at any time. Turbidity is a measure of the cloudiness of the water and is an indicator of treatment performance.
- 
- M** Aluminum has both primary (1,000 ppb) and secondary (200 ppb) standards (MCLs).
- 
- N** While your drinking water meets the federal and state standard for arsenic, some of our sources do contain low levels of arsenic. The arsenic standard balances the current understanding of arsenic's possible health effects against the costs of removing arsenic from drinking water. The EPA continues to research the health effects of low levels of arsenic, which is a mineral known to cause cancer in humans at high concentrations and is linked to other health effects such as skin damage and circulatory problems.
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- O** MWD began fluoride treatment of water at Mills and Skinner Filtration plants in 2007. Fluoride is not added to the water in the East Valley Service area.
- 
- P** Turbidity is a measure of the cloudiness of the water and is an indicator of treatment performance. Secondary standards were based either on the treatment plant effluent or raw well water.
- 
- Q** Water hardness, measured in grains per gallon as calcium carbonate, is characterized by the following scale: 0 – 4.4 is soft, 4.4 – 8.8 is moderately hard, 8.8 – 17.5 is hard and greater than 17.5 is very hard.
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# Your 2014 Water Quality

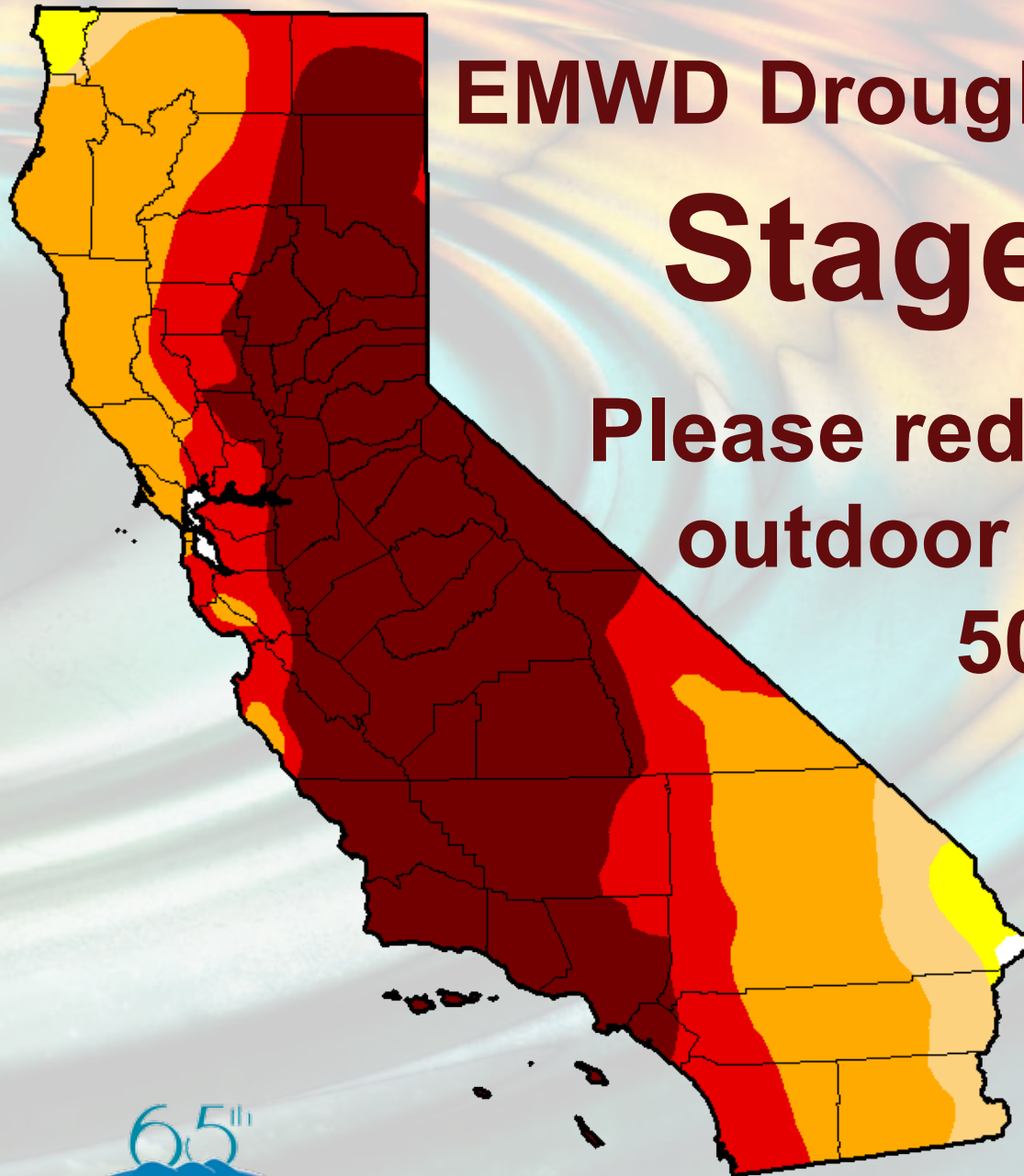
CONSUMER CONFIDENCE  
REPORT  
Issued July 2015

## Public Meetings

EMWD's Board of Directors meetings are generally held on the 1<sup>st</sup> and 3<sup>rd</sup> Wednesdays of each month beginning at 9:00 a.m.

If you wish to attend a meeting, please call the Board Secretary during normal business hours at (951) 928-3777, ext. 4235 to confirm meeting dates or check the Board Meeting Calendar online at [www.emwd.org/BoardMeetings](http://www.emwd.org/BoardMeetings).

For more information on this report, contact: **Water Quality** (951) 928-3777, ext. 3327 or visit [www.emwd.org/WaterQuality](http://www.emwd.org/WaterQuality)



## EMWD Drought Status Stage 4

Please reduce your  
outdoor watering  
50 percent

### Drought Conditions

- Abnormally Dry
- Moderate Drought
- Severe Drought
- Extreme Drought
- Exceptional Drought



[www.emwd.org/drought](http://www.emwd.org/drought)