

# ANNUAL WATER QUALITY REPORT

*Water testing performed in 2006*



*Proudly Presented By:*

WALNUT VALLEY  
WATER DISTRICT

PWS ID#: 1910234

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

Mahalaga ang impormasyong ito.  
Mangyaring ipasalin ito.

“هذا التقرير يحتوي على معلومات مهمة تتعلق بمياه الشفة (أو الشرب).  
ترجم التقرير، أو تكلم مع شخص يستطيع أن يفهم التقرير.”

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。

此份有关你的食水报告，内有重要资料 and 讯息，请找他人为你翻译及解释清楚。

ਇਹ ਸੂਚਨਾ ਮਹੱਤਵਪੂਰਨ ਹੈ ।  
ਕ੍ਰਿਪਾ ਕਰਕੇ ਕਿਸੀ ਤੇ ਇਸ ਦਾ ਅਨੁਵਾਦ ਕਰਾਓ ।

Chi tiết này thật quan trọng.  
Xin nhờ người dịch cho quý vị.

この情報は重要です。  
翻訳を依頼してください。

이 안내는 매우 중요합니다.  
본인을 위해 번역인을 사용하십시오.

ਯਹ ਸੂਚਨਾ ਮਹੱਤਵਪੂਰਨ ਹੈ ।  
ਕ੍ਰਿਪਾ ਕਰਕੇ ਕਿਸੀ ਤੇ :ਸਕਾ ਅਨੁਵਾਦ ਕਰਾਓ ।

## Continuing Our Commitment

Once again we proudly present our annual water quality report. This edition covers all testing completed from January 1, 2006 through December 31, 2006. We are pleased to tell you that our compliance with all state and federal drinking water laws remains exemplary. As in the past, we are committed to delivering the best-quality drinking water. To that end, we remain vigilant in meeting the challenges of source water protection, water conservation, and community education while continuing to serve the needs of all of our water users.

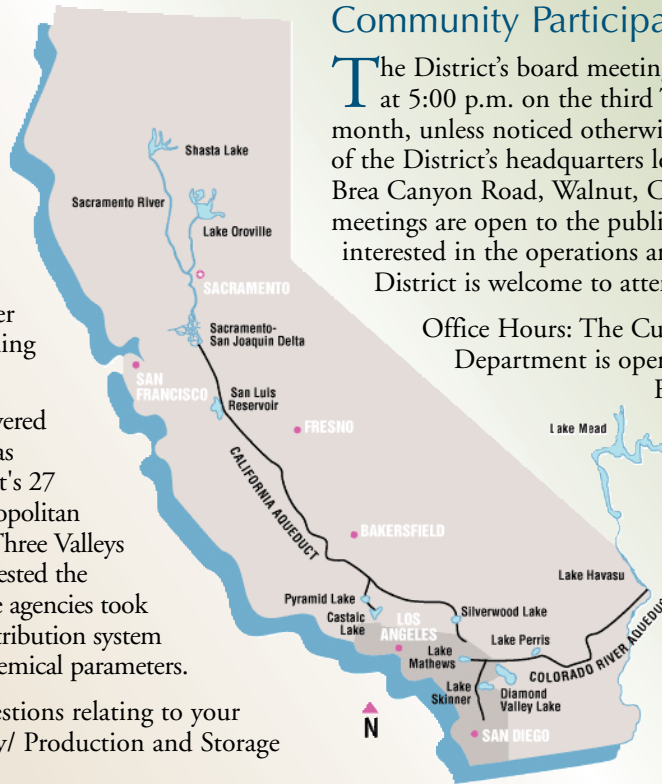
Last year, the Walnut Valley Water District (District) delivered to its customers over seven billion gallons of water that was tested every day at the entry and exit points of the District's 27 reservoirs. In addition to testing by the District, the Metropolitan Water District of Southern California (MWD), and the Three Valleys Municipal Water District (TVMWD) also sampled and tested the drinking water delivered by the District. Combined, these agencies took over 300,000 samples last year from transmission and distribution system access points and analyzed them for over 120 different chemical parameters.

For more information about this report, or for any questions relating to your drinking water, please call David Garcia, Water Quality/ Production and Storage Manager, at (909) 595-1268, ext. 210.

## Community Participation

The District's board meetings are typically held at 5:00 p.m. on the third Tuesday of each month, unless noticed otherwise, in the board room of the District's headquarters located at 271 South Brea Canyon Road, Walnut, California. The Board meetings are open to the public. Anyone who is interested in the operations and business of the District is welcome to attend.

Office Hours: The Customer Service Department is open Monday through Friday, 8:00 a.m. to 4:45 p.m.  
(909) 595-1268  
[www.wvwd.com](http://www.wvwd.com)



**The mission of the Walnut Valley Water District is to provide a reliable, high quality water supply in a fiscally efficient and environmentally responsible manner while remaining committed to providing superior service to our customers**

## 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 may be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. The U.S. EPA/CDC (Centers for Disease Control and Prevention) 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 (800) 426-4791.



## Source Water Assessment

In December 2002, the Metropolitan Water District of Southern California (MWD) completed a source water assessment of its Colorado River and State Water Project supplies. Colorado River supplies are considered to be most vulnerable to recreation, urban and stormwater runoff, increasing urbanization in the watershed, and wastewater. State Water Project supplies are considered to be most vulnerable to urban and stormwater runoff, wildlife, agriculture, recreation, and wastewater. A copy of the assessment can be obtained by contacting MWD at (213) 217-6850.

## Where Does My Water Come From?

As you may be aware, the District is primarily dependent on surface water that is imported into southern California by MWD. MWD imports and treats surface water transported through two major conveyance systems: the 242-mile-long Colorado River Aqueduct and the 444-mile-long State Water Project (SWP). Water transported via the Colorado River Aqueduct originates in the Colorado River basin states, and water transported by the State Water Project's conveyance system originates in the Sacramento-San Joaquin Delta. MWD treats this water at their Weymouth Filtration plant in the City of La Verne. The water is then purchased by the District through our designated wholesale water agency, Three Valleys Municipal Water District.

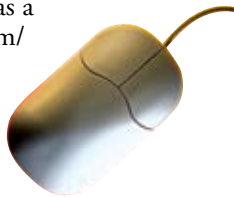


## Naturally Occurring Bacteria

The simple fact is, bacteria and other microorganisms inhabit our world. They can be found all around us: in our food; on our skin; in our bodies; and in the air, soil, and water. Some are harmful to us and some are not. Coliform bacteria are common in the environment and are generally not harmful themselves. The presence of this bacterial form in drinking water is a concern because it indicates that the water may be contaminated with other organisms that can cause illness. Throughout the year, we routinely tested water samples for coliform bacteria. In that time, none of the samples came back positive. Federal and State regulations require that public water that tests positive for coliform bacteria must be further analyzed for fecal coliform bacteria. Fecal coliform are present only in human and animal waste. Because these bacteria can cause illness, it is unacceptable for fecal coliform to be present in water at any concentration. Our tests indicate no fecal coliform is present in our water.

## Information on the Internet

The U.S. EPA Office of Water ([www.epa.gov/watrhome](http://www.epa.gov/watrhome)) and the Centers for Disease Control and Prevention ([www.cdc.gov](http://www.cdc.gov)) Web sites provide a substantial amount of information on many issues relating to water resources, water conservation, and public health. Also, the Division of Drinking Water and Environmental Management has a Web site ([www.dhs.ca.gov/ps/ddwem/technical/dwp/dwpindex.htm](http://www.dhs.ca.gov/ps/ddwem/technical/dwp/dwpindex.htm)) that provides complete and current information on water issues in California, including valuable information about our watershed.



# Q&A

## Milky Water?

During the time of year when the water coming into the house is colder than the temperature inside the house, this phenomenon can occur. Cold water holds more dissolved oxygen than warm water does; consequently, when cold water from outside water mains comes inside our warm homes and the water begins to warm, the oxygen has to escape. It escapes in air bubbles that turn the water milky. A visual example of this is to run cold water into a clear container and observe it for a short time. If the water clears from the bottom to the top of the container then the phenomenon described above is occurring. The oxygen bubbles are moving from the bottom to the top of the container to escape into the open atmosphere.

## Is it Safe to Drink Water From a Garden Hose?

No. Substances used in vinyl garden hoses to keep them flexible can get into the water as it passes through the hose. These chemicals are not good for you nor are they good for your pets. Allow the water to run for a short time in order to flush the hose before drinking or filling your pets' drinking containers. There are hoses made with "food-grade" plastic that will not contaminate the water. Check your local hardware store for this type of hose.

## How Are Bacteria That Can Make People Sick Kept out of Drinking Water?

Chemicals called disinfectants are added to drinking water at the treatment plant. Two commonly used chemicals are chloramine and chlorine. Chloramine, the combination of ammonia and chlorine, forms a stable bond that keeps a disinfectant residual throughout the entire distribution system.

## What Is the White Residue Sometimes Found on Items such as Coffee Pots, Irons, Shower Doors, Glassware, and Cookware?

The white residues are minerals that are found in the water such as calcium. Over time and with repeated water use there may be a build-up of minerals on surfaces that the water comes in contact with. There are commercial products that can be purchased to rid the surface of mineral build-up.

## Water Conservation Tips

Water conservation measures are an important first step in preserving our water supply. Such measures not only save the supply of our source water but can also save you money by reducing your water bill. Here are a few suggestions:

### *Conservation measures you can use inside your home include:*

- Fix leaking faucets, pipes, toilets, etc.
- Replace old fixtures; install water-saving devices in faucets, toilets, and appliances.
- Wash only full loads of laundry.
- Do not use the toilet for trash disposal.
- Take shorter showers.



### *You can conserve outdoors as well:*

- Water the lawn and garden in the early morning or evening.
- Use mulch around plants and shrubs.
- Repair leaks in faucets and hoses.

*Information on other ways that you can help conserve water can be found at [www.wvwd.com](http://www.wvwd.com), [bewaterwise.com](http://bewaterwise.com) and [www.epa.gov/safewater/publicoutreach/index.html](http://www.epa.gov/safewater/publicoutreach/index.html).*

## Substances That Might Be in Drinking 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.

In order to ensure that tap water is safe to drink, the U.S. Environmental Protection Agency (U.S. EPA) and the California State Department of Health Services (DHS) prescribe regulations that limit the amount of certain contaminants in water provided by public water systems. Department regulations also establish limits for contaminants in bottled water that must provide the same protection for public health. 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.

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 can 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, which are by-products of industrial processes and petroleum production, and which can also come from gas stations, urban stormwater runoff, agricultural applications, and septic systems;

**Radioactive Contaminants**, which can be naturally occurring or can be the result of oil and gas production and mining activities.

More information about contaminants and potential health effects can be obtained by calling the U.S. EPA's Safe Drinking Water Hotline at (800) 426-4791.

## Contamination from Cross-Connections

Cross-connections that contaminate drinking water distribution lines are a major concern. A cross-connection is formed at any point where a drinking water line connects to equipment (boilers), systems containing chemicals (air conditioning systems, fire sprinkler systems, irrigation systems) or water sources of questionable quality. Cross-connection contamination can occur when the pressure in the equipment or system is greater than the pressure inside the drinking water line (backpressure). Contamination can also occur when the pressure in the drinking water line drops due to fairly routine occurrences (main breaks, heavy water demand) causing contaminants to be sucked out from the equipment and into the drinking water line (backsiphonage).

Outside water taps and garden hoses tend to be the most common sources of cross-connection contamination at home. The garden hose creates a hazard when submerged in a swimming pool or when

attached to a chemical sprayer for weed killing. Garden hoses that are left lying on the ground may be contaminated by fertilizers, cesspools, or garden chemicals. Improperly installed valves in your toilet could also be a source of cross-connection contamination.

Community water supplies are continuously jeopardized by cross-connections unless appropriate valves, known as backflow prevention devices, are installed and maintained. We continually survey all industrial, commercial, and institutional facilities in our service area to make sure that all potential cross-connections are identified and eliminated or protected by a backflow preventer. Additionally, we ensure that each device is tested annually by a certified tester.

For more information, review the Cross-Connection Control Manual from the U.S. EPA's Web site at [www.epa.gov/safewater/crossconnection.html](http://www.epa.gov/safewater/crossconnection.html). You can also call the Safe Drinking Water Hotline at (800) 426-4791.

## Lead in Drinking Water

Lead is a naturally occurring element in our environment. Consequently, our water supply is expected to contain small, undetectable amounts of lead. However, most of the lead in household water usually comes from the plumbing in your own home, not from the local water supply. The U.S. EPA estimates that more than 40 million U.S. residents use water that can contain lead in excess of EPA's Action Level of 15 ppb.

Lead in drinking water is a concern because young children,

infants and fetuses appear to be particularly vulnerable to lead poisoning. A dose that would have little effect on an adult can have a big effect on a small body. On average, it is estimated that lead in drinking water contributes between 10 and 20 percent of total lead exposure in young children.

All kinds of water, however, may have high levels of lead. We maintain our drinking water supply at an optimum pH and mineral content level to help prevent corrosion in your home's pipes. For more information, please contact the Safe Drinking Water Hotline at (800) 426-4791, or visit [www.epa.gov/safewater/lead](http://www.epa.gov/safewater/lead).

## Sampling Results

The District is pleased to report that during the past year, the water delivered to your home or business complied with, or surpassed, all state and federal drinking water requirements. For your information, the District has compiled the table below to show what substances were detected in your drinking water during 2006. Although all of the substances listed are under the Maximum Contaminant Level (MCL) set by the U.S. EPA and the California Department of Health Services (DHS), it is important that you know exactly what was detected and how much of the substance was present in the water.

REGULATED SUBSTANCES				MWD		TVMWD			
SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	MCL [MRDL]	PHG (MCLG) [MRDLG]	AMOUNT DETECTED	RANGE LOW-HIGH	AMOUNT DETECTED	RANGE LOW-HIGH	VIOLATION	TYPICAL SOURCE
Aluminum (ppb)	2006	1000	600	ND	ND-190	ND	ND-56	No	Residue from water treatment process; erosion of natural deposits
Arsenic (ppb)	2006	10	0.004	ND	ND-2.4	ND	ND	No	Erosion of natural deposits; glass & electronics production wastes
Chloramines (ppm)	2006	[4.0 (as Cl <sub>2</sub> )]	[4 (as Cl <sub>2</sub> )]	2.4	1.4-2.8	2.29	2.06-2.66	No	Drinking water disinfectant added for treatment
Control of DBP precursors [TOC] (ppm)	2006	TT	NA	2.2	1.8-2.7	1.22	1.2-2.9	No	Various natural and man-made sources
Fluoride (ppm)	2006	2.0	1	0.13	ND-0.15	ND	NA	No	Erosion of natural deposits; water additive that promotes strong teeth; discharge from fertilizer and aluminum factories
Haloacetic Acids (ppb)	2006	60	NA	25	13-35	26.9	20-32.9	No	By-product of drinking water disinfection
Nitrate and Nitrite (as N) (ppm)	2006	10	10	0.45	ND-0.63	0.44	ND-0.73	No	Runoff and leaching from fertilizer use; leaching from septic tanks and sewage; erosion of natural deposits
TTHMs [Total Trihalomethanes] (ppb)	2006	80	NA	46	34-63	40.1	30.4-51.6	No	By-product of drinking water chlorination

### Walnut Valley Water District Distribution System

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	MCL [MRDL]	PHG (MCLG) [MRDLG]	AMOUNT DETECTED	RANGE LOW-HIGH	VIOLATION	TYPICAL SOURCE
Chloramines (ppm)	2006	[4.0 (as Cl <sub>2</sub> )]	[4 (as Cl <sub>2</sub> )]	1.93	1.47-2.2	No	Drinking water disinfectant added for treatment
Haloacetic Acids (ppb)	2006	60	NA	32.1	25.1-41.2	No	By-product of drinking water disinfection
TTHMs [Total Trihalomethanes] (ppb)	2006	80	NA	48.7	34.5-60.9	No	By-product of drinking water chlorination

### Tap water samples were collected from 30 sample sites throughout the community

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	ACTION LEVEL	MCLG	AMOUNT DETECTED (90TH% TILE)	SITES ABOVE ACTION LEVEL	VIOLATION	TYPICAL SOURCE
Copper (ppm)	2006	1.3	0.17	0.24	0	No	Internal corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
Lead (ppb)	2006	15	2	2	1	No	Internal corrosion of household water plumbing systems; discharges from industrial manufacturers; erosion of natural deposits

## Table Definitions

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

**grains/gal (grains per gallon):** Grains of compound per gallon of 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

(SMCLs) are set to protect the odor, taste and appearance of drinking water.

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

**MRDL (Maximum Residual Disinfectant Level):** The level of a disinfectant added for water treatment that may not be exceeded at the consumer's tap.

**MRDLG (Maximum Residual Disinfectant Level Goal):** The level of a disinfectant added for water treatment below which there is no known

or expected risk to health. MRDLGs are set by the U.S. EPA.

**NA:** Not applicable.

**ND (Not detected):** Indicates that the substance was not found by laboratory analysis.

**NS:** No standard.

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

**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.

**ppb (parts per billion):** One part substance per billion parts water (or micrograms per liter).

**ppm (parts per million):** One part substance per million parts water (or milligrams per liter).

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

**µS/cm (microsiemens per centimeter):** A unit expressing the amount of electrical conductivity of a solution.

SECONDARY SUBSTANCES				Walnut Valley Water District		MWD		TVMWD			
SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	SMCL	PHG (MCLG)	AMOUNT DETECTED	RANGE LOW-HIGH	AMOUNT DETECTED	RANGE LOW-HIGH	AMOUNT DETECTED	RANGE LOW-HIGH	VIOLATION	TYPICAL SOURCE
<b>Aluminum</b> (ppm)	2006	1000	600	NA	NA	ND	ND–190	ND	ND–56	No	
<b>Chloride</b> (ppm)	2006	500	NS	NA	NA	61	42–98	51.5	NA	No	Runoff/leaching from natural deposits; seawater influence
<b>Color</b> (Units)	2006	15	NS	1.1	ND–26	2	1–4	ND	ND	No	Naturally-occurring organic materials
<b>Corrosivity</b> (Units)	2006	Non-corrosive	NS	NA	NA	0.19	0.04–0.30	0.51	0.03–0.28	No	Natural or industrially-influenced balance of hydrogen, carbon and oxygen in the water; affected by temperature and other factors
<b>Odor–Threshold</b> (Units)	2006	3	NS	NA	NA	2	2	ND	ND	No	Naturally-occurring organic materials
<b>Specific Conductance</b> (µS/cm)	2006	1,600	NS	NA	NA	595	482–829	328	235–536	No	Substances that form ions when in water; seawater influence
<b>Sulfate</b> (ppm)	2006	500	NS	NA	NA	116	78–162	36.1	NA	No	Runoff/leaching from natural deposits; industrial wastes
<b>Total Dissolved Solids</b> (ppm)	2006	1,000	NS	NA	NA	344	270–481	167	135–194	No	Runoff/leaching from natural deposits
<b>Turbidity</b> (Units)	2006	5	NS	0.02	ND–0.192	0.06	0.05–0.07	0.04	0.03–0.06	No	Soil runoff

UNREGULATED SUBSTANCES		Walnut Valley Water District		MWD		TVMWD			
SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	AMOUNT DETECTED	RANGE LOW-HIGH	AMOUNT DETECTED	RANGE LOW-HIGH	AMOUNT DETECTED	RANGE LOW-HIGH	TYPICAL SOURCE	
<b>Boron</b> (ppb)	2006	NA	NA	130	100–150	192	167–217	Runoff/leaching from natural deposits; industrial wastes	
<b>N-Nitrosodimethylamine (NDMA)</b> (ppt)	2006	NA	NA	ND	ND–2.0	NA	NA	By-product of drinking water chlorination; industrial process	
<b>Total Hardness</b> (ppm)	2006	NA	NA	140	114–189	75	58–103.8	Naturally occurring	
<b>Total Hardness</b> (grains/gal)	2006	NA	NA	8.2	6.7–11.1	4.4	3.4–6.1	Naturally occurring	
<b>Sodium</b> (ppm)	2006	NA	NA	62	48–91	29.4	NA	Naturally occurring	
<b>Vanadium</b> (ppb)	2006	NA	NA	ND	ND–3.4	ND	ND	Naturally occurring; industrial waste discharge	