cryptosporidium oocyst was detected in one monthly sample of Mills Plant influent that was equivalent to 10 oocysts/100 liters. It was not detected in the treated water.

Sometimes water agencies monitor unregulated contaminants. Unregulated contaminant monitoring helps the USEPA and the California Department of Health Services to determine where certain contaminants occur and whether the contaminants need to be regulated. The following are unregulated contaminants that Western monitors.

Perchlorate salts are used in solid rocket propellants and other industrial applications. Western has not detected *perchlorate* in the finished water supply. Perchlorate can interfere with iodide uptake into the thyroid gland; this can result in a decrease in the production of thyroid hormones, which are needed for prenatal and postnatal growth and development, as well as for normal body metabolism.

Western has detected *radon* in the finished Mockingbird water supply. There is no federal regulation for radon levels in drinking water. Radon is a naturally occurring radioactive gas that you cannot see, taste or smell that's found throughout the U. S. Radon can move up through the ground and into a home through cracks and holes in the foundation. Radon can build up to high levels in all types of homes. Radon can also get into indoor air when released from tap water when showering, washing dishes and other household activities. Compared to radon entering the home through soil, radon entering the home through tap water will, in most cases, be a small source of radon in indoor air. Radon is a known human carcinogen. Breathing air containing radon can lead to lung cancer. Drinking water containing radon may also cause increased risk of stomach cancer. If you're concerned about radon in your home, test the air in your home. Testing is inexpensive and easy. Fix your home if the level of radon in your air is 4 picoCuries per liter of air (pCi/L) or higher. There are simple ways to fix a radon problem that aren't too costly. For additional information, contact your State radon program at 800.745.7236 or the EPA's Radon Hotline 800-SOS-RADON.

A Word About Water Treatment
In many parts of the world today, people are suffering from cholera, dysentery and typhoid – diseases that have been essentially eliminated in this country, thanks to progress in water treatment. A key step in the treatment process is disinfection. Without disinfection, water would not be safe to drink.

In order to disinfect your water, the water delivered to your tap by Western from the Mills Filtration Plant has been through a complex filtering process. It's then disinfected with chloramines. Chloramines are a combination of chlorine and ammonia. While the addition of chloramines to the water supply ensures its safety against water-borne disease, it can contribute to "disinfection by-products" in the water. Disinfection by-products are formed when disinfectants react with naturally occurring organic matter in the source water. To reduce these disinfection by-products, the Metropolitan Water District uses ozone as the primary disinfectant in its Mills Filtration Plant. The Mockingbird water supply is disinfected by the City of Riverside with chlorine.

For Fish Aquarium Owners
If you own an aquarium or have a fishpond, check with the staff at your local tropical fish store for information on which special water treatment is best for your aquarium and your fish in order to remove chloramines from the water.

For Kidney Dialysis Patients
Chloramines are used to disinfect the water to ensure its purity. However, individuals on kidney dialysis machines will need to take steps to remove chloramines from the water before it is used. For dialysis patients, the doctor or dialysis technician in charge can ensure that the dialysis equipment is adequate and proper tests are made prior to use.

Source Water Assessment
A Source Water Assessment lists possible contaminants that might affect the quality of your water sources. An assessment of the drinking water sources for the City of Riverside (Mockingbird) was completed in August 2000 for the North Orange Well Field. Results show wells in the North Orange area are most vulnerable to septic systems. The City of Riverside adopted an ordinance preventing installation of new septic systems in the area. The City of Riverside also cleaned up a composting site and seized the composting near the North Orange Well Field. An assessment for the Bunker Hill Basin was completed in October 2002. For the Bunker Hill Basin, the responsible parties are cleaning up TCE and perchlorate contamination plumes. In December 2002, the Metropolitan Water District of Southern California completed its source water assessment of its State Water Project supply (Mills). State Water Project supplies are considered to be most vulnerable to urban/storm water runoff, wildlife, agriculture, recreation and wastewater. Copies of the assessments are available at Western Municipal Water District. Please contact Brenda Meyer at 909.789.5077 or via email at bmeyer@wmwd.com for further assistance.

Water Quality Table Table - Mills Source — Western Municipal Water District • 2003

Primary Drinking Water Standards - Mandatory Health Related Standards	Units of Measure	State MCL [MRDL]	State PHG [MRDLG]	Mills Range	Mills Average	Major Source of Contaminant
Clarity						
System Turbidity (a)*	NTU	0.5	NS	ND - 0.35	ND	Soil runoff
Organic Chemicals						
Dibromochloropropane (DBCP)	ppt	200	1.7	ND	ND	Runoff and leaching from (a banned) soil fumigant
Volatile Organic Compounds						
Methyl-tert-butyl-ether (MTBE) (b)	ppb	13	13	ND - 1	1	Leakage from gasoline tanks and pipelines
Trichloroethylene (TCE)	ppb	5	0.8	ND	ND	Discharge from metal degreasing sites
Inorganic Chemicals						
Arsenic	ppb	50	NS	ND	ND	Erosion of natural deposits
Copper (c)*	ppm	1.3 (AL)	0.17	0.02 - 0.33	0.20	Internal corrosion of household pipes
Fluoride	ppm	2	1	ND	ND	Erosion of natural deposits
Lead (c)*	ppb	15 (AL)	2	ND - 73	ND	Internal corrosion of household plumbing system
Nitrate (as Nitrogen)	ppm	10	10	ND - 1.3	0.7	Runoff and leaching from fertilizer use
Radionuclides (d)						
Gross Alpha	pCi/L	15	NS	ND - 3.07	1.81	Erosion of natural deposits
Gross Beta	pCi/L	50	NS	ND	ND	Decay of natural and man-made deposits
Radium	pCi/L	5	NS	ND	ND	Erosion of natural deposits
Radon-222	pCi/L	NS	NS	ND	ND	Erosion of natural deposits
Uranium	pCi/L	20	0.5	ND	ND	Erosion of natural deposits
Secondary Standards - Aesthetic Standards						
Chloride	ppm	500	NS	47 - 114	70	Runoff/leaching from natural deposits
Color*	units	15	NS	ND - 3.0	ND	Naturally occurring; organic materials
Corrosivity	SI	NC	NS	-0.03 - 0.14	0.07	Elemental balance on water; affected by temp, other factors
Odor Threshold*	units	3	NS	ND - 2.0	ND	Naturally occurring; organic materials
Specific Conductance	(µmho/cm)	1600	NS	361 - 660	476	Substances that form ions when in water
Sulfate	ppm	500	NS	34 - 91	48	Naturally occurring
Total Dissolved Solids	ppm	1000	NS	199 - 366	261	Runoff/leaching from natural deposits
Disinfection By-products, Disinfectant Residuals & Disinfection By-product Precursors						
Haloacetic Acids (HAA)*	ppb	60	NS	ND - 47	22	By-product of drinking water disinfection
Total Chlorine Residual (Chloramine)*	ppm	[4]	[4]	0.3 - 3.27	2.0	Drinking water disinfectant added for treatment
Total Organic Carbon (TOC)	ppm	TT	NS	1.6 - 3.1	2.1	Various natural and man-made sources
Trihalomethanes (TTHM)*	ppb	80	NS	3.4 - 65	42	By-product of drinking water chlorination
Additional Monitoring/Other Parameters						
Boron	ppb	NS	1000 (AL)	100 - 180	150	Runoff/leaching from natural deposits; industrial wastes
Chromium VI	ppb	NS	NS	ND	ND	Industrial processes; leaching from stainless steel
Hardness	ppm	N/A	N/A	81 - 122	97	Erosion of natural deposits
Hardness	grains/gal	N/A	N/A	4.7 - 7.1	5.7	Unit of measure used in water softening
Perchlorate (e)*	ppb	NS	4 (AL)	ND	ND	Industrial waste discharge
Sodium	ppm	N/A	N/A	37 - 82	53	Erosion of natural deposits
Vanadium	ppb	NS	50 (AL)	ND	ND	Erosion of natural deposits

Water Quality Table Table - Mockingbird Source — Western Municipal Water District • 2003

Primary Drinking Water Standards - Mandatory Health Related Standards	Units of Measure	State MCL [MRDL]	State PHG [MRDLG]	Mockingbird Groundwater Range	Mockingbird Groundwater Average
Clarity					
System Turbidity (a)*	NTU	0.5	NS	0.0 - 0.4	0.1
Organic Chemicals					
Dibromochloropropane (DBCP)	ppt	200	1.7	ND - 39	19
Volatile Organic Compounds					
Methyl-tert-butyl-ether (MTBE) (b)	ppb	13	13	ND	ND
Trichloroethylene (TCE)	ppb	5	0.8	ND - 0.5	ND
Inorganic Chemicals					
Arsenic	ppb	50	NS	ND - 4	2
Copper (c)*	ppm	1.3 (AL)	0.17	0.02 - 0.33	0.20
Fluoride	ppm	2	1	0.4 - 0.8	0.6
Lead (c)*	ppb	15 (AL)	2	ND - 73	ND
Nitrate (as NO^3)	ppm	45	45	18 - 26	22
Radionuclides					
Gross Alpha	pCi/L	15	NS	3 - 12	7
Gross Beta	pCi/L	50	NS	ND	ND
Radium	pCi/L	5	NS	ND	ND
Radon-222 (f)	pCi/L	NS	NS	490 - 550	520
Uranium	pCi/L	20	0.5	4 - 11	8
Secondary Standards - Aesthetic Standards					
Chloride	ppm	500	NS	20 - 32	25
Color*	units	15	NS	ND	ND
Corrosivity	SI	NC	NS	0 - 0.26	0.1
Odor Threshold*	units	3	NS	ND - 2	1
Specific Conductance	(µmho/cm)	1600	NS	480 - 610	560
Sulfate	ppm	500	NS	63 - 73	68
Total Dissolved Solids	ppm	1000	NS	280 - 410	333
Disinfection By-products, Disinfectant Residuals & Disinfection By-product Precursors					
Haloacetic Acids (HAA)*	ppb	60	NS	ND - 47	22
Total Chlorine Residual (Chloramine)*	ppm	[4]	[4]	0.3 - 3.27	2.0
Total Organic Carbon (TOC)	ppm	TT	NS	ND - 6.4	0.4
Trihalomethanes (TTHM)*	ppb	80	NS	3.4 - 65	42
Additional Monitoring/Other Parameters					
Boron	ppb	NS	1000 (AL)	ND - 120	115
Chromium VI	ppb	NS	NS	1.5 - 2.5	2.1
Hardness	ppm	N/A	N/A	160 - 240	205
Hardness	grains/gal	N/A	N/A	9.4 - 14.0	12
Perchlorate (e)*	ppb	NS	4 (AL)	ND	ND
Sodium	ppm	N/A	N/A	33 - 46	39
Vanadium	ppb	NS	50 (AL)	5 - 18	12

Terms & Abbreviations You Need to Know

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 U.S. Environmental Protection Agency.

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

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. MRDLs are set by the U.S. Environmental Protection Agency.

Primary Drinking Water Standards (PDWS): 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 health risk. 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 which a water system must follow.

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

Footnotes

AL Regulatory Action Level
MCL Maximum Contaminant Level
MRDL Maximum Residual Disinfectant Level
MRDLG Maximum Residual Disinfectant Level Goal
N/A Not Applicable
NC Non-corrosive
ND None Detected
NS No Standard
NT Testing Not Required
NTU Nephelometric Turbidity Units; a measure of the suspended material in water
PHG Public Health Goal
ppm parts per million
ppb parts per billion
ppt parts per trillion
pCi/L picoCuries per liter
SI Saturation Index
TT Treatment Technique
µmho/cm micromhos per centimeter
units a measure of the relative color or odor in the water
[ ] Brackets refer to MRDL or MRDLG

(a) Turbidity is a measure of the cloudiness of the water. We monitor it because it is a good indicator of water quality. Data shown is from distribution system sampling.

(b) MTBE also has a Secondary Standard with a state MCL of 5 ppb.

(c) For lead/copper testing, the 90th percentile values are shown in the Average column. Forty-three homes were tested; one exceeded the action level for lead (15 ppb) due to in-house plumbing. None exceeded the action level for copper (1.3 ppm). The last three year testing cycle was completed in June 2001.

(d) Radionuclides results are for the 2002/2003 fourth-quarter Radiological Monitoring Program except for Gross Alpha tested 04/19/02.

(e) An Action Level of 4 ppb was set in 2002. In March 2004, the Public Health Goal was set at 6 ppb. The City of Riverside and Metropolitan Water District are aggressively pursuing treatment options with the responsible parties. See "Special Health Information" section.

(f) See "Special Health Information" section.

(*) These constituents were sampled within Western's distribution system; all remaining constituents were sampled at the Metropolitan Water District's Henry J. Mills Filtration Plant for "Mills" and at the City of Riverside Linden distribution reservoir for "Mockingbird".

The 2003 Water Quality Tables
The Water Quality Tables provide you with data on the levels of specific constituents detected in the water supply and how these compare to state standards. In no instance does the water you receive exceed any of these regulatory standards.

WESTERN MUNICIPAL WATER DISTRICT
EXCELLENCE IN WATER RESOURCE MANAGEMENT

Where Does Your Water Come From?

In 2003, Western's customers received their water from two sources. You'll see these two sources identified on the Water Quality Tables as "Mills" and "Mockingbird". Western's main water supply is from the Mills source. Between January and April 2003, Western did acquire a portion of water from the Mockingbird source, water from the Bunker Hill Basin in San Bernardino County and the Riverside Basin in Riverside. Water from these two sources, when being used at the same time, is blended and then provided to our customers.

Mills

The majority of the water Western supplies comes from Northern California via the California Aqueduct. It begins as snowmelt in the Northern Sierra Nevada mountains. Before reaching the Aqueduct, it travels through the Sacramento-San Joaquin Delta, then through 444 miles of the Aqueduct to the Metropolitan Water District's Henry J. Mills Filtration Plant in Riverside. The imported water is treated before delivery by Western to our customers.

Mockingbird

A small amount of Western's water supplies is provided from wells owned by the City of Riverside. This water comes from rain and snowmelt runoff from the San Bernardino Mountains that infiltrates into the ground. It is naturally filtered through the sand and gravel of the Bunker Hill Basin in San Bernardino County and the Riverside Basin (North Orange Well Field) in Riverside.

About This Report

The California Department of Health Services requires this report be distributed to our customers each year. This report is based on requirements supplied by the Department, Division of Drinking Water and Environmental Management, as of January 1, 2004 and data supplied by the Metropolitan Water District of Southern California dated March 4, 2004 and the City of Riverside dated March 2004.

Celebrating 50 Years of Service

Western Municipal Water District was formed by public vote in 1954 to bring supplemental water to western Riverside County. The District is responsible for water resource management including drought-proofing projects and water conservation efforts in a 510-square mile area of western Riverside County. Western originally provided water services to approximately 130,000 residents and supported a booming economy driven by 9,000 acres of local citrus. The District began supplying water to area wholesale agencies in the late 50s, and Western continues a 50-year legacy of leadership in managing groundwater resources as a court-appointed Watermaster. In the 80s, Western pioneered landscape water conservation, opening *Landscapes Southern California Style*℠. Recently, Western has implemented several projects aimed at decreasing our dependence on imported water. Each of these projects is designed to increase Western's water supply reliability. Additionally, the District continues to place a high value on informing customers and regional residents about wise water use.

How You Can Be Involved

Western Municipal Water District is governed by a five-person, publicly elected Board of Directors. The Board meets the first and third Wednesdays of the month at 9:30 am at 450 Alessandro Boulevard in Riverside to consider issues related to the District. You are encouraged to attend. Agendas for upcoming meetings and minutes of previous meetings are available at www.wmwd.com.

For More Information

If you have questions, suggestions or comments about the information contained in this 2003 Water Quality Report, or for additional copies, please contact Brenda Meyer, Civil Engineer, at 909.789.5077 or via email at bmeyer@wmwd.com. If you are a landlord or manage a multi-unit dwelling, please contact us to order as many additional copies of the report as you need to ensure your tenants receive this important information.

Éste informe contiene información muy importante sobre su agua potable. Tradúzcalo o hable con alguien que lo entienda bien. Si desea más información, por favor contacte a Brenda Meyer en Western Municipal Water District, 909.789.5077 or en bmeyer@wmwd.com.

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Thanks to E.S. BABCOCK & SONS, INC. for assistance with photography.

2003 Water Quality Report

A report on the monitoring and results of your Western Municipal Water District drinking water supply in 2003

Western Municipal Water District
PO Box 5286
Riverside, CA 92517-5286

Your 2003 Water Quality Report

The quality of the water you drink

Western Municipal Water District provides water supply, wastewater disposal and water resource management to a 510-square mile District and 600,000 residents in western Riverside County.

Western vigilantly safeguards its water supplies and understands the importance of keeping our customers informed. We prepare this report in compliance with federal law to give you a snapshot of last year's water quality. Included are details about where your water comes from and how it compares to state and federal standards.

In 2003, as in years past, the water delivered to your tap by Western Municipal Water District met all United States Environmental Protection Agency (USEPA) and the California Department of Health Services' drinking water health standards. This means that for all regulated constituents, none were found at levels considered "unsafe".

Continuous Testing Ensures Continuous Quality

Western's water quality staff works with the Metropolitan Water District of Southern California, the California Department of Health Services and independent certified testing laboratories to continuously monitor the quality of the water supplies. Metropolitan, the supplier of most of the water Western serves, has one of the most sophisticated water quality monitoring and treatment programs in the world. It performs continuous daily monitoring and several hundred additional samplings each month. Once the water enters Western's retail delivery system, we perform even more testing, with 67 routine bacteriological samplings and 27 physical samplings taken from 40 different locations each month as well as additional special sampling.

These test results are compared to more than 175 state and federal standards, providing Western's water quality staff with data on the condition of the water supply's purity and aesthetics.

Sources of Water

Last year, Western's customers received their water from two sources. You'll see these two sources identified on the Water Quality Tables as "Mills" and "Mockingbird". Western's main water supply is from the Mills source – the Metropolitan Water District's Henry J. Mills Filtration Plant that treats State Water Project water. Between January and April 2003, Western also received a portion of its water supply from the Mockingbird source. This water comes from the Bunker Hill Basin located in San Bernardino County and the Riverside Basin in Riverside. During the occasions when water from the Bunker Hill and Riverside basins was used, it was blended with Mills water.

The sources of drinking water (both tap and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs and wells. As water travels over the surface of the land or through the ground, it dissolves naturally occurring minerals and, in some cases, radioactive material, and can pick up substances resulting from the presence of animals or from human activity. Contaminants that may be present in source water, due to these activities, include:

- *Microbial contaminants*, such as viruses and bacteria, that may come from sewage treatment plants, septic systems, agriculture, livestock operations and wildlife.
- *Inorganic contaminants*, such as salts and metals, that can be naturally occurring or result from urban storm water 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 storm water 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 storm water runoff and septic systems.
- *Radioactive contaminants*, which can be naturally occurring or be the result of oil and gas production and mining activities.

In order to ensure that tap water is safe to drink, the USEPA and the California Department of Health Services 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.

Special Health Information

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants doesn't necessarily indicate that water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the USEPA Safe Drinking Water Hotline 800.426.4791.

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised 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 available from the USEPA Safe Drinking Water Hotline 800.426.4791.

Cryptosporidium is a microbial pathogen found in surface water throughout the U.S. Although filtration removes *cryptosporidium*, the most commonly used filtration methods cannot guarantee 100 percent removal. Ingestion of *cryptosporidium* may cause cryptosporidiosis, an abdominal infection. Symptoms of infection include nausea, diarrhea and abdominal cramps. Most healthy individuals can overcome the disease within a few weeks. However, immuno-compromised people are at greater risk of developing life-threatening illness. We encourage immuno-compromised individuals to consult their doctor regarding appropriate precautions to take to avoid infection. *Cryptosporidium* must be ingested to cause disease, and it may spread through means other than drinking water. Our monitoring indicates no *cryptosporidium* organisms in the treated water; a single

(Continued Inside)