CITY OF MENLO PARK

SUMMER 2015

CONSUMER CONFIDENCE REPORT

Menlo Park Municipal Water District

Our Drinking Water

The Menlo Park Municipal Water District is committed to providing its customers with a safe and reliable supply of high-quality drinking water that meets Federal and State standards. Each year MPMWD provides a summary of the water quality sampling results and other information through an Annual Water Quality Report. This report was prepared in accordance with the Federal Safe Drinking Water Act and the California State Water Resources Control Board's Division of Drinking Water requirements.

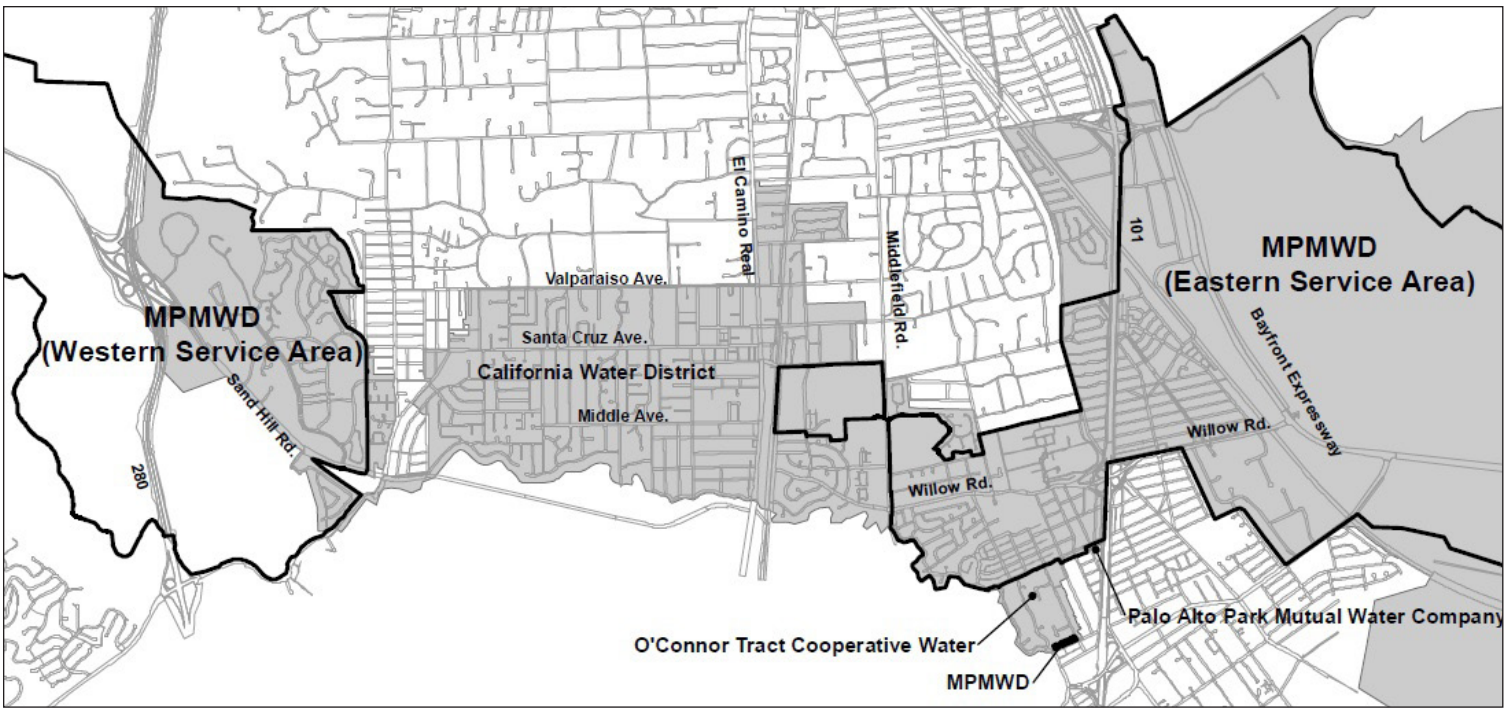
THE HETCH HETCHY SYSTEM - OUR DRINKING WATER SOURCES AND TREATMENT

MPMWD purchases all of its water from the San Francisco Public Utilities Commission. SFPUC's San Francisco Regional Water System water originates from spring snowmelt flowing down the Tuolumne River to storage in the Hetch Hetchy Reservoir. This pristine, well protected Sierra water source is exempt from filtration requirements by the United States Environmental Protection Agency and State Water Resources Control Board's Division of Drinking Water. Water treatments provided by the SFRWS, including disinfection by ultraviolet light and chlorine, corrosion control by adjustment of the water pH value, fluoridation for dental health protection, and chloramination for maintaining disinfectant residual and minimizing disinfection byproduct formation, are in place to meet the drinking water regulatory requirements.

The Hetch Hetchy water is supplemented with surface water from two local watersheds. Rainfall and runoff from the 35,000-acre Alameda Watershed in Alameda and Santa Clara counties are collected in the Calaveras and San Antonio reservoirs for filtration and disinfection at the Sunol Valley Water Treatment Plant. Rainfall and runoff from the 23,000-acre Peninsula Watershed in San Mateo County are stored in the Crystal Springs, San Andreas and Pilarcitos reservoirs, and are filtered and disinfected at the Harry Tracy Water Treatment Plant. As in the past, the Hetch Hetchy Watershed provided the majority of our total water supply, with the remainder contributed by the two local watersheds in 2014.

MENLO PARK MUNICIPAL WATER DISTRICT

In 2014, MPMWD supplied an average of 2.82 million gallons of water per day to more than 16,000 residents through two service areas; the eastern service area and the western service area. The eastern service area is located east of El Camino Real and the western service area is located in the Sharon Heights area. There are three other water agencies that provide water to residents and businesses within the City of Menlo Park: California Water Service Bear Gulch District, O'Connor Tract Cooperative Water District, and Palo Alto Park Mutual Water Company.



CONTAMINANTS AND REGULATIONS

Contaminants that may be present in source water include:

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

More information about contaminants and potential health effects can be obtained by calling the USEPA's Safe Drinking Water hotline at 800-426-4791.

PROTECTING OUR WATERSHEDS

The SFPUC's annual Hetch Hetchy Watershed Sanitary Survey evaluates the sanitary conditions, water quality, potential contamination sources, and the results of watershed management activities with partner agencies including the National Park Service and US Forest Service. The SFPUC also conducts sanitary surveys every five years to detect and track sanitary concerns for the local watersheds and the approved standby water sources in the Early Intake Watershed, which includes Cherry Lake and Lake Eleanor. The latest five-year surveys were completed in 2011 for the period of 2006-2010. These surveys identified wildlife, stock, and human activities as potential contamination sources. Reports are available for review at the San Francisco District office of State Water Resources Control Board, or by calling 510-620-3474.

WATER QUALITY

The SFPUC's Water Quality Division regularly collects and tests water samples from reservoirs and designated sampling points throughout the system to ensure the water delivered to you meets or exceeds federal and state drinking water standards. In 2014, SFPUC staff conducted more than 52,000 drinking water tests in the transmission and distribution systems. This is in addition to the extensive treatment process control monitoring performed by the SFPUC's certified operators and online instruments.

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. Such substances are called contaminants.

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

KEY WATER QUALITY TERMS

Following are definitions of key terms referring to standards and goals of water quality noted on the included data table.

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 Environmental Protection Agency.

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 USEPA.

Maximum Contaminant Level

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

DROUGHT UPDATE

On April 1, 2015, the Governor signed Executive Order B-29-15 directing the State Water Board to impose restrictions to achieve an aggregate statewide 25 percent reduction in potable urban water use through February 2016. The State Water Board adopted conservation tiers for each urban water supplier, and MPMWD as a whole is required to conserve 16 percent from 2013 water use levels.

WATER REGULATIONS CURRENTLY IN PLACE:

- Potable water to irrigate outdoor ornamental landscapes or turf shall be limited to the following two days per week schedule.
  - Odd or No Address – Mondays and Thursdays
  - Even Address – Tuesdays and Fridays
- Water customers may be granted an exception to the two days per week schedule upon review and approval of a Drought Response Plan that demonstrates an equivalent or greater reduction in water use.
- Irrigation of outdoor ornamental landscapes or turf is not allowed between 8 a.m. - 6 p.m..
- Must not use potable water on outdoor landscapes that causes runoff.
- Hoses must be fitted with an automatic shut-off nozzle for washing vehicles, sidewalks, driveways, walkways or buildings.
- Must not apply potable water to any driveway or sidewalk except to address immediate health or safety concerns.
- Pools, spas, and hot tubs shall be covered when not in use.
- Cannot use potable water in a decorative feature, unless the water recirculates.
- Must repair defective/broken plumbing and irrigation systems within a reasonable time period.
- Potable water shall not be used to water outdoor landscapes during and within 48 hours after measurable rainfall.
- Restaurants must serve water only upon request.

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

Maximum Residual Disinfectant Level Goal
The level of a drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of the use of disinfectants to control microbial contaminants.

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

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

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

Turbidity
A water clarity indicator that measures cloudiness of the water, and is also used to indicate the effectiveness of the filtration system. High turbidity can hinder the effectiveness of disinfectants.

Cryptosporidium is a parasitic microbe found in most surface water. The SFPUC regularly tests for this waterborne pathogen, and found it at very low levels in source water and treated water in 2014. However, current test methods approved by the USEPA do not distinguish between dead organisms and those capable of causing disease. Ingestion of Cryptosporidium may produce symptoms of nausea, abdominal cramps, diarrhea and associated headaches. Cryptosporidium must be ingested to cause disease, and it may be spread through means other than drinking water.

MPMWD WATER QUALITY DATA FOR YEAR 2014

The included date table below lists all 2014 detected drinking water contaminants and the information about their typical sources. Contaminants below detection limits for reporting are not shown, in accord with regulatory guidance. The SFRWS received from the SWRCB a monitoring waiver for some contaminants such that their monitoring frequencies are less than annual.

REDUCING LEAD FROM PLUMBING FIXTURES

Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. There are no known lead service lines in the SFRWS. We are responsible for providing high quality drinking water, but

cannot control the variety of materials used in plumbing components. It is possible that lead levels at your home may be higher than at others because of plumbing materials used in your property.

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Infants and young children are typically more vulnerable to lead in drinking water than the general population. When your water has been sitting for several hours, you can minimize he 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 levels in your water, you may wish to have your water tested. Additional information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the USEPA's Safe Drinking Water hotline at 800-426-4791, or at epa.gov/safewater/lead.

SPECIAL HEALTH NEEDS

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons, such as those with cancer undergoing chemotherapy, persons who have undergone organ transplants, people with acquired immune deficiency syndrome or other immune system disorders, some elderly people 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 guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants are available from the USEPA's Safe Drinking Water hotline 800-426-4791 or at epa.gov/safewater.

FLUORIDATION AND DENTAL FLUOROSIS

Mandated by State law, water fluoridation is a widely accepted practice proven to be safe and effective for preventing and controlling tooth decay. Our water has been fluoridated at 0.9 milligram per liter until May 2015, when the new State regulatory guidance was issued. The water is now fluoridated at a new optimal level of 0.7 mg/L. Infants fed formula mixed with water containing fluoride at this level may have an increased chance of developing tiny white lines or streaks in their teeth. These marks are referred to as mild to very mild fluorosis, and are often only visible under a microscope. Even in cases where the marks are visible, they do not pose any health risk. The Centers for Disease Control and Prevention considers it safe to use optimally fluoridated water for preparing infant formula. To lessen this chance of dental fluorosis, you may choose to use low-fluoride bottled water to prepare infant formula. Nevertheless, children may still develop dental fluorosis due to fluoride intake from other sources such as food, toothpaste and dental products. Contact your health provider or SWRCB if you have concerns about dental fluorosis. For additional information visit the SWRCB website www.swrcb.ca.gov and search for fluoride, or the Centers for Disease Control and Prevention website cdc.gov/fluoridation.

WATER CONSERVATION PROGRAMS & INCENTIVES

These water conservation programs and incentives can help MPMWD customers save water. For more information, call 650-330-6750 or visit menlopark.org/waterconservation.

- High-efficiency washer rebates ($125 rebate)
- High-efficiency toilet rebates (up to $100 per toilet)
- Lawn Be Gone rebate program ($2 per sq. ft. rebate)
- Conserve-A-Scape landscape design assistance program
- FREE high efficiency showerheads
- FREE kitchen and bathroom faucet aerators
- FREE hose nozzles
- FREE toilet leak detection tablets

SFPUC OPERATIONAL ERROR – MARCH 2015

On March 3, 2015, SFPUC accidentally left a valve open allowing a limited amount of untreated water from the SFPUC's San Antonio Reservoir in the East Bay to enter into the treated San Francisco Regional Water System, and to subsequently enter MPMWD. The untreated water was blended with already treated water before reaching any customers, providing some disinfection treatment. The SFPUC is conducting a thorough investigation and will work with its regulatory agency, the SWRCB Division of Drinking Water, and its wholesale customers, including MPMWD, to prevent any future occurrences. Several agencies, including MPMWD, mailed information regarding this incident to their water customers in late-March 2015.

EMERGENCY WATER SUPPLY PROJECT - UPDATE

The MPMWD has two reservoirs in the western service area for emergency storage; however the eastern service area does not have emergency storage or a dedicated secondary water supply. In May 2009, the City Council completed a feasibility study for the eastern service area which stated that multiple wells could provide about 3,000 gpm (gallons per minute) to meet average-day potable water needs.

In January 2013, the City Council authorized design of the first emergency well to be constructed at the City's Corporation Yard located at 333 Burgess Drive.

URBAN WATER MANAGEMENT PLAN - MANAGING OUR WATER WISELY

In July 2015, MPMWD will begin developing the 2015 Urban Water Management Plan, which is required by the California Water Code to analyze water supplies and demands 20 years into the future. The plan will discuss current and planned water sources, future demands, water supply reliability and water shortage contingency plans. The last UWMP was completed in 2010, and it must be updated every five years. The plan must be adopted by City Council before July 2017. For more information, visit menlopark.org/watermanagementplan.

WATER MASTER PLAN

The MPMWD is in the process of developing a Water System Master Plan (WSMP) that will provide a comprehensive evaluation of our water distribution system. The WSMP will enable the MPMWD to strategize its planning and budgeting efforts in order to maintain a high level of distribution reliability and efficiency under current water demands, future growth and emergency situations. It will establish a 25-year capital improvement program, identify water system improvement projects required to maintain a high level of service, recommend prioritization of the projects and schedules, and evaluate water reuse alternatives such as gray water and recycled water use.

DETECTED CONTAMINANTS	UNIT	MCL	PHG OR (MCLG)	RANGE OR LEVEL FOUND	"AVERAGE OR [MAX]"	MAJOR SOURCES IN DRINKING WATER
TURBIDITY						
Unfiltered Hetch Hetchy Water	NTU	5	N/A	0.2 - 0.6 (2)	[2.8]	Soil runoff
Filtered Water from Sunol Valley Water Treatment Plant (SVWTP)	NTU -	1[3] "Min 95% of samples ≤ 0.3 NTU [3]"	N/A N/A	- 97% - 100%	[0.98] -	Soil runoff Soil runoff
Filtered Water from Harry Tracy Water Treatment Plant (HTWTP)	NTU -	1[3] "Min 95% of samples ≤ 0.3 NTU [3]"	N/A N/A	- 100%	[0.07] -	Soil runoff Soil runoff
DISINFECTION BYPRODUCTS AND PRECURSOR						
Total Trihalomethanes	ppb	80	N/A	34.7 - 50.9	43.17[4]	Byproduct of drinking water disinfection
Haloacetic Acids	ppb	60	N/A	41.8 - 48.7	44.73[4]	Byproduct of drinking water disinfection
Total Organic Carbon[5]	ppm	TT	N/A	1.3 - 2.8	1.9	Various natural and man-made sources
MICROBIOLOGICAL						
Total Coliform	-	"NoP ≤ 5.0% of monthly samples"	(0)	-	0%	Naturally present in the environment
Giardia lamblia	cyst/L	TT	(0)	<0.01 - 0.04	<0.01	Naturally present in the environment
INORGANICS						
Fluoride (source water) [6]	ppm	2.0	1	ND - 0.8	0.4[7]	Erosion of natural deposits; water additive to promote strong teeth
Chloramine (as chlorine)	ppm	MRDL = 4.0	MRDLG = 4	1.6 - 2.8	2.25[8]	Drinking water disinfectant added for treatment

CONSTITUENTS WITH SECONDARY STANDARDS	UNIT	SMCL	PHG	RANGE	AVERAGE	MAJOR SOURCES OF CONTAMINANT
Chloride	ppm	500	N/A	<3 - 15	9	Runoff / leaching from natural deposits
Odor Threshold	TON	3	N/A	ND - 1	ND	Naturally-occurring organic materials
Specific Conductance	µS/cm	1600	N/A	32 - 222	151	Substances that form ions when in water
Sulfate	ppm	500	N/A	0.9 - 32	17	Runoff / leaching from natural deposits
Total Dissolved Solids	ppm	1000	N/A	31 - 120	81	Runoff / leaching from natural deposits
Turbidity	NTU	5	N/A	0.1 - 0.2	0.1	Soil runoff

LEAD AND COPPER	UNIT	AL	PHG	RANGE	90TH PERCENTILE	MAJOR SOURCES IN DRINKING WATER
Copper	ppb	1300	300	<1.0 - 179[9]	76.9	Internal corrosion of household water plumbing systems
Lead	ppb	15	0.2	<1.0 - 10.5[10]	2	Internal corrosion of household water plumbing systems

CONSTITUENTS WITH SECONDARY STANDARDS	UNIT	ORL	RANGE	AVERAGE
Alkalinity (as CaCO3)	ppm	N/A	8 - 94	37
Bromide[11]	ppb	N/A	ND - 27	5
Calcium (as Ca)	ppm	N/A	3 - 20	11
Chlorate[12]	ppb	800 (NL)	34 - 740	314
Hardness (as CaCO3)	ppm	N/A	7 - 77	46
Magnesium	ppm	N/A	<0.2 - 6.4	3.9
pH	-	N/A	6.9 - 10.2	9.3
Potassium	ppm	N/A	0.2 - 1	0.6
Silica	ppm	N/A	2 - 5	4
Sodium	ppm	N/A	2.4 - 16	10

KEY	
< / ≤	= less than / less than or equal to
AL	= Action Level
Max	= Maximum
Min	= Minimum
N/A	= Not Available
ND	= Non-detect
NL	= Notification Level
NoP	= Number of Coliform-Positive Sample
NTU	= Nephelometric Turbidity Unit
ORL	= Other Regulatory Level
ppb	= part per billion
ppm	= part per million
TON	= Threshold Odor Number
µS/cm	= microSiemens/centimeter

FOOTNOTES:

(1) All results met State and Federal drinking water health standards.
(2) These are monthly average turbidity values measured every 4 hours daily.
(3) There is no turbidity MCL for filtered water. The limits are based on the TT requirements for filtration systems.
(4) This is the highest locational running annual average value. (if your system has 4 quarters of locational DBP data obtained under Stage 2 DBPR monitoring)
(5) Total organic carbon is a precursor for disinfection byproduct formation. The TT requirement applies to the filtered water from the SVWTP only.
(6) The SWRCB specifies the fluoride level in the treated water be maintained within a range of 0.8 ppm - 1.5 ppm. In 2014, the range and average of the fluoride levels were 0.6 ppm - 1.2 ppm and 0.9 ppm, respectively.
(7) The natural fluoride level in the Hetch Hetchy supply was ND. Elevated fluoride levels in the SVWTP and HTWTP raw water are attributed to the transfer of fluoridated Hetch Hetchy water into the reservoirs.
(8) This is the highest running annual average value.
(9) The most recent Lead and Copper Rule monitoring was in 2012. 38 site samples collected at consumer taps had copper concentrations above the AL. (Use only if necessary)
(10) The most recent Lead and Copper Rule monitoring was in 2012. 38 site samples collected at consumer taps had lead concentrations above the AL. (Use only if necessary)
(11) Bromide was detected in HTWTP effluent only. If you do not receive HTWTP water in 2014, you may exclude this contaminant from this table.
(12) The detected chlorate in the treated water is a degradation product of sodium hypochlorite used by the SFPUC for water disinfection.

City of Menlo Park
701 Laurel Street
Menlo Park CA 94025

This annual report contains important information about the quality of your drinking water and our commitment to providing excellence in water quality.

FOR MORE INFORMATION

Water Billing	650-330-0385
Water Hotline	650-330-6750
Water Maintenance	650-330-6780
Water Conservation	650-330-6720

Water District Webpage:
menlopark.org/waterdistrict

Water Conservation Webpage :
menlopark.org/waterconservation

Email:
water@menlopark.org

GET INVOLVED

We invite your input on important water issues. For information about upcoming public meetings, visit menlopark.org/publicmeetings

2015 ANNUAL WATER QUALITY REPORT