2021 Consumer Confidence Report
Asoleado Mutual Water Company
June 24, 2022

We test the drinking water quality for many constituents as required by state and federal regulations. This report shows the results of our monitoring for the period of January 1 to December 31, 2021 and may include earlier monitoring data.

Este informe contiene información muy importante sobre su agua para beber. Favor de comunicarse MCSI Water Systems Management a (831) 659-5360 para asistirlo en español.

Type of Water Source(s) in Use, Name, and General Location: The Asoleado MWC consists of five groundwater wells located off Cachagua Rd in Carmel Valley. Well 03, Well 04, Well 05, Well 06, and Well 07.

Drinking Water Source Assessment Information: The Source Water Assessments for Well 03, 04, 05, & 06 were conducted in June 2002. The sources are considered most vulnerable to the following activities not associated with the contaminants: septic systems, low density wells-agricultural irrigation wells. All wells have detected fluoride. Well 06 is over the maximum contaminate level, therefore AMWC proposed a blending procedure. You may request a summary of the assessment by contacting Monterey County Environmental Health Department.

Time and Place of Regularly Scheduled Board Meetings for Public Participation: Third Friday of each month

For More Information, Contact: MCSI Water Systems Management, (831) 659-5360.

Terms Used in This Report

Term	Definition
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 (U.S. 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 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 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 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.
Secondary Drinking Water Standards (SDWS)	MCLs for contaminants that affect taste, odor, or appearance of the drinking water. Contaminants with SDWSs do not affect the health at the MCL levels.
Treatment Technique (TT)	A required process intended to reduce the level of a contaminant in drinking water.
ND	Not detectable at testing limit.
ppm	parts per million or milligrams per liter (mg/L)
ppb	parts per billion or micrograms per liter (µg/L)
ppt	parts per trillion or nanograms per liter (ng/L)
pCi/L	picocuries per liter (a measure of radiation)

Sources of Drinking Water and Contaminants that May Be Present in Source 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.

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

Regulation of Drinking Water and Bottled Water Quality

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

About Your Drinking Water Quality

Tables 1, 2, 3, 4, and 5 list all of the drinking water contaminants that were detected during the most recent sampling for the constituent. The presence of these contaminants in the water does not necessarily indicate that the water poses a health risk. The State Board allows us to monitor for certain contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of the data, though representative of the water quality, are more than one year old. Any violation of an AL, MCL, MRDL, or TT is asterisked. Additional information regarding the violation is provided later in this report.

Table 1. Sampling Results Showing the Detection of Coliform Bacteria

Microbiological Contaminants	Highest No. of Detections	No. of Months in Violation	MCL	MCLG	Typical Source of Bacteria
E. coli	(In the year) 1	**1***	(a)	0	Human and animal fecal waste

(a) Routine and repeat samples are total coliform-positive and either is *E. coli*-positive or system fails to take repeat samples following *E. coli*-positive routine sample or system fails to analyze total coliform-positive repeat sample for *E. coli*.

Table 2. Sampling Results Showing the Detection of Lead and Copper

Lead and Copper	Sample Date	No. of Samples Collected	90th Percentile Level Detected	No. Sites Exceeding AL	AL	PHG	No. of Schools Requesting Lead Sampling	Typical Source of Contaminant
Lead (ppb)	9/2021	5	1.6	0	15	0.2	0	Internal corrosion of household water plumbing systems; discharges from industrial manufacturers; erosion of natural deposits
Copper (ppm)	9/2021	5	0.905	0	1.3	0.3	Not applicable	Internal corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives

Table 3. Sampling Results for Sodium and Hardness

Chemical or Constituent (and reporting units)	Sample Date	Level Detected (AVG)	Range of Detections	MCL	PHG (MCLG)	Typical Source of Contaminant
Sodium (ppm)	2014 - 2021	(91.2)	50 – 141	None	None	Salt present in the water and is generally naturally-occurring
Hardness (ppm)	2014 - 2021	(235)	53 – 351	None	None	Sum of polyvalent cations present in the water, generally magnesium and calcium, and are usually naturally-occurring

Table 4. Detection of Contaminants with a Primary Drinking Water Standard

Chemical or Constituent (and reporting units)	Sample Date	Level Detected (AVG)	Range of Detections	MCL [MRDL]	PHG (MCLG) [MRDLG]	Typical Source of Contaminant
Antimony (ppb)	9/2021	0.6	ND – 0.6	6	1	Discharge from petroleum refineries; fire retardants; ceramics; electronics; solder
Barium (ppm)	9/2021	0.076	ND – 0.076	1	2	Discharge of oil drilling wastes and from metal refineries; erosion of natural deposits
Chromium – Total (ppb)	9/2021	2.0	ND – 2.0	50	(100)	Discharge from steel and pulp mills and chrome plating; erosion of natural deposits
Fluoride (ppm)	2014 - 2021	(1.66)	0.2 – **4.6***	2.0	1	Erosion of natural deposits; water additive that promotes strong teeth; discharge from fertilizer and aluminum factories
Nickel (ppb)	2014 - 2021	(5.7)	ND – 17.9	100	12	Erosion of natural deposits; discharge from metal factories
Nitrate – as N (mg/L)	9/2021	0.6	--	10	10	Runoff and leaching from fertilizer use; leaching from septic tanks and sewage; erosion of natural deposits
Selenium (ppb)	9/2021	1.6	--	50	30	Discharge from petroleum, glass, and metal refineries; erosion of natural deposits; discharge from mines and chemical manufacturers; runoff from livestock lots (feed additive)

Gross Alpha Particle Activity (pCi/L)	2021	(2.13)	ND – 3.48	15	(0)	Erosion of natural deposits

Table 5. Detection of Contaminants with a Secondary Drinking Water Standard

Chemical or Constituent (and reporting units)	Sample Date	Level Detected (AVG)	Range of Detections	SMCL	PHG (MCLG)	Typical Source of Contaminant
Chloride (ppm)	2014 - 2021	(55.2)	33 – 85	500	NA	Runoff/leaching from natural deposits; seawater influence
Color (units)	2014 - 2018	(5.25)	ND - 10	15	NA	Naturally-occurring organic materials
Iron (ppb)	2017 - 2021	(179.33)	ND – **379***	300	NA	Leaching from natural deposits; industrial wastes
Manganese (ppb)	2018 - 2021	(18.33)	ND - 38	50	NA	Leaching from natural deposits
Odor (Units)	2014 - 2021	(1.8)	ND - 3	3	NA	Naturally-occurring organic materials
Specific Conductance (µS/cm)	2014 - 2021	(846.4)	730 – 939	1600	NA	Substances that form ions when in water; seawater influence
Sulfate (ppm)	2014 - 2021	(184.4)	100 – 304	500	NA	Runoff/leaching from natural deposits; industrial wastes
Total Dissolved Solids (ppm)	2014	(544.4)	480 - 591	1000	NA	Runoff/leaching from natural deposits
Turbidity (Units)	2014 - 2021	(0.64)	ND – 2.2	5	NA	Soil runoff

* Secondary MCLs do not have PHGs or MCLGs because secondary MCLs are set to protect the aesthetics of water and PHGs and MCLGs are based on health concerns

Additional General Information on 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 the water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the U.S. EPA's Safe Drinking Water Hotline (1-800-426-4791).

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. U.S. EPA/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 Safe Drinking Water Hotline (1-800-426-4791).

Lead-Specific Language: 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. Asoleado Mutual WC is responsible for providing high quality drinking water, but cannot control the variety of materials used in plumbing components. When your water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap for 30 seconds to 2 minutes before using water for drinking or cooking. If you do so, you may wish to collect the flushed water and reuse it for another beneficial purpose, such as watering plants. 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 (1-800-426-4791) or at http://www.epa.gov/lead.

Summary Information for Operating Under a Variance or Exemption

Variance:

- Well 06 has high fluoride levels – In November 2001, the State issued Asoleado Mutual Water Company a variance to 3.0 ppm for fluoride.
- The 2021 yearly average for fluoride was 1.67 ppm in the distribution system. The water system monitors the blended water for fluoride monthly.

Summary Information for Violation of a MCL, MRDL, AL, TT, or Monitoring and Reporting Requirement

- **E. coli MCL Violation:* The water system had a total coliform and e. coli positive during December 2021. After flushing, chlorination and resampling all repeat samples were negative.
- **Fluoride*: Well 06 is over the MCL. Some people who drink water containing fluoride in excess of the federal MCL of 4 mg/L over many years may get bone disease, including pain and tenderness of the bones. Children who drink water containing fluoride in excess of the state MCL of 2 mg/L may get mottled teeth.
- **Iron* is a secondary drinking water standard contaminant and is set to protect you against unpleasant aesthetic effects such as color, taste, odor, and the staining of plumbing fixtures, and clothing while washing. This is not health (Primary) constituents.

Level 2 Assessment Requirement Due to an *E. coli* MCL Violation

E. coli are bacteria whose presence indicates that the water may be contaminated with human or animal wastes. Human pathogens in these wastes can cause short-term effects, such as diarrhea, cramps, nausea, headaches, or other symptoms. They may pose a greater health risk for infants, young children, the elderly, and people with severely compromised immune systems. We found *E. coli* bacteria, indicating the need to look for potential problems in water treatment or distribution. When this occurs, we are required to conduct assessment(s) identify problems and to correct any problems that were found during these assessments.

We were required to complete a Level 2 assessment because we found *E. coli* in our water system. In addition, we were required to take [3] corrective actions and we completed [3] of these actions. The three actions were flushing, disinfection and resampling. This corrected the problem.