

2021 Consumer Confidence Report

Water System Information

Water System Name: LMR Farmstead Water System

21Report Date: July 15, 2021

Type of Water Source(s) in Use: Two groundwater wells

Name and General Location of Source(s): Well -001 is located just north of the tasting room/office building next to irrigation water storage tank. Well -002 is located on the northwest corner of the property.

Drinking Water Source Assessment Information: See California Waterboards Division of Drinking Water Source Chemical Monitoring data @ <https://sdwis.waterboards.ca.gov/PDWW/>

Time and Place of Regularly Scheduled Board Meetings for Public Participation: N/A

For More Information, Contact: Oakville Pump Service – 707-944-2471

About This Report

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.

Importance of This Report Statement in Five Non-English Languages (Spanish, Mandarin, Tagalog, Vietnamese, and Hmong)

Language in Spanish: Este informe contiene información muy importante sobre su agua para beber. Favor de comunicarse Long Meadow Ranch Water System a 738 Main Street, St. Helena, CA 94574 para asistirlo en español.

Language in Mandarin: 这份报告含有关于您的饮用水的重要讯息。请用以下地址和电话联系 Long Meadow Ranch Water System 以获得中文的帮助: 738 Main Street, St. Helena, CA 94574, 707-963-4555

Language in Tagalog: Ang pag-uulat na ito ay naglalaman ng mahalagang impormasyon tungkol sa inyong inuming tubig. Mangyaring makipag-ugnayan sa Long Meadow Ranch Water System 738 Main Street, St. Helena, CA 94574o tumawag sa 707-963-4555 para matulungan sa wikang Tagalog.

Language in Vietnamese: Báo cáo này chứa thông tin quan trọng về nước uống của bạn. Xin vui lòng liên hệ Long Meadow Ranch Water System tại 738 Main Street, St. Helena, CA 94574 để được hỗ trợ giúp bằng tiếng Việt.

Language in Hmong: Tsab ntawv no muaj cov ntsiab lus tseem ceeb txog koj cov dej haus. Thov hu rau Long Meadow Ranch Water System ntawm 738 Main Street, St. Helena, CA 94574 rau kev pab hauv lus Askiv.

Terms Used in This Report

Term	Definition
Level 1 Assessment	A Level 1 assessment is a study of the water system to identify potential problems and determine (if possible) why total coliform bacteria have been found in our water system.
Level 2 Assessment	A Level 2 assessment is a very detailed study of the water system to identify potential problems and determine (if possible) why an <i>E. coli</i> MCL violation has occurred and/or why total coliform bacteria have been found in our water system on multiple occasions.
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.
Variations and Exemptions	Permissions from the State Water Resources Control Board (State Board) to exceed an MCL or not comply with a treatment technique under certain conditions.
ND	Not detectable at testing limit.
ppm	parts per million or milligrams per liter (mg/L)
ppb	parts per billion or micrograms per liter ($\mu\text{g/L}$)
ppt	parts per trillion or nanograms per liter (ng/L)
ppq	parts per quadrillion or picogram per liter (pg/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**Drinking Water Contaminants Detected**

Tables 1, 2, 3, 4, 5, 6, and 8 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

Complete if bacteria are detected.

Microbiological Contaminants	Highest No. of Detections	No. of Months in Violation	MCL	MCLG	Typical Source of Bacteria
<i>E. coli</i>	(In the year) 0	0	(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 1.A. Compliance with Total Coliform MCL between January 1, 2021 and June 30, 2021 (inclusive)

Microbiological Contaminants	Highest No. of Detections	No. of Months in Violation	MCL	MCLG	Typical Source of Bacteria
Total Coliform Bacteria	(In a month) 0	0	1 positive monthly sample (a)	0	Naturally present in the environment
Fecal Coliform and <i>E. coli</i>	(In the year) 0	0	0	None	Human and animal fecal waste

(a) For systems collecting fewer than 40 samples per month: two or more positively monthly samples is a violation of the total coliform MCL

For violation of the total coliform MCL, include potential adverse health effects, and actions taken by water system to address the violation: [Enter information]

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

Complete if lead or copper is detected in the last sample set.

Lead and Copper	Sample Date	No. of Samples Collected	90 th Percentile Level Detected	No. Sites Exceeding AL	AL	PHG	No. of Schools Requesting Lead Sampling	Typical Source of Contaminant
Lead (ppb)	9/4/19	5	ND	0	15	0.2	Not applicable	Internal corrosion of household water plumbing systems; discharges from industrial manufacturers; erosion of natural deposits
Copper (ppm)	9/4/19	5	0.29	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	Range of Detections	MCL	PHG (MCLG)	Typical Source of Contaminant
Sodium (ppm)	12/18/18	51.5	47-56	None	None	Salt present in the water and is generally naturally occurring
Hardness (ppm)	12/18/18	135	120-150	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	Range of Detections	MCL [MRDL]	PHG (MCLG) [MRDLG]	Typical Source of Contaminant
Arsenic*	8/30/21	18.5	17.0 – 20.0	10		Erosion of natural deposits; runoff from orchards, glass and electronics production wastes
Barium	12/18/18	70	65 - 75	1000		Erosion of natural deposits; discharge of oil drilling wastes and from metal refineries
Fluoride	12/18/18	0.21	0.19- 0.23	2		Water additive that promotes strong teeth; discharge from aluminum factories; erosion of natural deposits
Nitrate	1/27/21	2.8	0.14 – 5.5	45		Erosion of natural deposits; runoff and leaching from fertilizer use; leaching from septic tanks and sewage
Gross Alpha	9/24/20	3.89 pc/L	1.51 – 6.26	15		The total measure of radium in water
Nickel	10/26/18	0.63	0.57 – 0.69	100	12	Erosion of natural deposits; discharge from metal factories

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

Chemical or Constituent (and reporting units)	Sample Date	Level Detected	Range of Detections	SMCL	PHG (MCLG)	Typical Source of Contaminant
Bicarbonate	12/18/18	140 mg/L	0 - 280			Byproduct of the dissolution of carbon dioxide
Chloride	12/18/18	5.65 mg/L	5.6 – 5.7	500 mg/L		Runoff/leaching from natural deposits; seawater influence

Magnesium	12/18/18	16.5 mg/L	15 - 22			Erosion of natural deposits
Specific Conductance	12/18/18	465	460 - 470	1600 uMhos		Substances that form ions when in water; seawater influence
Sulfate	12/18/18	3.90 mg/L	3.3 - 4.5	500 mg/L		Leaching from natural deposits
Total Dissolved Solids	12/18/18	300 mg/L	290 - 310	1000 mg/L		Naturally-occurring organic materials
Zinc	12/18/18	9	0 - 18			Runoff/leaching from natural deposits; industrial wastes
Calcium (ppm)	12/18/18	22.5 mg/L	22 - 23			Runoff/leaching from natural deposits
Total Alkalinity	12/18/18	247 mg/L	235 - 260			The alkaline level of water relates to its ability to neutralize acid. Preferable alkalinity level is 20 - 200 mg/L
pH	12/18/18	7.65	7.6 - 7.7			pH is an indicator of the acid or alkaline condition of water.
Odor	8/6/14	1.5	0 - 3.0	3.0		Naturally-occurring organic materials
Color*	8/6/14	30.00	0 - 60.00	15.00		Naturally-occurring organic materials
Manganese*	12/18/18	34.5	0 - 69	50		Leaching from natural deposits
Turbidity	12/18/18	16.04	0.077 - 32	5 Units		Soil runoff

Table 6. Detection of Unregulated Contaminants

Chemical or Constituent (and reporting units)	Sample Date	Level Detected	Range of Detections	Notification Level	Health Effects
None to report.					

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. LMR Farmstead 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. [Optional: 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 Violation of a MCL, MRDL, AL, TT, or Monitoring and Reporting Requirement

Table 7. Violation of a MCL, MRDL, AL, TT or Monitoring Reporting Requirement

Violation	Explanation	Duration	Actions Taken to Correct Violation	Health Effects Language
Turbidity	Soil Runoff	Since first tested in Sept. of 2013	The water is filtered through a Nextsand filter which removes the turbidity from the distribution system.	Turbidity has no health effects. However high levels of turbidity can interfere with disinfection and provide a medium for microbial growth.
Manganese	Leaching from natural deposits	Since first tested in May, 2012	The water is filtered through a Nextsand filter which removes the Manganese from the distribution system	High exposure to manganese has been associated with toxicity to the nervous system, producing a syndrome that resembles Parkinsonism.
Color	Naturally-occurring organic materials	Since first tested in May of 2012		Color is a result of other constituents and does not directly have any health effects
Arsenic in both wells tested over the Federal MCL of 10. Well 1 at 20 on 8/31/18 and Well 2 at 19 on 9/4/19.	Arsenic in this system is believed to be naturally occurring and from the erosion of natural deposits	High arsenic in the raw well water has been an ongoing problem for this system. An AdEdge arsenic remediation system was installed in 2015 – see Actions Taken.	A new treatment system was brought live in 2015. Arsenic levels have been below the Federal MCL in the distribution system since it was installed. Frequent testing of the distribution system is done on an ongoing basis to ensure levels stay within limits	Some people who drink water containing arsenic in excess of the MCL over many years may experience skin damage or circulatory system problems, and may have an increased risk of skin cancer.

For Water Systems Providing Groundwater as a Source of Drinking Water

Table 8. Sampling Results Showing Fecal Indicator-Positive Groundwater Source Samples

Microbiological Contaminants (complete if fecal-indicator detected)	Total No. of Detections	Sample Dates	MCL [MRDL]	PHG (MCLG) [MRDLG]	Typical Source of Contaminant
<i>E. coli</i>	(In the year) 0	Monthly	0	(0)	Human and animal fecal waste
Enterococci	Not Tested	Not Tested	TT	N/A	Human and animal fecal waste
Coliphage	Not Tested	Not Tested	TT	N/A	Human and animal fecal waste

Summary Information for Fecal Indicator-Positive Groundwater Source Samples, Uncorrected Significant Deficiencies, or Violation of a Groundwater TT

Special Notice of Fecal Indicator-Positive Groundwater Source Sample: n/a

Special Notice for Uncorrected Significant Deficiencies: n/a

Table 9. Violation of Groundwater TT

Violation	Explanation	Duration	Actions Taken to Correct Violation	Health Effects Language
None to report				