## 2021 Consumer Confidence Report

|  |  |  |  |
| --- | --- | --- | --- |
| Water System Name: | **Shadow Acres Mutual Water Company** | Report Date: | May 5, 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 Los Angeles County Public Health Department a (626)430-5386 para asistirlo en español.

## This Report Statement can be obtained, translated into Five Non-English Languages (Spanish, Mandarin, Tagalog, Vietnamese, and Hmong) via the Los Angeles County Department of Public Health.

|  |  |
| --- | --- |
| Type of water source(s) in use:  | Ground-Water and Treated Surface Water as a secondary source of supply |
| Name & general location of source(s):  | Community ground-water well and California Aqueduct water purchased from |
| Antelope Valley East Kern Water Agency (AVEK) |
| Drinking Water Source Assessment information: | Ground-water is vulnerable to nitrates from septic tanks and fertilizer use. |
| Water storage tanks may be vulnerable to contamination. A requirement for increased water storage capacity was noted on the Sanitary Survey and Vulnerability Assessment, performed by the County Public Health Department on 1/29/20. |
| Time and place of regularly scheduled board meetings for public participation: | Board Meetings, held at the wellsite or via |
| video-conference on the second Tuesday of each month, are open to Shareholders and Residents with advance notification.  |
| For more information, contact:  | Jeanne Miller | Phone: | (661) 947-0200 |

|  |
| --- |
| **TERMS USED IN THIS REPORT** |
| **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).**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.**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. | **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.**Regulatory Action Level (AL)**: The concentration of a contaminant which, if exceeded, triggers treatment or other requirements that a water system must follow.**Variances 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.**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 *E. coli* MCL violation has occurred and/or why total coliform bacteria have been found in our water system on multiple occasions.**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) **ppq**: parts per quadrillion or picogram per liter (pg/L)**pCi/L**: picocuries per liter (a measure of radiation) |

**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, 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, storm-water 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.

**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.

**Tables 1, 2, 3, 4, 5, and 6 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**(complete if bacteria detected) | **Highest No. of Detections** | **No. of Months in Violation** | MCL | **MCLG** | **Typical Source of Bacteria** |
| Total Coliform Bacteria(state Total Coliform Rule) | (0) | 0 | 1 positive monthly sample(a) | 0 | Naturally present in the environment |
| Fecal Coliform or *E. coli*(state Total Coliform Rule) | (0) | 0 | A routine sample and a repeat sample are total coliform positive, and one of these is also fecal coliform or *E. coli* positive | 0 | Human and animal fecal waste |
| *E. coli*(federal Revised Total Coliform Rule) | (0) | 0 | (b) | 0 | Human and animal fecal waste |
| (a) Two or more positive monthly samples is a violation of the MCL(b) 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(complete if lead or copper detected in the last sample set) | **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) | 7-15-19 | 5 | 0 | 0 | 15 | 0.2 | Not Applicable | Internal corrosion of household water plumbing systems; erosion of natural deposits |
| Copper (ppm) | 7-15-19 | 5 | 1.07  | 0 | 1.3 | 0.3 | Not Applicable | Internal corrosion of household plumbing systems; erosion of natural deposits. |

|  |
| --- |
| TAble 3 – SAMPLING RESULTS FOR sodium and hardness |
| **Chemical or Constituent** (and reporting units) | **Sample Source** | **LevelDetected** | **Range of Detections** | **MCL** | **PHG(MCLG)** | **Typical Source of Contaminant** |
| Sodium (ppm)Sampled 5-20-20 | AVEKWell #2 | 60117 |  | None | None | Salt present in the water and is generally naturally occurring |
| Hardness (ppm)Sampled 5/20/20 | AVEKWell #2 | 74384 |  | 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 Source** | **LevelDetected** | **Range of Detections** | **MCL[MRDL]** | **PHG(MCLG)[MRDLG]** | **Typical Source of Contaminant** |
| Aluminum ug/L | AVEK | ND | ND | 1000 | 600 | Erosion of natural deposits; residue from some surface water treatment |
| Arsenic ug/LSampled 5/20/20 | Well #2 | 3 |  | 10 | .004 | Erosion from natural deposits; run-off from agriculture or mining |
| Barium ug/LSampled 5/20/20 | AVEKWell #2 | ND12.9 |  | 1000 | 2000 | Discharge from metal refineries; erosion of natural deposits |
| Bromate ug/L | AVEK | 1.7 | 0.8-2.2 | 10 | 0.1 | By-product of drinking water disinfection |
| Chlorine mg/L | AVEK | 1.11 | 1.12-1.09 | 4.0 | 4.0 | By-product of drinking water disinfection |
| Chromium ug/LSampled 5/20/20 | AVEKWell #2 | ND2 |  | 50 | 0.02 | Discharge from manufacturing:Erosion of natural deposits |
| Copper ug/L | AVEK | ND |  | 1000 | 170 | Erosion from natural deposits |
| Fluoride mg/LSampled 5/20/20 | AVEKWell #2 | 0.070.2 |  | 2 | 1 | Erosion of natural deposits; discharge from fertilizer factories |
| Nickel µg/LSampled 5/20/20 | Well #2 | 6 |  | 100 | 12 | Erosion of natural deposits; discharge from metal factories |
| Nitrate (as N) mg/LSampled 5-19-21Sampled 5-19-21 | AVEKWell #2Well #1 | <14.15.1 | 0.854.15.1 | 10 | 10 | Run off or leaching from fertilizer; leaching from septic tanks; erosion of natural deposits |
| Selenium µg/LSampled 5/20/20 | Well #2 | 3 |  | 50 | 30 | Erosion of natural deposits; runoff from livestock lots (feed additive) |
| Total Trihalomethanes ug/L | AVEKSystem | 2420 | 18-45ND-40 | 80 | N/A | By-product of drinking water disinfection |
| Haloacetic Acids ug/LSamples 5-20-20 | AVEKSystem | 4.96 | ND-8.5ND-12 | 60 | N/A | By-product of drinking water disinfection |
| Gross Alpha pCi/LUranium pCi/L | AVEKAVEK | 5.36.0 | ND-9.44.8-6.9 | 1520 | N/A | Erosion of natural deposits |
| **TAble 5 – detection of contaminants with a Secondary Drinking Water Standard**There are no PHGs, MCLGs for these constituents because secondary MCLs are set on the basis of aesthetics. |
| **Chemical or Constituent**(and reporting units) | **Sample Source** | **Level Detected** | **Range of Detections** | **SMCL** | **PHG(MCLG)** | Typical Source of Contaminant |
| Chloride mg/LSampled 5/20/20 | AVEKWell #2 | 59102 |  | 500 | N/A | Run-off/leaching from natural deposits |
| Iron µg/L \*Sampled Quarterly 2021 | Well #2 | 145 | ND-310 | 300 | N/A | Leaching from natural deposits; industrial wastes |
| Manganese µg/L \*Sampled Quarterly 2021 | Well #2 | 10 | ND-30 | 50 | N/A | Leaching from natural deposits; industrial wastes |
| Color unitsSampled 1-13-21 | AVEKWell #2 | <5<5 |  | 15 | N/A | Naturally-occurring organic materials |
| Odor TON Sampled 1/13/21 | AVEKWell #2 | <1<1 |  | 3 | N/A | Naturally-occurring organic materials |
| Sulfate mg/L Sampled 5/20/20 | AVEKWell #2 | 74357 |  | 500 | N/A | Run-off/leaching from natural deposits |
| Total Organic Carbon mg/L | AVEK | 1.8 | 1.3-2.4 | N/A | N/A | Water Treatment Technique; natural sources |
| Specific Conductance umhos | AVEKWell #2 | 4801410 | 470-480 | 1600 | N/A | Substances that for ions when in water |
| Total Dissolved Solids mg/L 5-20-20 | AVEKWell #2 | 280930 |  | 1000 | N/A | Run-off/leaching from natural deposits |
| Turbidity unitsSampled 5/20/20 | AVEKWell #2 | <11.4 | 0.02-0.11 | 5 | N/A | Soil Run-off |
|  Vanadium µg/L Sampled 5/20/20 | Well #2 | 5 |  | 15 | N/A | Leaching from natural deposits; industrial wastes |
| Zinc ug/LSampled 5/20/20 | AVEKWell #2 | 65020 |  | 5000 | N/A | Run-off/leaching from natural deposits; industrial wastes |
| **TAble 6 – detection of UNREGULATED CONTAMINANTS** |
| **Chemical or Constituent**(and reporting units) | **Sample Source** | **Level Detected** | **Range of Detections** | **Notification Level** | **Informational data for Consumers** |
| Calcium mg/LSampled 5/20/20 | AVEKWell #2 | 26101 |  | No Standard | Leaching/erosion from natural deposits |
| Magnesium mg/LSampled 5/20/20 | AVEKWell #2 | 2.332 |  | No Standard | Leaching/erosion from natural deposits |
| Potassium mg/LSampled 5/20/20 | Well #2 | 3 |  | No Standard | Leaching/erosion from natural deposits |
| pH unitsSampled 1/13/21 & 5-19-21 | AVEKWell #2 | 7.27.3 | 7.0-7.57.2-7.39 | No Standard | The acidity or alkalinity of water on a scale on which 7 is neutral, lower = more acid and higher = more alkaline.  |
| Bicarbonate Alkalinity as HCO3 mg/L 5-20-20 | AVEKWell #2 | 120200 |  | No Standard | Aids in neutralizing the acids in water, therefore helping to balance the pH |
| Total Alkalinity mg/LSampled 5/20/20 | AVEKWell #2 | 96170 |  | No Standard | Indicative of the water’s ability to neutralize acid. |
| Aggressiveness Index Sampled 5/30/20 | Well #2 | 11.2 |  | No Standard | Moderately aggressive on the scale |

**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. 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 at the phone number above or at <http://www.epa.gov/lead>.

Although the nitrate levels from our wells tested below 10 mg/L, the water sample from well #1 (used only in emergency situations) tested at 5.1 mg/L therefore we are required to provide the following information to consumers: ***Nitrate in drinking water at levels above 10 mg/L is a health risk for infants of less than six months of age. Such nitrate levels in drinking water can interfere with the capacity of the infant’s blood to carry oxygen, resulting in serious illness; symptoms include shortness of breath and blueness of the skin. Nitrate levels above 10 mg/L may also affect the ability of the blood to carry oxygen in other individuals, such as pregnant women and those with specific enzyme deficiencies. If you are caring for an infant, or you are pregnant, you should ask advice from your health care provider.* Water from well #1 was not used in the distribution system*.***

***\*Iron was detected at levels that exceed the secondary MCL of 300 µg/L. The iron MCL was set to protect you against unpleasant aesthetic effects (e.g., color, taste, and odor) and the staining of plumbing fixtures (e.g., tubs and sinks) and clothing while washing. High iron levels are due to leaching of natural deposits and were likely caused by the well rehabilitation performed in 2020. This process also produced and Manganese levels exceeding the secondary MCL. High levels of manganese in people have been shown to result in adverse effects to the nervous system. Due to the detection of these constituents, we sampled well #2 quarterly in 2021. There was no detection of Iron or Manganese in the most recent sample taken on 3/9/22***

**The water in our distribution system is a blend of AVEK water and ground-water. More information on AVEK’s water can** **be found at** [**https://www.avek.org/2021-annual-water-quality-report-los-angeles-county-system**](https://www.avek.org/2021-annual-water-quality-report-los-angeles-county-system) **The complete laboratory results from our water testing are available for review at the SAMWC office.** Our ground water is blended with AVEK’s treated surface water in the distribution system to ensure that we do not pump over our allotment of ground-water and with the added benefit of reducing the effects of hard water on plumbing fixtures. Our goal is a 50/50 blend. Higher consumer water use causes us to purchase more water from AVEK at higher rates. These higher rates and SCE’s rate increases precipitated the recent rate adjustment, effective May 1, 2022.

Shadow Acres Mutual Water Company delivers water which meets or exceeds public health standards for potable water. Due to the Antelope Valley ground-water adjudication, ground-water management remains a top priority. **Please keep your contact information current with the SAMWC office in case of emergency**. We do not share personal consumer information with any other Agency. Shadow Acres Mutual Water Company has no internet presence therefore your personal information is not subject to compromise.

Property owners shall be responsible for any damage to water meters where water supply is turned on or off at the meter

by anyone other than SAMWC maintenance personnel. Residents are encouraged to install a water supply valve on the

property side of the water meter to turn water on and off to their properties. Do not attempt to shut off your water in the

meter box. **Contact Mark Williams at 661-435-7165 for emergency shut off at the water meter.** After hours emergency

water shut off will be billed to the property owner. The water meter on your property must be accessible to Maintenance

personnel for the bi-monthly meter reading. If the water meter is fenced or walled-in and no access key has been provided

to the Water Company, an additional **$50.00** charge will be assessed to your account, per occurrence, for impeded access.

**The State of California has notified all Agencies that the ongoing drought is expected to worsen. We are all being asked to reduce water consumption. SAMWC is asking that all consumers exercise conservation measures in order to avoid the imposition of water restrictions and penalties by the State or County Authorities. The Antelope Valley Resource Conservation District is offering a “Cash for Grass” incentive for reducing lawn size. Information on their rebate program can be found at: www.avrcd.org,** **via email at avrcd@carcd.org, or by calling 661-942-7306 PLEASE USE WATER RESPONSIBLY**