

**2022 Drinking Water Quality Report
for the
UTAH13056 Deer Springs Ranch Lower Cabins Water System**

The Deer Springs Ranch Owner's Association (DSROA) is pleased to present the Annual Drinking Water Quality Report for the (UTAH13056) Deer Springs Ranch Lower Cabins Water System for the year 2022. This report is designed to inform Deer Springs Ranch lot owners and guests about the quality of the drinking water delivered while at Deer Springs Ranch. Our constant goal is to provide you with a safe and dependable supply of drinking water. DSROA wants you to understand the efforts made to continually improve the water treatment process and protect the ranch's water resources. DSROA is committed to ensuring the quality of the water at the ranch.

The Deer Springs Ranch Lower Cabins water system obtains its water from a groundwater source: specifically, a well drilled in 2003, located in the well field to the Northeast of the ranch house. 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:

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

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. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's (EPA) Safe Drinking Water Hotline at (800) 426-4791.

To ensure that tap water is safe to drink, EPA prescribes regulations which limit the amounts of certain contaminants in water provided by public water systems. Food and Drug Administration (FDA) regulations establish limits for contaminants in bottled water which must provide the same protection for public health. 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. EPA/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 (800) 426-4791.

CONSTITUENT TABLE DEFINITIONS

In the following table you may find terms and abbreviations you might not be familiar with. To help you better understand these terms we've provided the following definitions:

Non-Detects (ND)- Laboratory analysis indicates that the constituent is not present.

ND/Low - High - For water systems that have multiple sources of water, the Utah Division of Drinking Water has given water systems the option of listing the test results of the constituents in one table, instead of multiple tables. To accomplish this, the lowest and highest values detected in the multiple sources are recorded in the same space in the report table.

Parts per million (ppm) or Milligrams per liter (mg/l) - One part per million corresponds to one minute in two years or a single penny in \$10,000.

Parts per billion (ppb) or Micrograms per liter (ug/l) - One part per billion corresponds to one minute in 2,000 years, or a single penny in \$10,000,000.

Parts per trillion (ppt) or Nanograms per liter (nanograms/l) - One part per trillion corresponds to one minute in 2,000,000 years, or a single penny in \$10,000,000,000.

Parts per quadrillion (ppq) or Picograms per liter (picograms/l) - One part per quadrillion corresponds to one minute in 2,000,000,000 years or one penny in \$10,000,000,000,000.

Picocuries per liter (pCi/L)- Picocuries per liter is a measure of the radioactivity in water.

Millirems per year (mrem/yr)- Measure of radiation absorbed by the body.

Million Fibers per Liter (MFL)- Million fibers per liter is a measure of the presence of asbestos fibers that are longer than 10 micrometers.

Nephelometric Turbidity Unit (NTU)- Nephelometric turbidity unit is a measure of the clarity of water. Turbidity more than 5 NTU is just noticeable to the average person.

Action Level (AL)- The concentration of a contaminant which, if exceeded, triggers treatment or other

Maximum Contaminant Level (MCL) - The "Maximum Allowed" (MCL) is the highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.

Maximum Contaminant Level Goal (MCLG) - The "Goal" (MCLG) is the level of a contaminant in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety.

Date - Because of required sampling time frames i.e., yearly, 3 years, 4 years and 6 years, sampling dates may seem outdated.

Waivers (W)- Because some chemicals are not used or stored in areas around drinking water sources, some water systems have been given waivers that exempt them from having to take certain chemical samples, these waivers are also tied to Drinking Water Source Protection Plans.

Source Water Information

Source Water Name	Type Of Water	Source ID
WELL	GW	WS002

TCR Tables

Coliform Bacteria	Year Sampled	+ Sample Count	MCLG	MCL	Violation	Likely Source of Contamination
Coliform Bacteria	2022	1	0	5	N	Naturally present in the environment.

Microbiological Contaminants	Year Sampled	+ Sample Count	MCLG	MCL	Violation	Likely Source of Contamination
E. coli	2022	1	No Goals	None	N	Human and animal fecal waste.

Regulated Contaminants

Inorganic Contaminants	Year Sampled	Lowest Level	Highest Level	MCLG	MCL	Units	Violation	Likely Source of Contamination
Nitrate	2022	0.28	0.28	10	10	ppm	N	Runoff from fertilizer use; leaching from septic tanks; sewage; erosion of natural deposits.
Sulfate	2020	196	196	1000	1000	ppm	N	Erosion of natural deposits; discharge from refineries and factories; runoff from landfills; runoff from cropland.

Violations Table

Level 2 Assessment

Deficiency Type	Deficiency Identified	Deficiency to be corrected	Facility
M008 Individual Home Booster Pump on service connection	06-28-2022	08-07-2022	DS001
M020 Cross Connection exists in water system	06-28-2022	08-07-2022	DS001
V016 End of Tank Drain Line lacks clearance of 12 inches	06-28-2022	08-07-2022	ST001
S013 Well lacks required well seal	06-28-2022	08-07-2022	WS002

Sanitary Survey

Deficiency Type	Deficiency Identified	Deficiency to be corrected	Facility
M008 Individual Home Booster Pump on service connection	10-11-2022	08-07-2022	DS001
M020 Cross Connection exists in water system	10-11-2022	08-07-2022	DS001
V016 End of Tank Drain Line lacks clearance of 12 inches	10-11-2022	08-07-2022	ST001

The Level 2 Assessment was triggered by three (3) Level 1 Assessments within a 12-month rolling period (Two (2) TC+ positive routines and repeats in one month) August 2021, November 2021, and January 2022). A Level 2 Assessment triggers a Sanitary Survey. Because one of the deficiencies requires more than thirty days to complete a Corrective Action Plan was applied for. The Corrective Action Plan was approved which extended the date to 08-01-2023. If the deficiencies are not corrected by 08-01-2023 the State could impose fines of \$10,000 to \$25,000 daily against DSROA. The DSROA water committee is currently working with an engineer to develop a plan to remove the booster pumps from the water system.

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. We 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 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/safewater/lead>.

The Total Coliform Rule requires water systems to meet a stricter limit for coliform bacteria. Coliform bacteria are usually harmless, but their presence in water can be an indication of disease-causing bacteria. Total coliforms are common in the environment and are generally not harmful themselves. The presence of these bacteria is usually a result of a problem with water treatment or the pipes which distribute the water and indicates that the water may have been contaminated with organisms that can cause disease. Symptoms may include diarrhea, cramps, nausea, and possible jaundice, and any associated headaches and fatigue. When coliform bacteria are found, special follow-up tests are done to determine if harmful bacteria are present in the water supply. If this limit is exceeded, the water supplier must notify the public by newspaper, television, or radio. To comply with the stricter regulation, we have increased the average amount of chlorine in the distribution system.

All sources of drinking water are subject to potential contamination by constituents that are naturally occurring or manmade. Those constituents can be microbes, organic or inorganic chemicals, or radioactive materials. All 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 Environmental Protection Agency's Safe Drinking Water Hotline at 1-800-426-4791.

Some people may be more vulnerable to contaminants in drinking water than the general population. Immunocompromised 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 from their health care providers about drinking water.

MCLs are set at very stringent levels. To understand the possible health effects described for many regulated constituents, a person would have to drink 2 liters of water every day at the MCL level for a lifetime to have a one-in-a-million chance of having the described health effect.

EPA/CDC guidelines on appropriate means to lessen the risk of infection by cryptosporidium and other microbiological contaminants are available from the Safe Drinking Water Hotline (800-426-4791).

DSROA wants its members and guests to be informed about the water quality of the ranch. If you want to

learn more, please attend any of the regularly scheduled Deer Springs Ranch Owners Association Board meetings (usually held the second Saturday of the month). If you have questions about this report, please contact the DSROA office, the Ranch Manager, or for more information contact Jeffrey C. Michelsen (DSROA CWO) at (435) 644-8224.