

2010 Consumer Confidence Report

Kirkwood Meadows Public Utility District

June 30, 2011

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 - December 31, 2010.

Este informe contiene información muy importante sobre su agua potable. Tradúzcalo ó hable con alguien que lo entienda bien.

Type of water source(s) in use: *The District's water system consists of four primary supply wells, two water storage tanks with a total capacity of 950,000 gallons and several miles of distribution lines varying in size from two to ten inches in diameter*

Name & location of source(s): *Well #2 is located near the Kirkwood Community Playground, Wells #4 and #5 are located in the East Meadows and Well #3 is located behind the Thimblewood project.*

Drinking Water Source Assessment information: *In Progress*

Time and place of regularly scheduled board meetings for public participation:

The Kirkwood Meadows Public Utility District is governed by a five member, elected Board of Directors. The Board meets every second Thursday of the month in the Community Services Building here in Kirkwood. Your attendance is encouraged. These meetings are televised regularly on Community Channel Nineteen. Agendas and Minutes from Board meetings are regularly posted on the District's Web site, www.kmpud.com.

For more information contact: *Michael Sharp, (209) 258-4444 extension 2 or email us at kmpud@volcano.net*

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 (USEPA).

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 level of a disinfectant added for water treatment that may not be exceeded at the consumer's tap.

Maximum Residual Disinfectant Level Goal (MRDLG): The level of a disinfectant added for water treatment below which there is no known or expected risk to health. MRDLGs are set by the U.S. Environmental Protection Agency.

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.

Variations and Exemptions: Department permission 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 (ug/L)

ppt: parts per trillion or nanograms per liter (ng/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, which 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.

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

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 Department 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.

TABLE 1 - SAMPLING RESULTS SHOWING THE DETECTION OF COLIFORM BACTERIA

Microbiological Contaminants (to be completed only if there was a detection of bacteria)	Highest No. of detections	No. of months in violation	MCL	MCLG	Typical Source of Bacteria
Total Coliform Bacteria	Two	One	More than 1 sample in a month with a detection	0	Naturally present in the environment
Fecal Coliform or <i>E. coli</i>	None	None	A routine sample and a repeat sample detect total coliform and either sample also detects fecal coliform or <i>E. coli</i>	0	Human and animal fecal waste

TABLE 2 - SAMPLING RESULTS SHOWING THE DETECTION OF LEAD AND COPPER

Lead and Copper (to be completed only if there was a detection of lead or copper in the last sample set)	No. of samples collected	90 th percentile level detected	No. sites exceeding AL	AL	PHG	Typical Source of Contaminant
Lead (ppb)	10	<2.5	None	15	2	Internal corrosion of household water plumbing systems; discharges from industrial manufacturers; erosion of natural deposits
Copper (ppm)	10	0.10	None	1.3	0.17	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)	07/29/2008	16.93	5.7-33	none	none	Generally found in ground & surface water
Hardness (ppm)	07/29/2008	49	31-63	none	none	Generally found in ground & surface water

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
Barium	02/04/10	.018		1	2	Discharge of oil drilling wastes and metal refineries; erosion of natural deposits
Chlorine	12/29/04	.6		4.0	4	Drinking water disinfectant added for treatment
Chromium	02/11/10	22		50	100	Discharge from steel and pulp mills and chrome plating; erosion of natural deposits
Mercury	02/11/10	.2		2	1.2	Erosion of natural deposits; discharge from refineries and factories; runoff from landfills and cropland
Nickel	02/11/10	18		100	12	Erosion of natural deposits; discharge from metal factories
Carbon Tetrachloride	02/11/10	5,700	ND – 5700	500	100	Discharge from chemical plants and other industrial activities
Gross Alpha Particle Activity	06/13/06	7.5		15	(0)	Erosion of natural deposits
Uranium	06/13/06	6.5		20	0.43	Erosion of natural deposits
Total Cyanide	08/06/08	.011	.010-.014	150	150	Discharge from steel/metal, plastic and fertilizer factories
Fluoride	07/30/08	.11	.10-.12	2.0	1	Erosion of natural deposits; water assistive which promotes strong teeth; discharge from fertilizer and aluminum 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	MCL	PHG (MCLG)	Typical Source of Contaminant
Manganese	02/11/10	30		50	N/A	Leaching from natural deposits
Zinc	02/11/10	.16		5.0	N/A	Runoff/leaching from natural deposits; industrial wastes
Total Dissolved Solids	07/31/08	122.25	59-160	1000	N/A	Runoff/leaching from natural deposits
Specific Conductance	08/04/08	189	96-260	1600	N/A	Substances that form ions when in water; seawater influence

Sulfate	07/30/08	5.625	1.4-7.5	500	N/A	Runoff/leaching from natural deposits; industrial wastes
Chloride	07/30/08	3.55	1.3-8.9	500	N/A	Runoff/leaching from natural deposits; seawater influence

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 USEPA'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. USEPA/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).

The District provides service to 663 single family residential and condominium accounts, 45 commercial accounts and 178 irrigation accounts.

If you would like any additional information regarding the data included in this report or any other District operation or function please contact me.

Sincerely,

Tom Henie, General Manager