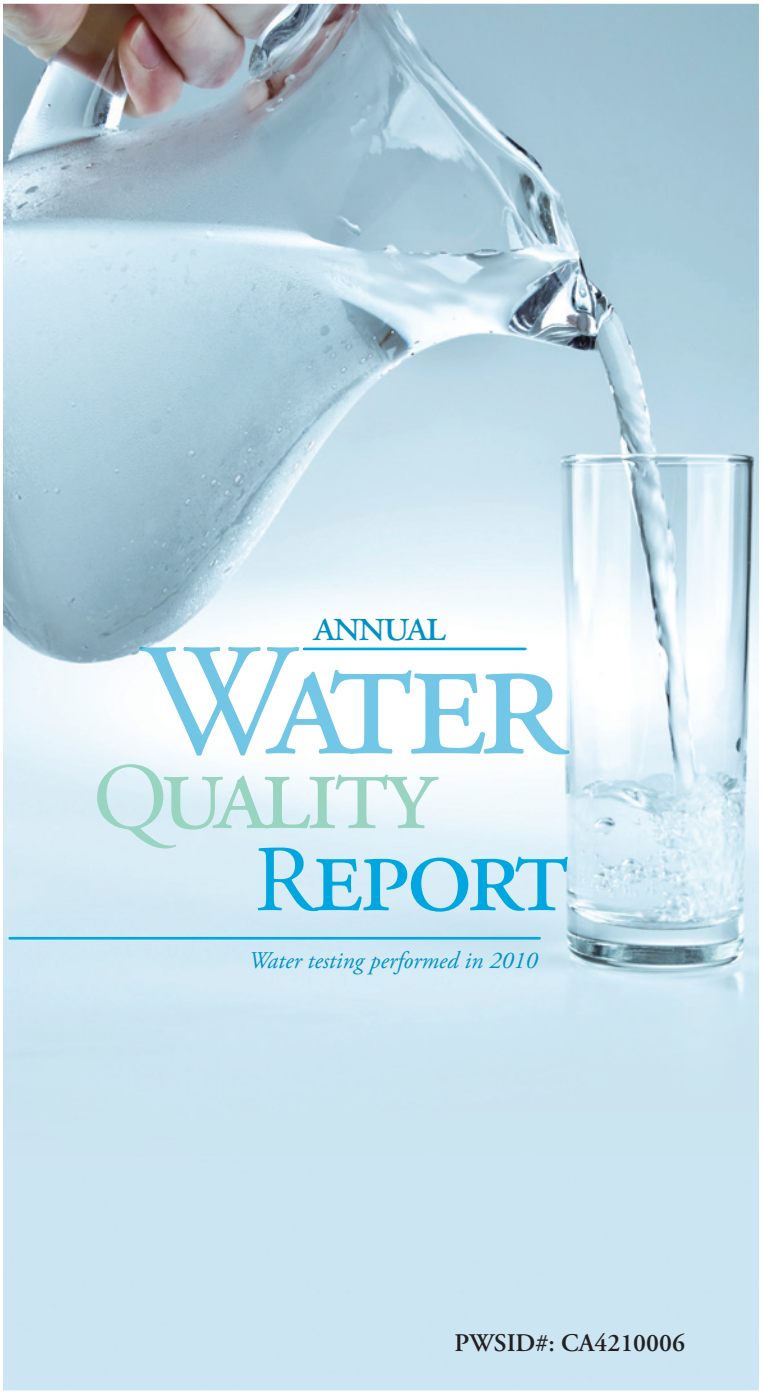

This report was prepared by:
City of Lompoc Water Division
601 East North Avenue
Lompoc, CA 93436

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

Quality First

We are proud to present our annual water quality report covering all testing performed between January 1 and December 31, 2010. We are committed to delivering the best-quality drinking water possible. To that end, we remain vigilant in meeting the challenges of new regulations, source water protection, water conservation, and community outreach and education while continuing to serve the needs of all of our water users. Thank you for allowing us to continue providing you and your family with quality drinking water.

For more information about this report, or for any questions relating to your drinking water, please call Lydia Cardenas, City of Lompoc Water Treatment Plant Chemist, at (805) 736-1617; we are always available to assist you.

Community Participation

Included in the oversight of the Water Division are the City Council and Utility Commission; following is public meeting information.

You are invited to participate in the monthly Utility Commission meetings held on the second Monday of the month, starting at 6pm, at 100 Civic Center Plaza (Lompoc City Hall, Utility Conference Room). Public communications are scheduled at the beginning of the meeting agenda.

Also, the City Council meets the first and third Tuesday of each month, where public communication time is available. Meetings are held at 7pm at 100 Civic Center Plaza, City Hall.

Where Does My Water Come From?

The City of Lompoc's source of supply is from nine groundwater wells. The annual production of clean drinking water for the City was 1.49 billion gallons, or 4.09 million gallons per day.

Some customers in Miguelito Canyon, including Santa Barbara County Miguelito Park, receive treated surface water (Frick Springs). The annual production for Frick Springs was 2.99 million gallons.

Water Treatment Process

The City of Lompoc uses a conventional treatment process to ensure the safety and quality of our drinking water. Our process consists of disinfection, coagulation, flocculation, sedimentation, and filtration. Constructed in 1964, the treatment plant was originally designed to allow filtration of approximately 6 million gallons per day (MGD). With some enhancements and additions of filters, our capability is now approximately 10 MGD.

The City of Lompoc is also responsible for the operation of Frick Springs treatment plant. This plant consists of a small diatomaceous earth (DE) filtration and disinfection system. The water treated at this plant is collected from seven springs located in the upper hills. Frick Springs water treatment plant must comply with the Surface Water Treatment Rule (SWTR).

Substances That Could Be in 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.

In order to ensure that tap water is safe to drink, the U.S. Environmental Protection Agency (U.S. EPA) 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 must provide the same protection for public health. 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.

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 can 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, which are by-products of industrial processes and petroleum production and which can also come from gas stations, urban stormwater runoff, agricultural applications, and septic systems; Radioactive Contaminants, that can be naturally occurring or can be the result of oil and gas production and mining activities.

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

Important Health Information

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 may be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. The U.S. EPA/CDC (Centers for Disease Control and Prevention) guidelines on appropriate means to lessen the risk of infection by *Cryptosporidium* and other microbial contaminants are available from the Safe Drinking Water Hotline at (800) 426-4791 or http://water.epa.gov/drink/hotline.

Lead in Home Plumbing

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 are 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 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 or at www.epa.gov/safewater/lead.

Non-detected Contaminants

The following regulated constituents were NOT DETECTED in the City of Lompoc and Frick Springs drinking water:

(Total) Chromium (ppb) – this result includes Chromium VI and both are Not Detected; Color; Fluoride – our treatment process does not add fluoride; Iron; Mercury [inorganic]; Nitrate [as nitrate]; Odor–Threshold; Perchlorate; and negative results for Fecal coliform and *E. coli* [Federal Ground Water Rule and Total Coliform Rule].

Fact or Fiction

There is the same amount of water on Earth now as there was when the Earth was formed. *(Fact: The water that comes from your faucet could contain molecules that dinosaurs drank!)*

About half the water treated by public water systems is used for drinking and cooking. *(Fiction: Actually, the amount used for cooking and drinking is less than 1% of the total water produced!)*

A person can live about a month without food, but only about a week without water. *(Fact: Dehydration symptoms generally become noticeable after only 2% of one's normal water volume has been lost.)*

The first water pipes in the U.S. were made of cast iron. *(Fiction: The first water pipes were actually made of fire-charred bored logs.)*

The world's first municipal water filtration plant was opened in the United States. *(Fiction: The first plant was actually opened in Paisley, Scotland, in 1832.)*

A person must consume a half-gallon of water daily to live healthily. *(Fact: A person should drink at least 64 ounces, or 8 cups, of water each day.)*

One gallon of gasoline poured into a lake can contaminate approximately 750,000 gallons of water. *(Fact)*

Information on the Internet

The U.S. EPA Office of Water (www.epa.gov/watrhome) and the Centers for Disease Control and Prevention (www.cdc.gov) Web sites provide a substantial amount of information on many issues relating to water resources, water conservation and public health.

Sampling Results

During the past year, we have taken hundreds of water samples in order to determine the presence of any radioactive, biological, inorganic, volatile organic, or synthetic organic contaminants. The table below shows those contaminants that were detected in the water. A complete list is available at City Hall and the Lompoc Public Library.

REGULATED SUBSTANCES

				City of Lompoc		Frick Springs			
SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	MCL [MRDL]	PHG (MCLG) [MRDLG]	AMOUNT DETECTED	RANGE LOW-HIGH	AMOUNT DETECTED	RANGE LOW-HIGH	VIOLATION	TYPICAL SOURCE
Arsenic (ppb)	2010	10	0.004	ND	NA	3	NA	No	Erosion of natural deposits; runoff from orchards; glass and electronics production wastes
Barium (ppm)	2010	1	2	0.0068	NA	0.0869	NA	No	Discharges of oil drilling wastes and from metal refineries; erosion of natural deposits
Cadmium (ppb)	2010	5	0.04	ND	NA	0.4	NA	No	Internal corrosion of galvanized pipes; erosion of natural deposits; discharge from electroplating and industrial chemical factories, and metal refineries; runoff from waste batteries and paints
Chlorine (ppm)	2010	[4.0 (as Cl2)]	[4 (as Cl2)]	1.40 (as Total Cl2)	1.33–1.43	1.5 (as Free Cl2)	1.2–1.8	No	Drinking water disinfectant added for treatment
Nickel (ppb)	2010	100	12	ND	NA	4	NA	No	Erosion of natural deposits; discharge from metal factories
Selenium (ppb)	2010	50	30	ND	NA	6	NA	No	Discharge from petroleum, glass, and metal refineries; erosion of natural deposits; discharge from mines and chemical manufacturers; runoff from livestock lots (feed additive)
TTHMs [Total Trihalomethanes] (ppb)	2010	80	NA	5.2	NA	23.4	NA	No	By-product of drinking water disinfection
Haloacetic Acids (ppb)	2010	60	NA	ND	NA	5	NA	No	By-product of drinking water disinfection
Total Coliform Bacteria [Total Coliform Rule] (% positive samples)	2010	More than 5.0% of monthly samples are positive	(0)	1.37%[1]	NA	ND	NA	No	Naturally present in the environment
Turbidity[2,3] (NTU)	2010	TT	NA	0.19	0.08–0.19	0.13	0.07–0.13	No	Soil runoff

Tap water samples were collected for lead and copper analyses with the cooperation of 36 homeowners throughout the community

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	AL	PHG (MCLG)	CITY OF LOMPOC AMOUNT DETECTED (90TH%TILE)	SITES ABOVE AL/ TOTAL SITES	VIOLATION	TYPICAL SOURCE
Copper (ppm)	2010	1.3	0.3	0.136	0/36	No	Internal corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
Lead (ppb)	2010	15	0.2	2.2	0/36	No	Internal corrosion of household water plumbing systems; discharges from industrial manufacturers; erosion of natural deposits

SECONDARY SUBSTANCES

				City of Lompoc		Frick Springs			
SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	SMCL	PHG (MCLG)	AMOUNT DETECTED	RANGE LOW-HIGH	AMOUNT DETECTED	RANGE LOW-HIGH	VIOLATION	TYPICAL SOURCE
Chloride (ppm)	2010	500	NS	98	85–122	47	NA	No	Runoff/leaching from natural deposits; seawater influence
Corrosivity (Units)	2010	Non-corrosive	NS	Non-corrosive	NA	Non-corrosive	NA	No	Natural or industrially influenced balance of hydrogen, carbon, and oxygen in the water; affected by temperature and other factors
Manganese (ppb)	2010	50	NS	2.5	ND–15.1	ND	NA	No	Leaching from natural deposits
Specific Conductance[3] (µS/cm)	2010	1,600	NS	1,197	1,171–1,237	968	922–1,091	No	Substances that form ions when in water; seawater influence
Sulfate (ppm)	2010	500	NS	407	360–475	66	NA	No	Runoff/leaching from natural deposits; industrial wastes
Total Dissolved Solids (ppm)	2010	1,000	NS	767	686–900	580	NA	No	Runoff/leaching from natural deposits

UNREGULATED AND OTHER SUBSTANCES

		City of Lompoc		Frick Springs		
SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	AMOUNT DETECTED	RANGE LOW-HIGH	AMOUNT DETECTED	RANGE LOW-HIGH	TYPICAL SOURCE
Boron (ppb)	2010	200	NA	ND	NA	The main sources of domestic boron in the environment are laundry products, sewage, agricultural chemicals and fertilizers, coal combustion mining, and glass and ceramics manufacturing
pH[3] (Units)	2010	NA	8.11–8.46	NA	7.24–7.97	Treatment process
Sodium[4] (ppm)	2010	142	116–169	43	NA	Sodium refers to the salt present in the water and is generally naturally occurring
Total Hardness as CaCO3 (ppm)	2010	304	280–328	415	NA	Hardness is the sum of polyvalent cations present in the water, generally magnesium and calcium. The cations are usually naturally occurring
Vanadium (ppb)	2010	ND	NA	16	NA	Naturally occurring; also associated with hazardous wastes sites

[1] One total coliform positive found in May with all successive repeat samples negative.
[2] Turbidity is a measure of the cloudiness of the water. We monitor it because it is a good indicator of water quality. High turbidity can hinder the effectiveness of disinfectants.
[3] Results for pH, specific conductance, and turbidity are from distribution system samples.
[4] Our softening process adds sodium to the drinking water. Consumers on sodium restricted diets may wish to consult with their physicians.

Definitions

AL (Regulatory Action Level): The concentration of a contaminant which, if exceeded, triggers treatment or other requirements that a water system must follow.

µS/cm (microsiemens per centimeter): A unit expressing the amount of electrical conductivity of a solution.

MCL (Maximum Contaminant Level): 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 (SMCLs) are set to protect the odor, taste, and appearance of drinking water.

MCLG (Maximum Contaminant Level Goal): 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. EPA.

MRDL (Maximum Residual Disinfectant Level): 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.

MRDLG (Maximum Residual Disinfectant Level Goal): 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.

NA: Not applicable.

ND (Not detected): Indicates that the substance was not found by laboratory analysis.

NS: No standard.

NTU (Nephelometric Turbidity Units): Measurement of the clarity, or turbidity, of water. Turbidity in excess of 5 NTU is just noticeable to the average person.

PDWS (Primary Drinking Water Standard): MCLs and MRDLs for contaminants that affect health, along with their monitoring and reporting requirements and water treatment requirements.

PHG (Public Health Goal): 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 EPA.

ppb (parts per billion): One part substance per billion parts water (or micrograms per liter).

ppm (parts per million): One part substance per million parts water (or milligrams per liter).

TT (Treatment Technique): A required process intended to reduce the level of a contaminant in drinking water.