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

There When You Need Us

We are once again proud to present our annual water quality report covering all testing performed between January 1 and December 31, 2013. Over the years, we have dedicated ourselves to producing drinking water that meets all state and federal standards. We continually strive to adopt new methods for delivering the best-quality drinking water to you. As new challenges to drinking water safety emerge, we remain vigilant in meeting the goals of source water protection, water conservation, and community education while continuing to serve the needs of all our water users.

Please remember that we are always available to assist you should you ever have any questions or concerns about your water. For more information, visit our website at www.mariettawater.com.

Sincerely,
Tim Marshall

Environmental Compliance Coordinator

Where Does My Water Come From?

Marietta Water purchases water from the Cobb County-Marietta Water Authority (CCMWA), a public utility founded in 1951. The CCMWA treatment facilities are supplied from two separate surface water sources. The James E. Quarles Treatment Facility, built in 1953, withdraws water from the Chattahoochee River. The Quarles plant can treat a maximum of 86 million gallons of water a day. This water is distributed and utilized on the eastern side of Cobb County and Marietta. The Hugh A. Wyckoff Treatment Facility, put online in 1972, withdraws water from Lake Allatoona. Lake Allatoona is a Corps of Engineers impoundment in north Cobb, south Cherokee, and south Bartow counties. This manmade, multiuse lake is part of the Etowah River Basin. The Wyckoff plant can treat a maximum of 72 million gallons of water a day. This water is distributed and utilized on the north and west side of Cobb County and Marietta (http://www.ccmwa.org/).

Substances That Could Be in Water

To ensure that tap water is safe to drink, the U.S. EPA prescribes regulations limiting the amount of certain contaminants in water provided by public water systems. U.S. Food and Drug Administration regulations establish limits for contaminants in bottled water, which 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 these contaminants does not necessarily indicate that the water poses a health risk.

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, in some cases, radioactive material, and substances resulting from the presence of animals or from human activity. Substances 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, or wildlife;**Inorganic Contaminants**, such as salts and metals, which can be naturally occurring or may result from urban stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming; **Pesticides and Herbicides**, which 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 may also come from gas stations, urban stormwater runoff, and septic systems; **Radioactive Contaminants**, which can be naturally occurring or may be the result of oil and gas production and mining activities.

For more information about contaminants and potential health effects, call the U.S. EPA's Safe Drinking Water Hotline at (800) 426-4791.

Community Participation

Marietta Water operates under the supervision of the Board of Lights and Water (BLW). The BLW was created through the State Legislature. There are seven Board Members including: the Mayor (as Chair), a City Council member (appointed by the Mayor), and five other members of the community (appointed by the City Council.)

The board meets the Monday before the second Wednesday of each month. Marietta Water maintains regular operating hours of Monday through Friday, 7:00 am. to 4:00 pm. To reach the service and maintenance department 24 hours a day, please call (770) 794-5230.

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.

Water Main Flushing

Distribution mains (pipes) convey water to homes, businesses, and hydrants in your neighborhood. The water entering distribution mains is of very high quality; however, water quality can deteriorate in areas of the distribution mains over time. Water main flushing is the process of cleaning the interior of water distribution mains by sending a rapid flow of water through the mains.

Flushing maintains water quality in several ways. For example, flushing removes sediments like iron and manganese. Although iron and manganese do not pose health concerns, they can affect the taste, clarity, and color of the water. Additionally, sediments can shield microorganisms from the disinfecting power of chlorine, contributing to the growth of microorganisms within distribution mains. Flushing helps remove stale water and ensures the presence of fresh water with sufficient dissolved oxygen, disinfectant levels, and an acceptable taste and smell.

During flushing operations in your neighborhood, some short-term deterioration of water quality, though uncommon, is possible. You should avoid tap water for household uses at that time. If you do use the tap, allow your cold water to run for a few minutes at full velocity before use and avoid using hot water, to prevent sediment accumulation in your hot water tank.

Tap vs. Bottled

Thanks in part to aggressive marketing, the bottled water industry has successfully convinced us all that water purchased in bottles is a healthier alternative to tap water. However, according to a four-year study conducted by the Natural Resources Defense Council, bottled water is not necessarily cleaner or safer than most tap water. In fact, about 25 percent of bottled water is actually just bottled tap water (40 percent according to government estimates).

The Food and Drug Administration is responsible for regulating bottled water, but these rules allow for less rigorous testing and purity standards than those required by the U.S. EPA for community tap water. For instance, the high mineral content of some bottled waters makes them unsuitable for babies and young children. Further, the FDA completely exempts bottled water that's packaged and sold within the same state, which accounts for about 70 percent of all bottled water sold in the United States.

People spend 10,000 times more per gallon for bottled water than they typically do for tap water. If you get your recommended eight glasses a day from bottled water, you could spend up to $1,400 annually. The same amount of tap water would cost about 49 cents. Even if you installed a filter device on your tap, your annual expenditure would be far less than what you'd pay for bottled water.

For a detailed discussion on the NRDC study results, check out their Web site at www.nrdc.org/water/drinking/bw/exesum.asp.

Source Water Assessment

The CCMWA and the Atlanta Regional Commission completed a source water assessment itemizing potential sources of water pollution to our surface drinking water supplies. This information can help you understand the potential for contamination of your drinking water supplies and can be used to prioritize the need for protecting drinking water sources.

A source water assessment is a study and report that provides the following information: identifies the area of land that contributes the raw water used for drinking water; identifies potential sources of contamination to drinking water supplies; and provides an understanding of the drinking water supply's susceptibility to contamination.

Individual source pollution involves actual facilities, which have contaminants on site that can pose a potential health risk if humans consume those contaminants. Nonpoint source pollution is caused by development and by everyday activities that take place in residential, commercial and rural areas; nonpoint source pollution is carried by rainfall to streams and lakes. After evaluating these sources of pollution, the report found the Chattahoochee watershed susceptibility ranking to be high and the Lake Allatoona watershed susceptibility ranking to be medium.

For more information on this project, visit the source water assessment Web site at http://www.atlantaregional.com/environment/water/source-water-assesment-project, or you can request information by mail from the Environmental Planning Division, Atlanta Regional Commission, 40 Courtland Street NE, Atlanta, GA 30303.

Questions?

For more information about this report, or for any questions relating to your drinking water, please call Tim Marshall, Environmental Compliance Coordinator, at (770) 794-5229.

UCMR3 Sampling

Marietta Water participated in the U.S. Environmental Protection Agency's (EPA) third round of the Unregulated Contaminant Monitoring Rule (UCMR3). Approximately 6,000 utilities nationwide monitored unregulated contaminants for a year to help the EPA determine the occurrence of these contaminants in drinking water and whether or not they need to be regulated for protection of public health. Any UCMR3 detections are shown in the data tables in this report. More information on UCMR3 is available at (http://water.epa.gov/lawsregs/rulesregs/sdwa/ucmr/ucmr3/).

You may not be aware of it, but every time you pour fat, oil, or grease (FOG) down your sink (e.g., bacon grease), you are contributing to a costly problem in the sewer collection system. FOG coats the inner walls of the plumbing in your house as well as the walls of underground piping throughout the community. Over time, these greasy materials build up and form blockages in pipes, which can lead to wastewater backing up into parks, yards, streets, and storm drains. These backups allow FOG to contaminate local waters, including drinking water. Exposure to untreated wastewater is a public health hazard. FOG discharged into septic systems and drain fields can also cause malfunctions, resulting in more frequent tank pump-outs and other expenses.

Communities spend billions of dollars every year to unplug or replace grease-blocked pipes, repair pump stations, and clean up costly and illegal wastewater spills. Here are some tips that you and your family can follow to help maintain a well-run system now and in the future:

NEVER:

- Pour fats, oil, or grease down the house or storm drains.
- Dispose of food scraps by flushing them.
- Use the toilet as a waste basket.

ALWAYS:

- Scrape and collect fat, oil, and grease into a waste container such as an empty coffee can, and dispose of it with your garbage.
- Place food scraps in waste containers or garbage bags for disposal with solid wastes.
- Place a wastebasket in each bathroom for solid wastes like disposable diapers, creams and lotions, and personal hygiene products including nonbiodegradable wipes.

Sampling Results

During the past year, many water samples have been taken in order to determine the presence of any radioactive, biological, inorganic, volatile organic or synthetic organic contaminants. The table below shows only those contaminants that were detected in the water. The state requires us to monitor for certain substances less than once per year because the concentrations of these substances do not change frequently. In these cases, the most recent sample data are included, along with the year in which the sample was taken.

REGULATED SUBSTANCES

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	MCL [MRDL]	MCLG [MRDLG]	AMOUNT DETECTED	RANGE LOW-HIGH	VIOLATION	TYPICAL SOURCE
Chlorine[1] (ppm)	2013	[4]	[4]	2.08	ND–2.08	No	Water additive used to control microbes
Chlorite (ppm)	2013	1.0	0.8	0.41	0.12–0.41	No	By-product of drinking water disinfection
Fluoride (ppm)	2013	4	4	1.10	ND–1.10	No	Erosion of natural deposits; Water additive which promotes strong teeth
Haloacetic Acids [HAA]–Stage 1 (ppb)	2013	60	0	27.0[2]	21.5–46.7	No	By-products of drinking water disinfection
Haloacetic Acids [HAA]–Stage 2 (ppb)	2013	60	0	28.3[3]	16.2–31.0	No	By-products of drinking water disinfection
Nitrate+Nitrite (ppm)	2013	10	10	0.68	0.31–0.68	No	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
TTHMs [Total Trihalomethanes]–Stage 1 (ppb)	2013	80	0	36.0[2]	26.0–50.8	No	By-products of drinking water disinfection
TTHMs [Total Trihalomethanes]–Stage 2 (ppb)	2013	80	0	69.8[3]	28.7–81.1	No	By-products of drinking water disinfection
Total Coliform Bacteria (% positive samples)	2013	5% of monthly samples are positive	0	1.37	NA	No	Naturally present in the environment
Total Organic Carbon (ppm)	2013	TT	NA	1.9	1.2–1.9	No	Naturally present in the environment; Decay of organic matter in the water withdrawn from sources such as lakes and streams.
Turbidity[4] (NTU)	2013	TT=1 NTU	0	0.19	ND–0.19	No	Soil runoff
Turbidity (Lowest monthly percent of samples meeting limit)	2013	TT=95% of samples <0.3 NTU	0	100	NA	No	Soil runoff

Tap water samples were collected for lead and copper analyses from sample sites throughout the community[5]

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	AL	MCLG	AMOUNT DETECTED (90TH%TILE)	SITES ABOVE AL/ TOTAL SITES	VIOLATION	TYPICAL SOURCE
Copper (ppm)	2011	1.3	0	0.027	0/50	No	Corrosion of household plumbing systems; Erosion of natural deposits
Lead (ppb)	2011	15	0	2.5	1/50	No	Corrosion of household plumbing systems; Erosion of natural deposits

UNREGULATED CONTAMINANT MONITORING RULE (UCMR3)

SUBSTANCE (UNIT OF MEASURE)	YEAR SAMPLED	AMOUNT DETECTED	RANGE LOW-HIGH	TYPICAL SOURCE
Chlorate (ppb)	2013	368.563	229.409–368.563	Byproduct of drinking water disinfection
Chromium-6 (ppb)	2013	0.090	0.041–0.090	Naturally occurring in the environment
Strontium (ppb)	2013	36.6029	28.3200–36.6029	Naturally occurring in the environment

[1] Detection limit for chlorine is 0.05 ppm. Disinfection was confirmed by heterotrophic plate count. This is a method that measures total bacteria in a sample. The results were within acceptable limits.
[2] The highest detected RAA (Running Annual Average).
[3] The highest detected LRAA (Locational Running Annual Average).
[4] Turbidity is a measure of the cloudiness of the water. It is monitored because it is a good indicator of water quality. High turbidity can hinder the effectiveness of disinfectants.
[5] The next round of testing is due in 2014.

Definitions

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

MCL (Maximum Contaminant Level): 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.

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 allow for a margin of safety.

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.

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.

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.