City of Plant City

Utilities Department
Divisions: Utilities Operations/Water Resource Management/Utilities Maintenance
plantcitygov.com

2011 Annual Drinking Water Quality Report
January 1, 2011 Through December 31, 2011

A Report On The Quality Of Your Drinking Water

Continuing Our Commitment... The City of Plant City is pleased to present our 14th annual water quality report. This report contains information on drinking water delivered by the City of Plant City, its constituents and health risks associated with any contaminants. We want you to know your drinking water meets all state and federal standards and the Federal Safe Drinking Water (SDWA) requirements for "Consumer Confidence Reports."
Our constant goal is to provide you with a safe and dependable supply of drinking water. To ensure the quality of your drinking water, we are committed to source water protection, water conservation, community education, and service to the needs of all our customers.

En Español: Este reporte Anual de Agua de Calidad de 2011 contiene información importante sobre la calidad de su agua en la communidad.Si usted no entiende la información en este reporte, por favor consiga a alguien que le explique o entreprete lo contenido. Si desea mas información, por favor llame a (813)757-9191, o escriba a este direccion: City of Plant City Utilities Operations, 1500 W. Victoria St., Plant City, FL 33563.

What Is Plant City's Water Source? Our water source is groundwater which is pumped out of the multi-layered Floridan Aquifer beneath the City. The water is withdrawn through the use of four deep wells located within the city limits. Water well depths vary from 746 feet to 1,203 feet. Plant City is also inter-connected with the City of Lakeland's water supply, which is also pumped out of the Floridan Aquifer. The water available through this connection is used when it is needed to supplement either City's supply. During 2011, less than 6,000 gallons of water per day of the total supply was obtained from Lakeland. You can obtain a copy of the City of Lakelands's Water Quality Report by calling their Department of Water Utilities at (863) 834-6568.

Source Water Assessment... In 2011, the Florida Department of Environmental Protection (FDEP) performed a Source Water Assessment on our system. The assessment was conducted to provide information about any potential sources of contamination in the vicinity of our wells. There are (12) potential sources of contamination identified for this system rated as moderate. The results are available on the FDEP web site at dep.state.fl.us/swap, or they can be obtained from the City of Plant City Utilities Operations Division, 1500 W. Victoria Street, Plant City, Florida 33563, or (813) 757-9191.

IMPORTANT CONTACT INFORMATION FOR QUESTIONS REGARDING YOUR WATER SERVICE

UTILITIES OPERATIONS DIVISION . . . . . **(813) 757-9191**
Water quality and the City's Water Reclamation Facility are located at 1500 W. Victoria Street. Please contact us at this number or plantcitygov.com (Utilities Operations Division), if you have questions about your drinking water or information contained in this report.

Questions related to wastewater service and after hours utility emergencies can also be addressed by personnel in the Utilities Operations Division.

UTILITY BILLING CUSTOMER SERVICE . . . . . **(813) 659-4222**
For questions regarding your water bill.

UTILITIES MAINTENANCE DIVISION . . . . . **(813) 757-9288**
To report a water leak in your area during regular business hours.

How Is Our Water Produced? The City of Plant City's Utilities Operations Division maintains four water production plants 24 hours a day, 365 days a year. In 2011, an average of 4.95 million gallons of water was produced each day. Our water production program is a continuing commitment towards assuring adequate and safe supplies for the citizens of Plant City. Our water is obtained from the ground water source and is chlorinated for disinfection purposes. Polyphosphate is also added to keep naturally occurring iron from settling out in the water system and to reduce lead and copper corrosion in the plumbing system. The City of Plant City continually makes efforts to improve the water treatment process and protect our water resources.

Important Health Information... In order to ensure tap water is safe to drink; the Environmental Protection Agency (EPA) prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. The Food and Drug Administration (FDA) regulations establish limits for contaminants in bottled water which must provide the same protection for public health. More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hotline at 1-800-426-4791.

Community Involvement…Take Part In The Future...
You can take part in decisions affecting your drinking water by attending City Commission meetings held on the second and fourth Mondays of each month at 7:30 PM. Scheduled meetings are at City Hall, 302 W. Reynolds Street, Plant City, Florida 33564. Meeting agendas are published on the City's website at plantcitygov.com, or call (813) 659-4200, City Clerk's Office.

People Who Are At Higher Risk... 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 microbiological contaminants are available from the Safe Drinking Water Hotline at 1-800-425-4791.

Contamination From Cross-Connections... Cross-connections within the drinking water distribution system are a concern. A cross-connection is formed at any point where a drinking water line inter-connects to equipment (boilers), systems containing chemicals (air conditioning systems, fire sprinkler systems irrigation system) or water sources of questionable quality. Cross-connection contamination can occur when the pressure in the equipment or system is greater than the pressure inside the drinking waterline (backpressure). Contamination can also occur when drinking waterline pressure drops due to fairly routine occurrences (water main breaks, heavy water demand) causing contaminants to be sucked out from the equipment into the drinking waterline (backsiphonage).

Outside water taps and garden hoses tend to be the most common sources of cross-connections at home. Garden hoses create a hazard when submerged in a swimming pool or when attached to a chemical sprayer for weed killing. Garden hoses lying on the ground may be contaminated by fertilizers, cesspools or garden chemicals. Community water supplies are jeopardized by cross-connections unless appropriate backflow prevention assemblies are installed, generally at the point of service. Backflow prevention assemblies are tested, maintained, and or repaired on an annual basis.

The City of Plant City has an aggressive Cross-Connection Control program. Potential cross-connections are identified and eliminated or protected by a backflow preventer. The City inspects and tests each primary backflow prevention assembly to make sure it is providing maximum protection. For more information, contact the City's Cross-Connection Control Program at (813) 659-4298, or visit plantcitygov.com. You can also call the Safe Drinking Water Hotline at 1-800-426-4791.

Continual Testing For Potential Contaminants. The City of Plant City routinely monitors for contaminants in your drinking water according to federal and state laws, rules and regulations. Highly trained professionals collect and test samples throughout the water distribution system on a daily basis. Except where indicated otherwise, this report shows results of our monitoring for the period of January 1 to December 31, 2011. Data obtained before January 1, 2011, and presented in this report are from the most recent testing done in accordance with the laws, rules, and regulations. 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 EPA's Safe Drinking Water Hotline 1-800-426-4791.

Lead Contaminants. 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. The City of Plant City's Utilities Operations Division is 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 http://www.epa.gov/safewater/lead.

TTHMs (Total Trihalomethanes). Some people who drink water containing trihalomethanes in excess of the MCL over many years may experience problems with their liver, kidney, or central nervous systems, and may have an increased risk of getting cancer.

Contaminant Sources. 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:

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

WATER CONSERVATION

Water Conservation measures are an important first step in protecting and preserving our drinking water supply. These simple measures can also save money on your water bill.

Water Conservation Measures You Can Use Inside Your Home

- Fix leaking faucets, pipes, toilets, etc.
- Replace old dishwaters and washing machines.
- Install water-saving devices in faucets and toilets.
- Wash only full loads of laundry.

You Can Save Water Outdoors As Well

- Water lawn, garden and landscape, as needed, during allowable watering days and times.
- Repair leaks on outdoor faucets, garden hoses and automatic irrigation systems.
- Use an automatic shut off nozzle on garden hoses when hand-watering or washing a vehicle.
- Ensure automatic irrigation system timers are set for the correct watering times.

For information on Water Conservation, Florida-Friendly landscaping, outdoor irrigation, related environmental workshops and the FREE Garden Hose and Retro-Fit Indoor Water Saving Kit Programs, visit the Water Resource Management Division webpage at plantcitygov.com
For your convenience, you may call: (813) 659-4298, Ext. 4903, Write us at: 705 N. Alexander Street, Plant City, Florida 33563

MICROBIOLOGICAL

Contaminant and Unit of Measurement	Dates of Sampling (mo./yr.)	MCL Violation (Y/N)	Total Number of Positive Samples For The Year	MCLG	MCL	Likely Source of Contamination
Total Coliform Bacteria (positive samples)	01/11-12/11 (Monthly)	N	1	0	15	Naturally present in the environment

INORGANIC

Contaminant and Unit of Measurement	Dates of Sampling (mo./yr.)	MCL Violation (Y/N)	Level Detected	Range of Results	MCLG	MCL	Likely Source of Contamination
Barium (ppm)	09/11	N	0.015	0.0077 To 0.015	2	2	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Beryllium (ppm)	09/11	N	0.00023	U To 0.00023	4	4	Discharge from metal refineries and coal-burning factories; discharge from electrical, aerospace, and defense industries
Chromium (ppb)	09/11	N	0.0045	0.0032 To 0.0045	100	100	Discharge from steel and pulp mills; erosion of natural deposits
Cyanide (ppb)	09/11	N	0.008	U To 0.008	200	200	Discharge from steel/metal factories; discharge from plastic and fertilizer factories
Fluoride (ppm)	09/11	N	0.34	0.23 To 0.34	4	4.0	Erosion of natural deposits; discharge from fertilizer and aluminum factories. Water additive which promotes strong teeth when at optimum levels between 0.7 and 1.3 ppm.
Lead (point of entry)(ppb)	09/11	N	0.00043	U To 0.00043	0	15	Residue from man-made pollution such as auto emissions and paint; lead pipe, casing, and solder
Nickel (ppb)	09/11	N	0.0028	0.0011 To 0.0028	N/A	100	Pollution from mining and refining operations. Natural occurrence in soil
Nitrate (as Nitrogen) (ppm)	09/11	N	0.25	0.23 To 0.25	10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Sodium (ppm)	09/11	N	22.00	17.00 To 22.00	N/A	160	Saltwater intrusion, leaching from soil

SECONDARY

Contaminant and Unit of Measurement	Dates of Sampling (mo./yr.)	MCL Violation (Y/N)	Highest Result	Range of Results	MCLG	MCL	Likely Source of Contamination
Chloride (ppm)	09/11	N	23	16 To 23	250	250	Natural occurrence from soil leaching
Copper (ppm)	09/11	N	0.0051	0.0039 To 0.0051	1	1	Corrosion byproduct and natural occurrence from soil leaching
Iron (ppm)	09/11	Y	0.44	0.031 To 0.44	0.3	0.3	Natural occurrence from soil leaching
Manganese (ppm)	09/11	Y	0.16	0.0014 To 0.16	0.05	0.05	Natural occurrence from soil leaching
Sulfate (ppm)	09/11	N	16	1.5 To 16	250	250	Natural occurrence from soil leaching
Total Dissolved Solids (TDS)(ppm)	09/11	N	290	240 To 290	500	500	Natural occurrence from soil leaching
Zinc (ppm)	09/11	N	0.0081	0.0015 To 0.0081	5	5	Natural occurrence from soil leaching

STAGE 1 DISINFECTANTS AND DISINFECTION BY-PRODUCTS (D/DBP)

For bromate, chloramines, or chlorine, the level detected is the highest running annual average (RAA), computed quarterly, of monthly averages of all samples collected. For haloacetic acids or TTHM, the level detected is the highest RAA, computed quarterly, of quarterly averages of all samples collected if the system is monitoring quarterly or is the average of all samples taken during the year if the system monitors less frequently than quarterly. Range of results is the range of individual sample results (lowest to highest) for all monitoring locations, including Initial Distribution System Evaluation (IDSE) results as well as Stage 1 compliance results.

Disinfectant or Contaminant and Unit of Measurement	Dates of Sampling (mo./yr.)	MCL or MRDL Violation (Y/N)	Level Detected	Range of Results	MCLG or MRDLG	MCL or MRDL	Likely Source of Contamination
Chlorine (ppm)	1/11–12/11 (Monthly)	N	1.78 Running Annual Average	0.28 To 3.70	MRDLG = 4	MRDL = 4.0	Water additive used to control microbes
Haloacetic Acids (FIVE) (HAA5) (ppb)	1/11 –12/11 (Quarterly)	N	39.25 Running Annual Average	27.00 To 55.1	N/A	MCL = 60	By-product of drinking water disinfection
TTHM (Total Trihalomethanes) (ppb)	1/11–12/11 (Quarterly)	N	64.08 Running Annual Average	41.00 To 91.40	N/A	MCL = 80	By-product of drinking water disinfection

STAGE 2 DISINFECTANTS AND DISINFECTION BY-PRODUCTS (D/DBP) (IDSE)

Disinfectant of Contaminant and Unit of Measurement	Dates of Sampling (mo./yr.)	MCL or MRDL Violation (Y/N)	Level Detected	Range of Results	MCLG or MRDLG	MCL or MRDL	Likely Source of Contamination
Haloacetic Acids (FIVE) (HAA5) (ppb)	1/11 –12/11 (Quarterly)	N	36.53 Running Annual Average	14.76 To 86.60	N/A	MCL = 60	By-product of drinking water disinfection
TTHM (Total) Trihalomethanes) (ppb)	1/11 –12/11 (Quarterly)	N	61.68 Running Annual Average	24.07 To 95.60	N/A	MCL = 80	By-product of drinking water disinfection

LEAD AND COPPER (TAP WATER)

Contaminant and Unit of Measurement	Dates of Sampling (mo./yr.)	AL Exceeded (Y/N)	90th Percentile Result	Number of Sampling Sites Exceeding the AL	MCLG	AL (Action Level)	Likely Source of Contamination
Copper (tap water) (ppm)	07/11-08/11	N	0.066	0	1.3	1.3	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives.
Lead (tap water) (ppb)	07/11-08/11	N	2.8	1	0	15	Corrosion of household plumbing systems; erosion of natural deposits.

SYNTHETIC ORGANIC

Contaminant and Unit of Measurement	Dates of Sampling (mo./yr.)	MCL Violation Y/N	Level Detected	Range of Results	MCLG	MCL	Likely Source of Contamination
Di(2-ethylhexyl) phthalate (ppb)	09/11, 12/11	N	1.0	U To 1.0	0	6	Discharge from rubber and chemical factories.
Dalapon (ppb)	09/11, 12/11	N	1.40	U To 1.40	200	200	Runoff from herbicide used on rights of way.

RADIOACTIVE

Contaminant and Unit of Measurement	Dates of Sampling (mo./yr.)	MCL Violation Y/N	Level Detected	Range of Results	MCLG	MCL	Likely Source of Contamination
Alpha Emitters (pCi/L)	1/08-12/08 (Quarterly)	N	11.80	U To 11.80	0	15	Erosion of natural deposits
Radium 226+228 or Combined Radium (pCi/L)	1/08-12/08 (Quarterly)	N	4.20	U To 4.20	0	5	Erosion of natural deposits

In the table above, you may have seen unfamiliar terms and abbreviations. To better understand these terms we have provided the following definitions.

AL = Action Level: The concentration of a contaminant which, if exceeded, triggers treatment or other requirements that a water system must follow.
FDEP = Florida Department of Environmental Protection.
EPA = United States Environmental Protection Agency.
HAA (5) = Haloacetic Acids (Five): Acid compounds including: monochloroacetic, dichloroacetic, trichloroacetic, monobromoacetic, and dibromoacetic acids.
IDSE = Initial Distribution System Evaluation (IDSE): An important part of the Stage 2 Disinfection By-Products Rule (DBPR). The IDSE is a one-time study conducted by water systems to identify distribution system locations with high concentrations of trihalomethanes (THMs) and haloacetic acids (HAAs). Water systems will use results from the IDSE in conjunction with their Stage 1 DBPR compliance monitoring data, to select compliance monitoring locations for the Stage 2 DBPR.
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 disinfection 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.
pCi/l = Picocurie Per Liter: measure of the radioactivity in water.
ppb = Parts Per Billion or Micrograms Per Liter (µg/l): One part by weight of analyte to 1 billion parts by weight of the water sample.
ppm = Parts Per Million or Milligrams Per Liter (mg/l): One part by weight of analyte to 1 million parts by weight of the water sample.
Range = The lowest to highest amount of contaminant detected during report period.
TTHMs = Total Trihalomethanes: A group of several trihalomethane (chemical) compounds including: chloroform, bromoform, bromodichloromethane and Dibromochloromethane
U = Compound was analyzed for but not detected.
Violations = Detected contaminant exceeded the MCL.