## City of Graham 2016 Water Quality Report

WSID # 0010043

The City of Graham water department is pleased to inform you that your drinking water exceeds the standards for safe drinking water set forth by the State and Federal government.

This report contains information about the quality of your water, where it comes from and how it compares to the State and Federal drinking water standards.

The Graham Water Department collected samples last year that were analyzed for more than 80 parameters to ensure that the water we drink is safe. For more information about our drinking water program or this water quality report contact the Water Operator at 912-367-2202.

The City of Graham pumps its water from the Upper Floridian Aquifer. This aquifer is a large underground body of water that serves most of South Georgia and the upper part of Florida. The characteristics of this water change slowly making it an excellent source for drinking water. The City pumps from one well that is located under the elevated water tank behind City Hall. This property is protected from activities that could potentially cause contamination of this water source. We perform treatment at this site, which include removal of contaminants and chorine disinfection.

The sources of drinking water (both tap 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.

Drinking water, including bottle water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of some contaminants does not necessarily indicate that the drinking water poses a health risk. More information can be obtained by calling the Environmental Protection 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 with cancer undergoing chemotherapy, persons 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 healthcare 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 at 1-800-426-4791.

Contaminants that may be present in source water before treatment includes:

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

In order to ensure that tap water is safe to drink, samples are pulled, laboratory test are run and EPA prescribes regulations, which governs these activities and limits the amount of certain contaminants in water provided by public water systems. The Food and Drug Administration regulations establish limits for the contaminants in bottled water, which must provide the same protection for the public health.

The City of Graham is pleased to report that there were no violations of the Rules for Safe Drinking Water in 2016.

## Definitions, Terms & Abbreviations:

(Ppb) = Parts Per Billion: One part per billion is equivalent to one penny in ten million dollars.

(ppm) = Parts Per Million: One part per million is equivalent to one penny in ten thousand dollars.

(MCL) = Maximum contaminant level: The highest level of a contaminant that is allowed in 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. MCLG's allow for a margin of safety.

(AL) = Action level: The concentration of a contaminant which, when exceeded, triggers treatment or other requirements which a water system must follow. (N/D) =Not detected

(n/a) = Not applicable

The table below lists all the drinking water contaminants that we detected during the 2016 calendar year. The presence of these contaminants in the water does not necessarily indicate that the water poses a health risk. Unless otherwise noted, the data presented in this table is for testing done January 1 through December 31, 2016. EPD requires us to monitor for certain contaminants less than once per year because, the concentrations of these contaminants are not expected to vary significantly from year to year. Some of the data, though representative of the water quality, is more than one year old.

| There is convincing | g evidence | that addition | of a disinfectant is                         | s necessary for                              | control of r   | microbial cont | aminants)  |
|---------------------|------------|---------------|--|--|----------------|----------------|--|
| Chlorine Testin     |            |               |  |  |                |                |  |
| Contaminants        | MCL        | MCLG          | Graham<br>Water System<br>Amount<br>Detected | Range of<br>Detection                        | Sample Date    | Violation      | Typical Source of<br>Contaminant                 |
| Chlorine            | 4          | 4             | 1.2  | 1.0 1.2                                      | 2016           | NO             | Typical water additive used to control microbes. |
| Inorganic Co        | ntamin     | ants          |  |  |                |                |  |
| Barium Testing      | 9          |               |  |  |                |                |  |
| Contaminants        | MCL        | MCLG          | Graham<br>Water System<br>Amount<br>Detected | Range of<br>Detection                        | Sample<br>Date | Violation      | Typical Source of<br>Contaminant                 |
| Barium (ppb)        | 2          | 2             | 0.110 ppm                                    | N/A  | 2005           | NO             | Erosion natural deposits                         |
| Lead Testing        |            |               |  |  |                |                |  |
| Contaminants        | AL         | MCLG          | Graham<br>Water System<br>Amount<br>Detected | # of sites<br>found above<br>the AL          | Sample<br>Date | Violation      | Typical Source of<br>Contaminant                 |
| Lead (ppb)          | 15         | 0             | 0.0007                                       | 0 site above<br>AL out of 5<br>sites sampled | 2016           | NO             | Corrosion of<br>Household Plumbing<br>Systems    |
| Copper Testin       | a          |               |  |  |                |                |  |
| Contaminants        | AL         | MCLG          | Graham<br>Water System<br>Amount<br>Detected | # of sites<br>found above<br>the AL          | Sample<br>Date | Violation      | Typical Source of Contaminant                    |
| Copper (ppb)        | 1.3        | 1.3           | 0.0545                                       | 0 site above<br>AL out of 5<br>sites sampled | 2016           | NO             | Corrosion of<br>Household Plumbing<br>Systems    |

<sup>\*</sup>EPD has determined that the concentrations of certain water quality monitoring parameters do not change frequently within our system therefore, some of the data represented in this report is greater than one year old.