

The Gladeville Utility District's Water Quality Report for 2013

GLADEVILLE UTILITY DISTRICT • 3826 VESTA ROAD • LEBANON, TN 37090
State Public Water System ID #: TN0000264 Date Distributed: May 2014

Is my drinking water **SAFE**?

Yes, your drinking water is safe and it meets all of the Environmental Protection Agency's (EPA) health standards. In 2013 we conducted numerous tests for over 80 contaminants that might be found in drinking water. As you'll see in the chart on the back, we only detected 11 of these contaminants, and they were all at levels determined to be safe by the EPA.

What is the **SOURCE** of my **WATER**?

Your water, which is groundwater, comes from two wells located at our water treatment plant at 3826 Vesta Road. Our goal is to protect our water source from contaminants and we are working with the State to determine the vulnerability of our water source to **potential** contamination. The Tennessee Department of Environment and Conservation (TDEC) has prepared a Source Water Assessment Program (SWAP) Report for the untreated water sources serving water to this water system. The SWAP Report assesses the susceptibility of untreated water source to **potential** contamination. To ensure safe drinking water, all public water systems treat and routinely test their water. Water sources have been rated as reasonably susceptible, moderately susceptible or slightly susceptible based on geologic factors and human activities in the vicinity of the water source. The source water for the Gladeville Utility District is rated as reasonably susceptible to potential contamination.

A detailed explanation of Tennessee's Source Water Assessment Program, the Source Water Assessment summaries, susceptibility scorings and the overall TDEC report to the EPA may be viewed online at http://www.tn.gov/environment/water/water-supply_source-assessment.shtml or you may contact the Water System to obtain copies of specific assessments. A wellhead protection plan is also available for your review by contacting Chief Operator James Hutchison at (615) 444 - 2869 between 7:00 A.M. and 3:00 P.M. on weekdays.

Is the water system **SECURE**?

Following the events of September 11, 2001, we realize that our customers are concerned about the security of their drinking water. We urge the public to report any suspicious activities at any utility facilities, including the treatment plant, tanks, fire hydrants, etc. to (615) 449-0301 or (615) 444-2869.

Is the water system meeting other **RULES** that govern our operations?

The State and EPA require us to test and report on our water on a regular basis to ensure its safety. We have met all of these requirements. Results of unregulated contaminant analyses are available upon request. We want you to know that we strictly follow all the rules.

LEAD in Drinking Water

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 Gladeville Utility District 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>.

For more information about your drinking water, you may contact Chief Water Plant Operator James Hutchison at (615) 444 - 2869.

Other **INFORMATION**

The sources of drinking water (both tap water and bottled water) may 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.

Why are there **CONTAMINANTS** in my 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 water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline at (800) 426-4791.

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, which can be naturally-occurring or result from urban storm water 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 storm water runoff, and residential uses.
- 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 storm water runoff, and septic systems.
- Radioactive contaminants, which 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, EPA and the Tennessee Department of Environment and Conservation prescribe regulations which limit the amount of certain contaminants in water provided by public water systems. Food and Drug Administration (FDA) regulations establish limits for contaminants in bottled water which must provide the same protection for public health.

What are the possible **HEALTH** impacts of our drinking water?

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 from their health care providers about not only their drinking water, but food preparation, personal hygiene, and precautions in handling infants and pets. 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, which may be reached by calling (800) 426-4791.

How may I get **INVOLVED**?

Our Board of Commissioners meets at 11:00 A.M. on the second Tuesday of each month at the District's administrative office, located at 3826 Vesta Road. Please feel free to attend and participate in these meetings.

Este informe contiene información importante acerca de su agua potable. Haga que alguien lo traduzca para usted, o hable con alguien que lo entienda.

Water Quality Data

About the DATA: Unless otherwise noted, the data presented in the following table are from sampling performed during the 2013 calendar year.

| CONTAMINANT | Violation Yes/No | Level Detected | Range of Detections | Date of Sample | Unit of Measurement | MCLG | MCL | Likely Source of Contaminant |
|-----------------------------------|------------------|----------------|---------------------|----------------|---------------------|------|----------------------|---------------------------------------|
| Turbidity ¹ | No | 0.35 | 0.07 - 0.35 | 2013 | NTU | N/A | TT | Soil runoff |
| Total Organic Carbon ² | No | 1.18avg. | 1.0 – 1.4 | 2013 | ppm | TT | TT | Naturally present in the environment. |
| Total Coliform Bacteria | No | 0 | | 2013 | | 0 | < 5 positive samples | Naturally present in the environment |

INORGANIC CONTAMINANTS

| | | | | | | | | |
|----------|----|-----------|-------------|-------|-----|---------|--------|---|
| Chlorine | No | 2.5 avg. | 2.5 - 2.9 | 2013 | ppm | MRDLG 4 | MRDL 4 | Disinfectant to control microbes |
| Fluoride | No | 0.77 avg. | 0.73 - 0.83 | 2013 | ppm | 4 | 4 | Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories |
| Nitrate | No | 0.41 | N/A | 2013 | ppm | 10.0 | 10.0 | Soil runoff from fertilizer. |
| Sodium | No | 2.3 | | 02-11 | ppm | N/A | N/A | Erosion of natural deposits; used in water treatment |

VOLATILE CONTAMINANTS

| | | | | | | | | |
|-------------------------------------|------------------|------------|----------------|------|-----|---|----|---|
| Total Trihalomethanes (TTHM) | No | 50.0 (ppb) | 20-96 (ppb) | 2013 | ppb | 0 | 80 | By-product of drinking water chlorination |
| Haloacetic acid (HAA5) ³ | Yes ³ | 65.0 (ppb) | 18 - 139 (ppb) | 2013 | ppb | 0 | 60 | By-product of drinking water chlorination |

LEAD AND COPPER³

| | | | | | | | | |
|---------------------|----|----------------------------|--|-------|-----|-----|--------|--|
| Lead ⁴ | No | 90 th % = 0.005 | | 06-11 | ppb | 0 | AL=15 | Corrosion of household plumbing systems, erosion of natural deposits |
| Copper ⁴ | No | 90 th % = 0.55 | | 06-11 | ppm | 1.3 | AL=1.3 | Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives |

What do the ABBREVIATIONS used in the above table mean?

- **AL** - Action Level, or the concentration of a contaminant which, when exceeded, triggers treatment or other requirements which a water system must follow.
- **BDL** - Below Detection Limit.
- **MCLG** - Maximum Contaminant Level Goal, or 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.
- **MCL** - Maximum Contaminant Level, or 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.
- **MRDL**: Maximum Residual Disinfectant Level, or the highest level of a disinfectant allowed in drinking water. There is convincing evidence that the addition of a disinfectant is necessary for the control of microbial organisms.
- **MRDLG**: Maximum Residual Disinfectant Level Goal, or 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.
- **N/A** - Not Applicable.
- **NTU** - Nephelometric Turbidity Unit, which is a measure of the clarity of water. Turbidity in excess of 5 NTUs is just noticeable to the average person.
- **pCi/L** - Picocuries per liter.
- **PPB** or **Micrograms/L** - Parts per Billion or micrograms per liter, explained in terms of money as one penny in \$10,000,000.
- **PPM** or **mg/L** - Parts per Million or milligrams per liter, explained in terms of money as one penny in \$10,000.
- **TT** - Treatment Technique, or a required process intended to reduce the level of a contaminant in drinking water.

¹ **Turbidity** is a measure of the cloudiness of the water and does not present any risk to your health. We monitor turbidity because it is a good indicator of the effectiveness of our filtration system. We met the treatment technique for turbidity with 99.4% of our samples being below the permitted turbidity limit of 0.3 NTU.

² The Gladeville Utility District met the Treatment Technique requirements for **Total Organic Carbon** in 2013.

³ The District's 3rd Quarter 2013 running average for Haloacetic Acids (HAA5) was calculated to be 65 ppb. This value exceeds the Maximum Contaminant Level (MCL) of 60 ppb as established for this parameter. Since this violation we have increased the efforts of our flushing program.

⁴ During the most recent round of **LEAD** and **COPPER** testing, 0 out of 30 households sampled contained concentrations exceeding the lead action level and 0 out of 30 of the samples contained concentrations exceeding the copper action level.

All governmental powers of the Gladeville Utility District are exercised by the District's Board of Commissioners. The Board consists of three members, serving staggered four-year terms. The Members of the Board are appointed by the County Mayor of Wilson County from a list of three nominees, in order of preference, submitted by the Board. All decisions made by the Board on customer complaints may be reviewed by the Utility Management Review Board, pursuant to Tennessee Code Annotated, §7-82-702(7).

The Gladeville Utility District is an equal opportunity provider and employer.