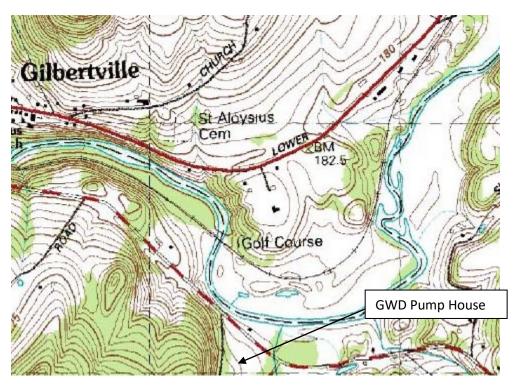
Some Important Information about your drinking water...

This Consumer Confidence Report is intended to provide the customers of the Gilbertville Water District with information regarding the District's water supply for calendar year 2021. The Board of Water Commissioners intends to keep you informed of the quality of our drinking water, new regulatory requirements and guidelines, and upcoming projects. Additional information can be obtained by attending a scheduled monthly meeting of the Board of Water Commissioners. The Board meets on the third Tuesday of every month at 5:30p.m. at the Gilbertville Library located on Main Street in Gilbertville, MA. GWD meetings are open to the public.

The Gilbertville Water District's does not have an office. All business is conducted at our monthly meetings. The mailing address for the District is PO Box 97, Gilbertville, MA 01031. If you have any questions regarding this report, please contact Neil Noble at 1-413-478-2452. The following report presents a brief description of the District's source water, storage, distribution, water quality, and upcoming projects. Additional copies of this report are available upon request.

History.....

The Gilbertville Water District was established under the authority of Chapter 414, Acts of 1949 of the



Massachusetts General Laws. Shortly thereafter and throughout the 1950's & 1960's the District constructed the New Braintree Water Supply, 100,000 gallon storage tank and limited distribution system throughout the Village of Gilbertville. All of the distribution piping was initially unlined cast iron. Later on asbestos cement water lines were installed followed by cement lined ductile iron water pipes. Over the years, additions have been made to the water distribution system and house services to maintain stateof-the-art technology. The Board of Water Commissioners is committed to providing the consumer with high quality, affordable potable water that meets all state and federal water quality standards.

Organization.....

The Gilbertville Water District is governed by a 3 member elected Board. The current Board of Water Commissioners' are: Carmel Robichaud, Andrew Tombor and Neil Noble. The operation staff includes the Commissioners, Donald Dunbar - Superintendent, Gary Stine- District Engineer and support from local contractors. Office support is provided by: Carmel Robichaud, Lucy Gagnon, and Treasurer Cheryl Nicholson.

Source of Supply...

All of the GWD water is obtained from an aquifer located in New Braintree at the intersection of Gilbertville and Mara Roads along the Ware River across from a nearby golf course. The District has two gravel developed wells and a pumping capacity of 100 gallons per minute from each supply source. The second well was installed as a backup supply in 2002. The well as cleaned by Weston & Sampson Services in 2019. The District maintains one two compartment concrete 100,000 gallon in ground water storage tank located off of Spring Street.

Source Water Assessment....

The Source Water Assessment and Protection (SWAP) program assesses the susceptibility of public water supplies. A susceptibility ranking of moderate was assigned to the Gilbertville Water District by the Massachusetts Department of Environmental Protection (Mass DEP) using the information collected during the assessment. The complete SWAP report is available at the Hardwick Municipal Building and online at mass.gov/dep/water/drinking/sourcewa.htm. For more information, call Neil Noble at 413-478-2452.

Cross Connections - What is a Cross Connection and what can I do about it?

A Cross Connection is a connection between a drinking water pipe and a polluted source. The pollution can come from your own home. For example, you're going to spray fertilizer on your lawn. You hook up a hose to the sprayer that contains the fertilizer. If the water pressure drops (say because a water break occurs somewhere in the system in Town) when the hose is connected to the fertilizer, the fertilizer may be sucked back into the drinking water pipes through the hose. Using an attachment on your sill cock called a backflow prevention device can prevent this problem. The Gilbertville Water District recommends the installation of backflow prevention devices, such as a low cost hose bib vacuum breaker, for all inside and outside hose connections. You can purchase these at a hardware store or plumbing supply store. This is great way for you to help protect the water in your home as well as the drinking water system in the District. For additional information on cross connections and the status of the District's cross connection program, please contact the water Superintendent; Donald Dunbar at (413) 658-8513.

Water Quality....

To ensure continued compliance with all United States Environmental Protection Agency (USEPA) and MassDEP drinking water standards and guidelines, regularly scheduled water samples are collected and analyzed. All 2021 sample results met all USEPA and Mass DEP primary drinking water standards. In 2021 the Gilbertville Water District sampled its wells for total coliform bacteria, sodium, perchlorate, nitrate, iron, manganese, lead, copper, Volatile Organic Compounds (VOCs), Synthetic Organic Compounds (SOC's), as required by MassDEP. The District last sampled for VOCs in 2021 and for radionuclide and SOCs in 2019. We also tested for PFAS compounds in 2021 with no detections.

We are required to monitor our drinking water for specific contaminants on a regular basis as designated by a MassDEP sampling plan. Results of regular monitoring are an indicator of whether or not our drinking water meets health standards.

Important Definitions....

Maximum Contaminant Lever (MCL): the highest level of a contaminant that is allowed in drinking water. MCLs are set as close to MCLGs as feasible using the best available treatment technology. MCLs are enforceable standards.

Maximum Contaminant Level Goals (MCLG): the level of a contaminant in drinking water below which there is not known or expected risk to health. MCLGs allow for a margin of safety and are non-enforceable public health goals.

Massachusetts Maximum Contaminant Level Goals (MMCL): the level set by Massachusetts DEP of a contaminant in drinking water below which there is not known or expected risk to health. MMCLs are enforceable standards in the Commonwealth of Massachusetts.

Parts per Million (ppm): corresponds to one minute in two years or 1 cent in \$10,000. 1ppm = 1mg/L

Parts per Billion (ppb): corresponds to one minute in 2,000 years or 1 cent in \$10,000,000. 1ppb = 1ug/L

Action Level: the concentration of a contaminant that, if exceeded, triggers treatment or other requirements, which a water system must follow.

Secondary Maximum Contaminant Level (SMCL): standard developed to protect the aesthetic qualities of drinking water and are not health based.

Office of Research and Standards Guidelines (ORSG): concentration of a chemical in drinking water, at or below which adverse health effects are unlikely to occur after chronic (lifetime) exposure. If exceeded, it serves as an indicator of the potential need for further action.

- ppm = parts per million, or milligrams per liter (mg/l)
- ppb = parts per billion, or micrograms per liter (ug/l)
- ppt = parts per trillion, or nanograms per liter
- *pCi/l* = *picocuries per liter* (*a measure of radioactivity*)
- NTU = Nephelometric Turbidity Units
- ND = Not Detected
- N/A = Not Applicable

mrem/year = millimrems per year (a measure of radiation absorbed by the body)

What Does This Data Represent?

The water quality information presented in the table(s) is from the most recent round of testing done in accordance with the regulations. All data shown was collected during the last calendar year unless otherwise noted in the table(s).

Lead and Copper....

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 Gilbertville Water District is responsible for providing high quality drinking water, but cannot control the variety of materials used in household 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 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

Copper is typically used in home and other buildings plumbing systems. Copper and brass pipe and fittings were commonly attached by heating and soldering using a material containing 50% lead and 50% tin. Since most New England ground waters are corrosive, copper and lead may be leached from household plumbing systems under stagnant conditions (i.e. overnight). Flush samples were collected at 5 homes within the distribution system in September of 2019. The results are presented in the table below.

| | Action Level (AL) | 90 th Percentile | No. of Sites Sampled | No. of Sites exceeding AL | Sample Date | Likely Source |
|-----------------|----------------------|--------------------------------|-------------------------|------------------------------|----------------|--|
| Lead (ppb) | .015 | .003 | 5 | 0 | 09-11-19 | Corrosion of household plumbing; Erosion of natural deposit |
| Copper (ppm) | 1.3 | .09 | 5 | 0 | 09-11-19 | Corrosion of household plumbing; |

AL= Action Level

| Unregulated and Secondary Contaminants | Date(s) Collected | Result or Range Detected (MG/L) | Source | SMCL | ORSG | Possible Source | | |
|---|--------------------------------------|--|--|--------------------|------|--|--|--|
| Inorganic Contaminants | | | | | | | | |
| Nitrate (ppm) Sodium Perchlorate | 08-08-19 09/05/2017 09/25/2017 | 0.04 0.04 5.37 ND | Well#1 Well#2 Well#1 Well#2 Well#1 Well#2 | 10 NA 2 ug/l | | Runoff from fertilizer use; Leaching from septic tanks, sewage; erosion of natural deposits Road salt; water softeners; sewage; fertilizers From munitions, fire works, air bag initiators | | |

| Unregulated and Secondary Contaminants | Date(s) Collected | Result or Range Detected (MG/L) | Source | SMCL | ORSG | Possible Source | | |
|---|----------------------|--|--|------|------|---|--|--|
| Secondary Contaminants | | | | | | | | |
| Iron (ppb) | 04-29-19 | ND ND | Well #1 finished Well #2 finished | 300 | | Naturally and industrial sources as well as aging and corroding distribution systems and household pipes | | |
| Manganese (ppb) | 04-29-19 | ND ND | Well #1 Well #2 | | 20 | Erosion of natural deposits | | |

<u>Nitrate</u>: Nitrate in drinking water at levels above 10MG/L is a health risk for infants less than six month old. High nitrate levels in drinking water can cause blue baby syndrome. Nitrate levels may rise quickly for short periods of time because of rainfall or agricultural activity. If you are caring for an infant, you should ask for advice from you health care provider. GWD water has extremely low levels of Nitrate.

<u>Sodium-Sensitive</u>: individuals, such as those experiencing hypertension, kidney failure or congestive heart failure should be aware of the sodium levels where exposures are being carefully controlled. GWD water has extremely low levels of Sodium.

| EPA UNREGULATED CONTAMINANTS | | | | | | | | |
|---------------------------------------|----------------------|----------------|---------|--------------|------|--|--|--|
| COMTAMINANT | DATE(S) COLLECTED | TEST RESULT | SOURCE | MMCL ug/l | ORSG | POSSIBLE SOURCES | | |
| PFAS6 COMPOUNDS - | 12/16/2020 | ND | Well #1 | 20 | N/A | LANDFILL LEACHATE, FABRICS, WIRE MANUFACTURING, FIRE | | |
| PFAS6 COMPOUNDS - | 12/16/2020 | ND | WELL#2 | 20 | N/A | FIGHTING FOAM, PLASTIC COATINGS ON POTS & PANS, PAPER COATINGS, RESINS, MOLDS, PLASTIC WASTES. | | |
| PerfluorooctaneSulfonic Acid (PFOS) | | | | | | | | |
| Perfluorooctanic Acid (PFOA) | | | | | | | | |
| Perfluorohexane Sulfonic Acid (PFHxS) | | | | | | | | |
| Perfluorononanic Acid (PFNA) | | | | | | | | |
| Perfluoroheptanic Acid (PFHpA) | | | | | | | | |
| Perfluorodecanoic Acid (PFDA) | | | | | | | | |

Note: MMCL = Massachusetts Maximum Contaminant Level; ND = Not Detected

<u>PFAS Information</u>: Perfluoroalkyl and Polyfluoroalkyl Substances (PFAS) have been used in coatings for textiles, paper products, and cookware; in some firefighting foams; and have a range of applications in the aerospace, photographic imaging, semiconductor, automotive, construction, electronics, and aviation industries.

PFAS Substances are a complex family of more than 3,000 manmade fluorinated organic chemicals. PFAS containing products have been manufactured since the 1940s and used as a standard coating material of industry for over 60 years.

During manufacturing of products coated with PFAS compounds, PFAS residuals may be released into the atmosphere then redeposited on land where they can affect surface water and groundwater. PFAS compounds are also discharged from wastewater treatment plant effluents and from landfill leachates, if they are present in the raw wastewater or substances deposited in landfills.

Unfortunately, the characteristics that make products containing PFAS the most useful are the reason they persist in the environment and can bioaccumulate, or build up, in our bodies and the bodies of animals.

PFAS compounds readily dissolve in water, and combined with their chemical properties mean traditional drinking water treatment technologies are not able to remove them.

The raw water sources of the Gilbertville Water District have been tested to see if they contain any PFAS compounds. The 2021 test results indicate **no PFAS substances** are present in raw water sources or finish water samples taken from the Gilbertville Water District.

Future Goals & Objectives.....

The Gilbertville water district operates as a community public water system in the village of Gilbertville in the Town of Hardwick. GWD serves approximately 800 persons through 219 connections. The District maintains two groundwater sources locations at the New Braintree Wellfield and an underground storage tank located off of Spring Street in Gilbertville.

The District is actively pursuing any and all grants which may be available to support needed projects. In addition, a priority plan has been prepared to address distribution system upgrades.

One of our long range goals is to continue to update the infrastructure of the system and we will continue to replace the antiquated piping throughout the Town of Gilbertville as needed.

This past year the Town of Hardwick received a grant from the Pioneer Valley Planning Commission to improve the section of New Braintree Road from Main Street to the Town line. Part of the project was to replace approximately 450 linear feet of water line that supplies drinking water from the New Braintree Pump House to the system on Main Street. The project was completed in November of 2021. New mainline gate valves were also installed as part of the project replacing valves that were installed in 1964. The District is slated for a grant to replace the water line on Summit Road from New Braintree Road to Highland Terrace in 2023.

Commissioners have worked to comply with MassDEP for corrections to our water supply system listed in our latest Sanitary Survey. Most improvements centered around access to the water tank off Spring Street and repair of the roof at the New Braintree Road Pump House. The roof was replaced in late 2021.

The Commissioners have continued our program relative to outstanding and delinquent payments of water bills. A formal process is in place that will lead to water shut-offs if bills are not paid in a timely manner. Delinquent water bills have been submitted to the Town's collectors office so a lien on the customers' property can be assessed. Carmel Robichaud, the District Collector (774) 200-9751 can assist you with payment plans if they are necessary. The water rate has been increased to a volumetric rate of \$4.75/HCF with an initial fee of \$100.00 for customers who use is between 0 and 2000 cubic feet of water. The rate equates to an average bill of \$320.00 per year for customers. The rate is significantly lower than the state average of \$720.00 per year and is also lower than most of the surrounding towns.

Safe Drinking Water....

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:

<u>Microbial contaminants</u> -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, and farming.

<u>Pesticides and herbicides</u> -which may come from a variety of sources such as agriculture, urban storm water runoff, and residential uses.

<u>Organic chemical contaminants</u> -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.

<u>Radioactive contaminants</u> -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, the Department of Environmental Protection (Mass DEP) and U.S. Environmental Protection Agency (EPA) prescribe regulations that limit the amount of certain contaminants in water provided by public water systems. The Food and Drug Administration (FDA) and Massachusetts Department of Public Health (DPH) regulations establish limits for contaminants in bottled water that must provide the same protection for public health. All 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 EPA's Safe Drinking Water Hotline (800-426-4791).

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 some infants can be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. EPA/Centers for Disease Control and Prevention (CDC) guidelines on lowering the risk of infection by cryptosporidium and other microbial contaminants are available from the Safe Drinking Water Hotline (800-426-4791).

Please try to conserve our precious resources; here are a few conservation tips.

Conservation Facts & Tips.....

- 1. Most leakage is due to customer's failing to change worn faucet washers or faulty toilet tank valves.
- 2. Purchase water saving devices, which are inexpensive and easy to install.

- 3. Customers can check their toilets for leakage by removing tank cover, and placing a few drops of food coloring in the tank, letting it sit for awhile. If the food coloring appears in the water bowl, the toilet has a leak. You should consult your plumber to assess and repair the leak.
- 4. Half the water used in your home is in the water closet for waste disposal.
- 5. Lawns and gardens should be watered early in the morning or early in evening, not during the day when the sun is highest.
- 6. Our water is very precious, please help conserve.
- 7. Please make sure that your meter is protected from the cold in winter.

Gilbertville Water District, PO Box 97, Gilbertville, MA 01031