PWSID: 006-0019

# Bark Hill 2020 Drinking Water Quality Report

## Important Information about your Drinking Water

The Bureau of Utilities is pleased to present to you the Annual Water Quality Report for 2020. This report is designed to inform you about the water quality and services we deliver to you every day. Maryland Environmental Service (MES), an Agency of the State of Maryland, provides operational support and prepared this report on behalf of Carroll County and the Bark Hill water treatment plant.

The Environmental Protection Agency (EPA) regulates Public Water Systems and the contaminants found in water through the implementation of the Safe Drinking Water Act (SDWA). The SDWA sets regulations and guidelines for how public water systems operate and identifies several hundred drinking water contaminants, establishes monitoring frequencies and limitations. The Maryland Department of the Environment (MDE) is responsible for the enforcement of the SDWA and routinely complete Sanitary Surveys as part of their ongoing inspection and monitoring program. Carroll County provides safe dependable operations of the water system and is dedicated to consistently providing high quality drinking water that meets or exceeds the SDWA standards.

If you have any questions about this report or have questions concerning your water utility, please contact Andrew Watcher, Chief Carroll County Bureau of Utilities 225 North Center Street, room 218, Westminster MD 21157 Phone 410-386-2164

### Public Meeting Information:

For the opportunity to ask more questions or participate in decisions that may affect your drinking water quality, the Carroll County Commissioners meet regularly and the weekly agenda is available at: https://www.carrollcountymd.gov/government/commissioners/board-of-carroll-county-commissioners-weekly-agenda/

### How Water is treated:

The sources of Bark Hill's community water supply are two groundwater wells. Well K50 is located behind Francis Scott Key High School and supplies 26 gpm. Well K3 is located south of the High School and supplies 48 gpm. Both wells alternate production into the treatment building, where the pumped water feeds into two softening and one nitrate Ion Exchange units. Sodium Hypochlorite is then added for disinfection before entering the distribution system, enroute to the 100,000 gallon water storage tank on Raywell Avenue.

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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 microbial contaminants are available from the **Safe Drinking Water Hotline (1-800-426-4791).**

# Bark Hill Treated Water Quality Report 2020

**Definitions:**

**Maximum Contaminant Level Goal (MCLG)** - 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.

**Maximum Contaminant Level (MCL)** - 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.

**Action Level** - The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow

**Treatment Technique (TT)** - A required process intended to reduce the level of a contaminant in drinking water

**Turbidity** - Relates to a condition where suspended particles are present in the water. Turbidity measurements are a way to describe the level of "cloudiness" of the water.

**pCi/l** - Picocuries per liter. A measure of radiation.

**ppb** - parts per billion or micrograms per liter

**ppm** - parts per million or milligrams per liter

**Mrem** - millirem roentgen equivalent in man. A measure of radiation dose

## Sources of Drinking Water:

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.

## Special points of interest:

The water at the Bark Hill is tested for over 120 different compounds. Drinking Water, including bottled water, may reasonably be expected to contain at least small amounts of some compounds. The presence of these compounds 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 (EPA's) Safe Drinking Water Act Hotline (1-800 - 426-4791)**

The Maryland Department of the Environment has performed an assessment of the source water. A copy of the assessment are available by calling or writing the Bureau of Utilities, Carroll County Government, 225 North Center Street, Room 218, Westminster MD 21157, 410-386-2164

# Bark Hill Treated Water Quality Report 2020

| Contaminant | Highest Level Allowed (EPA's MCL) | Highest Level Detected | Ideal Goal (EPA's MCLG) |
|---|---|---|---|
| **Regulated at the Treatment Plant (Bark Hill Plant 01)** | Action Level | Highest Level | Ideal Goal |
| Gross Beta (2016 Testing) | 50 pCi/l* | 4.2 pCi/l* | 0.0 pCi/l |
| Typical Source of Contamination: Erosion of natural deposits | | | |
| *EPA considers 50 pCi/L to be the level of concern for beta particles. The MCL is 4 mrem/year | | | |
| ** Because the beta particle results were below 50 pCi/l, no testing for individual beta particle constituents was required | | | |
| Nitrate | 10 ppm | 2.3 ppm | 10 ppm |
| Typical Source of Contamination: Runoff from fertilizer use; erosion | | (Range 0.58 ppm - 2.3 ppm) | |
| Barium (2020 Testing) | 2000 ppb | 34 ppb | 2000 ppb |
| Typical Source of Contamination: Discharge from metal refineries, erosion of natural deposits. (Range 0.0 ppb - 34 ppb) | | | |
| **Regulated in the Distribution System** | Action Level | Highest Level | Ideal Goal |
| Chlorine (Water additive used to control microbes) | 4 ppm | 0.85 ppm* | 4 ppm |
| * Annual average of results | | Range (0.31 ppm - 1.57 ppm) | |
| Total Trihalomethanes (TTHM) (2020 Testing) | 80 ppb | 14.9 ppb* | n/a |
| Typical Source of Contamination: By-product of drinking water disinfection | | *Locational Rolling Annual Average | |
| Haloacetic Acids (HAA5) (2020 Testing) | 60 ppb | 3.7 ppb* | n/a |
| Typical Source of Contamination: By-product of drinking water disinfection | | *Locational Rolling Annual Average | |
| **Regulated in the Distribution System** | Action Level | 90th Percentile | Ideal Goal |
| Copper (2019 Testing) | 1300 ppb | 77 ppb | 1300 ppb |
| Typical Source of Contaminant: Corrosion of household plumbing | | | |
| Lead (2019 Testing) | 15 ppb | 1.3 ppb | 0.0 ppb |
| Typical Source of Contaminant: Corrosion of household plumbing | | | |

The table above lists all the drinking water contaminants that were detected during the 2020 calendar year. The presence of these compounds in the water does not necessarily indicate that the water poses a health risk. Unless otherwise noted, the data presented in the table is from testing done January 1 – December 31, 2020.

The State 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.

*In order to ensure that tap water is safe to drink, EPA prescribes regulations which limit the amount of certain compounds in water provided by public water systems. We treat our water according to EPA's regulations. Food and Drug Administration regulations establish limits for contaminants in bottled water which must provide the same protection for public health.*

## Contaminants that may be present in source water:

Microbial Contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife. Pesticides and Herbicides, which may come from a variety of sources such as agriculture, urban stormwater runoff, and residential uses. 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. 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. Radioactive Contaminants, which can be naturally-occurring or be the result of oil and gas production and mining activities.

## Lead Prevention

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 Bark Hill 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 drinking 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 EPA Safe Drinking Water Hotline at 1-800-426-4791 or at http://www.epa.gov/safewater/lead**.

## Water Security is Everyone's Responsibility

Water system security continues to be an enormously important issue. If you notice suspicious activities in or around local water utilities, such as persons cutting or climbing facility fencing, loitering, tampering with equipment or other similar activities, please contact your local law enforcement agency immediately by dialing 911.