

2016 Annual Drinking Water Quality Report

Town of Hurlock

PWSID # MD0090005

In compliance with Safe Drinking Water Act amendments by Congress of 1996 and subsequent Federal and State regulations, the Town of Hurlock is pleased to provide this annual water quality report for calendar year 2015. The Town of Hurlock routinely monitors for contaminants in your drinking water. For more information on the source of your water and the significant potential sources of contamination, contact the Maryland Water Supply Program at the Maryland Department of the Environment at (410) 537-3714 or visit on the web: http://www.mde.state.md.us/programs/Water/Water_Supply/Source_Water_Assessment_Program/Pages/programs/waterprograms/water_supply/sourcewaterassessment/by_county.aspx

Is my water safe?

We are very pleased to provide you with this year's Annual Quality Water Report. This report is designed to inform you about the quality water and services we deliver to you every day. Our constant goal is to provide you with a safe and dependable supply of drinking water. We want you to understand the efforts we make to continually improve the water treatment process and protect our water resources. We are committed to enduring the quality of your water. As in years past, your tap water met all U.S. Environmental Protection Agency (EPA) and state drinking water health standards.

Do I need to take special precautions?

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/Centers for Disease Control (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 (800-426-4791). 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 (1-800-426-4791).

How do we monitor for contaminants?

The Town of Hurlock routinely monitors for contaminants in your drinking water according to Federal and State laws. This table shows the results of our monitoring for the period of January 1st to December 31st, 2015. As water travels over the land or underground, it can pick up substances or contaminants such as microbes, inorganic and organic chemicals, and radioactive substances. All drinking water, including bottled drinking water, may be reasonably expected to contain at least small amounts of some contaminants. It is important to remember that the presence of these contaminants does not necessarily pose a health risk.

Why are there contaminants in my drinking 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 (EPA) Safe Drinking Water Hotline (800-426-4791).

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:

- 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 stormwater 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 stormwater runoff, and residential uses.
- Organic chemical contaminants, including synthetic and volatile organic chemicals, which are byproducts 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.

In order to ensure that tap water is safe to drink, EPA prescribes regulations that 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.

Educational Statement on Lead

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 Town of Hurlock 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>

Educational statement on Nitrate

Nitrate in drinking water at levels above 10 ppm is a health risk for infants of less than six months of age. 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 your health care provider.

Water Quality Data Table

The table below lists all of the drinking water contaminants that we detected during the calendar year of this report. The presence of 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 from testing done in the calendar year of the report. The EPA or the State requires us to monitor for certain contaminants less than once per year because the concentrations of these contaminants do not change frequently.

Inorganic Contaminants Plant ID 01: Inactive Well

| Contaminant, units | MCLG | MCL | Result | Range | | Sample Date | Violation | Typical Source | Health Effects | Plant ID |
|--------------------|------|-----|--------|-------|------|-------------|-----------|---|---|----------|
| | | | | Low | High | | | | | |
| Nitrate, ppm | 10 | 10 | 7.57 | - | - | 9/23/2014 | No | Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits | Infants below the age of six months who drink water containing nitrate in excess of the MCL could become seriously ill and, if untreated, may die. Symptoms include shortness of breath and blue baby syndrome. | 01 |

Secondary Standards (Related to the aesthetic quality of drinking water) Plant ID 01: Inactive Well

| Substance, units | Suggested Limit | Result | Range | | Sample Date | Violation | Typical Source | Plant ID |
|------------------|-----------------|--------|-------|------|-------------|-----------|----------------|----------|
| | | | Low | High | | | | |
| pH, SU | 6.5-8.5 | 5.8 | - | - | 9/23/2014 | No | - | 01 |

Inorganic Contaminants Plant ID 03

| Contaminant, units | MCLG | MCL | Result | Range | | Sample Date | Violation | Typical Source | Health Effects | Plant ID |
|--------------------|------|-----|--------|-------|------|-------------|-----------|---|---|----------|
| | | | | Low | High | | | | | |
| Fluoride, ppm | 4 | 4 | 0.52 | - | - | 6/13/2014 | No | Erosion of natural deposits; Water additive which promotes strong teeth; Discharge from fertilizer and aluminum factories | Some people who drink water containing fluoride in excess of the MCL over many years could get bone disease, including pain and tenderness of the bones. Fluoride in drinking water at half the MCL or more may cause mottling of children's teeth, usually in children less than nine years old. Mottling also known as dental fluorosis, may include brown staining and/or pitting of the teeth, and occurs only in developing teeth before they erupt from the gums. | 03 |
| Sodium, ppm | NA | NA | 81 | - | - | 6/13/2014 | - | Erosion of natural deposits; Leaching | - | 03 |
| Nitrate, ppm | 10 | 10 | 5.4 | - | - | 2015 | No | Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits | Infants below the age of six months who drink water containing nitrate in excess of the MCL could become seriously ill and, if untreated, may die. Symptoms include shortness of breath and blue baby syndrome. | 03 |

Radioactive Contaminants Plant ID 03

| Contaminant, units | MCLG | MCL | Result | Range | | Sample Date | Violation | Typical Source | Health Effects | Plant ID |
|---|------|------|--------|-------|------|-------------|-----------|--|--|----------|
| | | | | Low | High | | | | | |
| Beta/positron emitters, pCi/L | 0 | 50** | 7.2 | - | - | 10/20/2011 | No | Decay of natural and man-made deposits | Certain minerals are radioactive and may emit forms of radiation known as photons and beta radiation. Some people who drink water containing beta and photon emitters in excess of the MCL over many years may have an increased risk of getting cancer. | 03 |
| Combined Radium (226&228), pCi/L (2011) | 0 | 5 | 0.8 | - | - | 10/20/2011 | No | Erosion of natural deposits | Some people who drink water containing radium 226 or 228 in excess of the MCL over many years may have an increased risk of getting cancer. | 03 |

**= The MCL for beta particles is 4 mrem/year. EPA considers 50 pCi/L to be the level of concern for beta particles.

Organic Contaminants Plant ID 03

| Contaminant, units | MCLG | MCL | Result | Range | | Sample Date | Violation | Typical Source | Health Effects | Plant ID |
|---|------|-----|--------|-------|------|-------------|-----------|----------------|----------------|----------|
| | | | | Low | High | | | | | |
| 2,4,5-T, ppb (Trichlorophenoxy-acetic acid) | NA | NA | 0.1 | - | - | 8/19/2010 | - | Unknown | Unknown | 03 |

Secondary Standards Plant ID 03 (Related to the aesthetic quality of drinking water)

| Substance, units | Suggested Limit | Result | Range | | Sample Date | Violation | Typical Source | Plant ID |
|------------------|-----------------|--------|-------|------|-------------|-----------|----------------|----------|
| | | | Low | High | | | | |
| pH, SU | 6.5-8.5 | - | 5.5 | 7.7 | - | - | | 03 |
| | | 7.7 | | | 9/23/2014 | No | | 03 |
| | | 5.5 | | | 9/23/2014 | No | | 03 |

Disinfectants and Disinfection By-Products, Plant ID 00 Distribution Sampling

| Contaminant, units | MCLG | MCL | Result | Range | | Sample Date | Violation | Typical Source | Health Effects | Plant ID |
|--------------------|------|-----|--------|-------|------|-------------|-----------|--|--|----------|
| | | | | Low | High | | | | | |
| Chlorine, ppm | 4 | 4 | 0.9 | 0 | 0.9 | 2015 | No | Water additive used to control microbes. | Eye/nose irritation; stomach discomfort. | 00 |

Inorganic Contaminants, Plant ID: 00 Distribution Sampling

| Contaminant, units | MCLG | MCL | Result | Range | | Sample Date | Violation | Typical Source | Health Effects | Plant ID |
|--------------------|------|--------|--------|-------|-------------|-------------|-----------|---|---|----------|
| | | | | Low | High | | | | | |
| Copper, ppm | 1.3 | AL 1.3 | 0.18* | 0 | Exceeded AL | 2014 | No | Corrosion of household plumbing systems; Erosion of natural deposits; Leaching from wood preservatives. | Copper is an essential nutrient, but some people who drink water containing copper in excess of the action level over a relatively short amount of time could experience gastrointestinal distress. Some people who drink water containing copper in excess of the action level over many years could suffer liver or kidney damage. People with Wilson's Disease should consult their personal doctor. | 00 |

*= result is the 90th Percentile reading

Organic Contaminants Plant ID 00

| Contaminant, units | MCLG | MCL | Result | Range | | Sample Date | Violation | Typical Source | Health Effects | Plant ID |
|----------------------------|------|-----|--------|-------|------|-------------|-----------|---|---|----------|
| | | | | Low | High | | | | | |
| Total Trihalomethanes, ppb | NA | 80 | 9.5 | - | - | 2015 | No | By-product of drinking water disinfection | Some people who drink water containing trihalomethanes in excess of the MCL over many years may experience problems with their liver, kidneys, or central nervous systems, and may have increased risk of getting cancer. | 00 |
| Haloacetic Acids, ppb | NA | 60 | 8.34 | - | - | 2015 | No | By-product of drinking water disinfection | Some people who drink water containing haloacetic acids in excess of the MCL over many years may have an increased risk of getting cancer. | 00 |

Units Description:

- NA: Not applicable
- ND: Not detected
- NR: Not reported
- MNR: Monitoring not required, but recommended.
- ppm: parts per million, or milligrams per liter (mg/L)
- ppb: parts per billion, or micrograms per liter (µg/L)
- pCi/L: picocuries per liter (a measure of radioactivity)
- # of monthly positive samples: Number of samples taken monthly that were found to be positive
- mrem/yr: millirems per year (a measure of radiation absorbed by the body)

Important Drinking Water Definitions:

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

For more information contact:

Eric Barnhart
 P.O. Box 327
 311 Charles St.
 Hurlock, MD 21643
 Phone: 410-943-4181