The Hollidaysburg Borough Authority is pleased to present to you this year’s “Quality on Tap”, Hollidaysburg Borough Authority Water Quality Report for the 2019 Report Year. This report has been prepared in accordance with the US Environmental Protection Agency and the PA Department of Environmental Protection guidelines and is designed to inform you about the quality of water and services we deliver to you every day. Our constant goal is to provide you with a dependable supply of drinking water. We want you to understand the efforts we make to continually improve the water treatment process and to protect our water resources. We are committed to ensuring the quality of your water. The Hollidaysburg Borough Authority did exceed the 90th percentile for lead reporting requirements in 2019. Upon investigating, it has been determined that an error occurred during the sampling process that resulted in the high lead levels. Subsequent testing has shown lead levels to be far below the Maximum Contaminant Level permitted. AWA did have reporting violations in 2019. SDWAS(Turbidity)Results were submitted late for February 2019, Routine sampling was reported late in January & April 2019 and the Revised Total Coliform Report was submitted late. These did not pose any health threat.

OUR WATER SYSTEM
The Hollidaysburg water system is a consecutive system of the Altoona Water Authority (AWA) water system, which means we purchase our treated water from the AWA for distribution to our customers in the Hollidaysburg Borough Authority (HBA) system. The primary source of supply for the water provided to the Hollidaysburg Borough Authority originates from two surface water reservoirs, the Muleshoe Reservoir, which is owned by the HBA, and the Plane Nine Reservoir, which is owned and operated by the AWA. Both reservoirs are located on Cresson Mountain in Juniata Township, Blair County. The Plane Nine Reservoir is situated along the south side of Old Rt. 22, approximately 3 miles west of Duncansville. The Muleshoe Reservoir is located upstream from the Plane Nine Reservoir, in a forest area approximately ¼ mile south of Old Rt. 22, just past the Muleshoe overpass of Old Rt. 22. Raw (untreated) water is drawn from both reservoirs and is blended, filtered and treated at the AWA Plane Nine Filtration Plant. The Plane Nine Plant is located immediately below the Plane Nine Reservoir. The treated water is then pumped into the transmission system for distribution to, and consumption by, both the customers of the AWA system and the HBA system.

Water entering the Plane Nine Treatment Plant is first treated with ozone to destroy bacteria and other organisms and to reduce other organic materials that naturally occur in water. The water is then passed through sand filters to remove sediment and other particles. The filtered water is then treated with a corrosion inhibitor to reduce its ability to react with the water distribution pipes and customers’ plumbing systems. Finally, chlorine is applied to the water to provide disinfection of the water during its travels through the distribution system and into our customer’s plumbing systems.

Because the HBA water system is inter-connected to the AWA water distribution system, water is also available, during times of emergency and drought, from the many sources of the AWA, including several other surface water reservoirs within the AWA system. Since there is a potential for water to be provided to the HBA system from these alternative sources and since water may potentially pass through the interconnection, results of analysis conducted on these other sources of supply, have also been included in this report.
A source water assessment of the Plane Nine and Muleshoe Reservoir intakes, which supply water to the Plane Nine Filtration Plant, was completed in 2003 by the PA DEP. The assessment has found that the intakes are potentially most susceptible to transportation corridor (hiway) contaminants and illegal dumping, while a minor susceptibility exists for contamination from natural gas pipelines, public use, abandoned mine land and natural gas wells within the respective watershed areas. A summary of the report is available on the DEP website at [www.dep.state.pa.us](http://www.dep.state.pa.us) (Keyword: DEP source water). Copies of the complete report are also available from the Southcentral Regional Office, Records Management Unit at (717) 705-4732.

**2019 WATER QUALITY TABLE**

The HBA and the AWA routinely monitor, and test, for contaminants in your drinking water according to Federal and State laws. The following table shows the results of monitoring conducted by either HBA or the AWA for the period of January 1st to December 31st, 2019 and show results for every regulated contaminant detected in the water, even in the most minute traces. Some of the data in the table may be from test results obtained from prior years, in accordance with the Safe Drinking Water Act, and these dates are noted on the table where applicable. Concentrations of such contaminants do not change frequently in the source water and annual monitoring in not necessary to safeguard the quality of water. The table also contains the nature of each substance, the highest level allowed by regulation, the ideal goals for public health and the amount detected and the usual sources of contamination. In this table you will find many terms and abbreviations you might not be familiar with. Please refer to the Glossary to help you better understand these terms and abbreviations. It should also be noted that additional contaminants have been tested for during 2019 which were not detected to be present in the water.

See next page please ..................
### WATER QUALITY TABLE - 2019 TEST RESULTS (as most recent sampling as noted)

<table>
<thead>
<tr>
<th>Contaminant (Unit of measurement)</th>
<th>Violation Yes/No</th>
<th>Highest Level Detected</th>
<th>Range</th>
<th>MCLG</th>
<th>MCL (Highest Level Allowed)</th>
<th>Likely Source of Contamination</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Microbiological Contaminants</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total Coliform Bacteria</td>
<td>No</td>
<td>&lt;4% in August 2019</td>
<td>0-4%</td>
<td>0</td>
<td>Less than 5% positive of monthly samples</td>
<td>Naturally present in the environment</td>
</tr>
<tr>
<td>E. Coli Bacteria</td>
<td>No</td>
<td>None Detected</td>
<td>None</td>
<td>0</td>
<td>0</td>
<td>Human and animal fecal waste.</td>
</tr>
<tr>
<td>Turbidity (NTU)</td>
<td>No</td>
<td>0.12 NTU (Beavwood)</td>
<td>0.01–0.12 NTU</td>
<td>n/a</td>
<td>Treatment Techniques=0.3/0.5 55% monthly samples &lt;=0.3/0.5</td>
<td>Soil runoff</td>
</tr>
<tr>
<td>Inorganic Contaminants</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Copper (ppm) (2019)</td>
<td>No</td>
<td>1.08(a)</td>
<td>ND – 1.08 ppm</td>
<td>1 home exceeded the AL</td>
<td>1.3</td>
<td>AL = 1.3 ppm</td>
</tr>
<tr>
<td>Lead (ppm) (2019)</td>
<td>Yes</td>
<td>21.4(a)</td>
<td>ND – 21.4 ppm</td>
<td>4 homes exceeded the AL</td>
<td>0.015</td>
<td>AL = 15 ppm</td>
</tr>
<tr>
<td>Bromates</td>
<td>No</td>
<td>2.1 ppm</td>
<td>ND – 2.1 ppm</td>
<td>100</td>
<td>100 ppm</td>
<td>By-product of drinking water chlorination</td>
</tr>
<tr>
<td>Barium</td>
<td>No</td>
<td>0.045 ppm</td>
<td>0.029 to 0.045 ppm</td>
<td>2.0 ppm</td>
<td>2.0 ppm</td>
<td>Discharge of treated waste; Discharge from metal refineries; Erosion of natural deposits</td>
</tr>
<tr>
<td>Chromium (2018)</td>
<td>No</td>
<td>0.55 ppm</td>
<td>ND to 0.55 ppm</td>
<td>200 ppm</td>
<td>500 ppm</td>
<td>Discharge from steel &amp; pulp mills; Erosion of natural deposits</td>
</tr>
<tr>
<td>Nickel (2018)</td>
<td>No</td>
<td>1.74ppb</td>
<td>ND – 1.74ppb</td>
<td>100 ppm</td>
<td>100 ppm</td>
<td>Industrial source for copper activity</td>
</tr>
<tr>
<td>Chlorine</td>
<td>No</td>
<td>1.46 ppm</td>
<td>0.8 – 1.45 ppm</td>
<td>4(b)</td>
<td>4(b)</td>
<td>Water additive used to control microorganisms</td>
</tr>
<tr>
<td>TTHM (total trihalomethanes - ppb) from HBA distribution system</td>
<td>No</td>
<td>43.5 highest annual average</td>
<td>33.4 - 53.8</td>
<td>0</td>
<td>80</td>
<td>By-product of drinking water chlorination</td>
</tr>
<tr>
<td>Halogenated Acids (ppb) from HBA distribution system</td>
<td>No</td>
<td>0.5 highest annual average</td>
<td>5.2 – 13.8</td>
<td>0</td>
<td>60</td>
<td>By-product of drinking water chlorination</td>
</tr>
</tbody>
</table>

### SYNTHETIC ORGANIC CHEMICALS (SOC)

| Chlorinated (2017)               | No               | 0.0301ppb | 0 to 0.031ppb | NO | 2ppb | Residue of Jordan herbicide |

**The above referenced chemicals have no known health effects or MCL's.** Public Water Suppliers over 10,000 Must participate in the EPA’s SDWA Unregulated Contaminant Monitoring Rule Program. These parameters were detected while complying with EPA’s Unregulated Contaminant Monitoring Rule Rule #3 (2014) & #4 (2018 Bellwood & Tipton)

**Water Quality Table Notes:**

- **RAW Water Quality Table Notes:**
  - 887 Distribution samples were collected by AWA in 2019. All analyses complied with SDWA standards.
  - Volatile Organic Compound (VOC) sampling was conducted at all AWA treatment plants. All results were Non-Detect (ND) for all locations.
  - Inorganic Compound (IOC) sampling was conducted at all AWA treatment plants. IOC’s were ND except Barium, Chromium and Nickel.

- **Microbiological Contaminants**
  - Cryptosporidium 0.1 Crypts/100L 0 – 0.1 Naturally Present in the environment, Inadequately treated water may contain disease-causing organisms. NO
  - E. Coli Bacteria 78.2 MPN 1-78.2 Human and animal fecal waste. Gastrointestinal disorder NO
  - Turbidity Turbidity 9.05 Mill Run WTP (2019) 0.44 – 9.05 NTU Soil runoff Interferes with clarification and may indicate the presence of disease causing organism NO

- **RAW Water Quality Table Notes:**
  - The Altoona Water Authority began testing for E-Coli & Cryptosporidium in late 2015 to comply with the L12 Enhanced Surface Water Treatment Rule. All results have been within normal, expected ranges. L12 Testing for all sources was completed in February 2019.
WATER QUALITY AND HEALTH RELATED INFORMATION

The Hollidaysburg Borough Authority routinely monitors for constituents in your drinking water according to Federal and State laws. In order to ensure that tap water is safe to drink, the United States Environmental Protection Agency (EPA) and Pennsylvania Department of Environmental Protection (DEP) prescribe regulations which limit the amount of contaminants in water provided by public systems. These agencies require monitoring of the water to ensure that your drinking water does not exceed certain Maximum Contaminant Levels (MCL’s). These MCL’s are set at very stringent levels for the protection of public health. All sources of drinking water are subject to potential contaminants that are necessarily occurring or man-made. Those contaminants can be microbes, organic or inorganic chemicals, or radioactive materials. Drinking water, including bottled drinking water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of these contaminants does not necessarily indicate that the 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 1-800-426-4791. The sources of drinking water, including 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 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 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**, which may come from a variety of sources such as agriculture, stormwater runoff and residential uses.
- **Organic chemical contaminants**, including synthetic and volatile organics, 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.

**Potential Health Effects of Various Contaminants**

**Turbidity:** Interferes with disinfection. May provide a medium for microbial growth. May indicate a presence of disease causing organisms.

**Barium:** Some people who drink water containing barium in excess of the MCL over many years, could experience an increase in blood pressure.

**Copper:** Some people who drink water containing copper in excess of the Action Level may cause gastrointestinal distress over the short term and liver or kidney damage over a period of many years.

**Fluoride:** Some people who drink water containing fluoride in excess of the MCL over many years could get bone disease and pain and tenderness of the bones. In children, excess fluoride may cause mottling of the teeth.

**Lead:** Adults who drink water containing lead in excess of the Action Level could develop kidney and high blood pressure problems. Children who drink water containing lead in excess of the Action Level could experience delays in physical and mental development.

**Nitrate:** Infants below the age of 6 months who drink water containing nitrate in excess of the MCL could become seriously ill and, if untreated, may die. Symptoms may include shortness of breath, and blue baby syndrome.

**Chlorine:** Some people who use water containing chlorine well in excess of the MRDL could experience irritating effects to their eyes, nose and could experience stomach discomfort.

**Trihalomethanes & Halogenated Acetic Acids:** Some people who drink water containing these contaminants in excess of the MCL over many years may experience problems with their liver, kidneys or central nervous systems, and may have an increased risk of getting cancer.

**Some people may be more vulnerable to contaminants in drinking water than the general population.**

Immuno-compromised persons such as those 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 microbiological contaminants are available from the Safe Drinking Water Hotline at 1-800-426-4791. *Cryptosporidium* are microbial pathogens found in surface water throughout the U.S. The Altoona Water Authority began testing for E-Coli & Cryptosporidium in late 2015 to comply with the LT2 Enhanced Surface Water Treatment Rule. All results have been within normal, expected ranges. LT2 Testing for all sources was completed in February 2018. DEP also conducts Filter Plant Performance Evaluations at AWA’s facilities on a regular basis and has never found cryptosporidium in the finished water.
GLOSSARY

The following are definitions of terms and abbreviations used throughout this report and in the Water Quality Tables.

AWA - Altoona Water Authority
AL - Action Level. The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.
CDC - United States Center for Disease Control
DEP - Pennsylvania Department of Environmental Protection
Flocculate - Water treatment process whereby fine sediment and other particles are gathered together to form larger particles in order to improve the ability of the water filtration process to remove the particles.
HBA - Hollidaysburg Borough Authority
MCL - Maximum Contaminant Level. The highest level of a contaminant that is allowed in drinking water. MCL's are set as close to the MCLG's as feasible using the best available treatment technology.
MCLG - Maximum Contaminant Level Goal. The level of a contaminant in drinking water below where there is no known or expected risk to health. MCLG's allow for a margin of safety.
MRDL - Maximum Residual Disinfectant Level. The highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.
MRDLG - The level of a drinking water disinfectant below which there is no known or expected risk to health. MRDLG's do not reflect the benefits of the use of disinfectants to control microbial contamination.
Mrem/yr - Millirems per year. Measure of radiation absorbed by the body.
N/A - Not Applicable.
ND - Non-Detects. Laboratory analysis indicates that the contaminant is not present at a detectable level.
NTU - Nephelometric Turbidity Unit. Nephelometric Turbidity Unit is a measure of the clarity of water. Turbidity in excess of 5 NTU is just noticeable to the average person.
ppm - Parts per million or milligrams per liter (mg/l). One part per million corresponds to one minute in two years or a single penny in $10,000.
ppb - Parts per billion or micrograms per liter. One part per billion corresponds to one minute in 2,000 years, or a single penny in $10,000,000.
Treatment Technique - A required process intended to reduce the level of contaminant in drinking water.
Turbidity - The measurement of cloudiness of the water. We monitor turbidity because it is a good indicator of the effectiveness of filtration.

PLEASE PROTECT... We at the Hollidaysburg Borough Authority water system continuously strive to provide top water quality to every tap. We ask that all of our customers help us to protect our water sources. Please exercise care and caution if hiking, hunting or traveling through the water shed areas of the Muleshoe and Plane Nine reservoirs so that these sources of water supply do not become contaminated by activities in the watershed. Please also report immediately, to the HBA, any littering, spills or dumping that may impact the watershed areas and notify the Hollidaysburg Borough Police of any suspicious or unusual activities that may be observed in or around the reservoir sites or their respective watershed areas.

AND CONSERVE... The Authority would also request that customers conserve our water resources by conserving water in the home and at places of work. Repair leaks in your home, such as dripping faucets and leaks inside of the toilet as soon as they are discovered. Leaks, even small faucets drips, can waste significant amounts of water. Leaks inside a toilet can waste up to 200 gallons of water per day, or more. Test for leaks in a toilet by placing a few drops of food coloring in the toilet tank. If the colored water appears in the bowl (without flushing), the toilet is leaking. If you have a leaking faucet, a simple replacement of a rubber washer may save gallons of water from being wasted down the drain. In addition, hot water leaks waste not only water, but energy to heat the water. Please consider the following tips for conserving water around the home: Install low consumption toilets when remodeling or during new construction; place a weighted plastic jug in the toilet tank to displace and save an equal amount of water with each flush; install low-flow aerators on all faucets and low-flow shower heads on the shower spigot; turn the water off while brushing teeth or shaving; take showers instead of baths and turn off water while soaping or shampooing; refrigerate a bottle of water instead of letting the faucet water flow until cold enough to drink; do not pre-rinse dishes prior to loading in the dishwasher; use the proper water level or load size selection on washing machines; use a broom instead of a hose to clean driveways and sidewalks; water the lawn and garden during the coolest part of the day; mulch around trees and shrubs; and use native plants in landscaping since they require less care and watering than ornamental varieties.
CURRENT OCCUPANT

Thank you... for allowing us to continue to provide your family with clean, quality water this year. In order to maintain a safe and dependable water supply, we sometimes need to make improvements to the system that will benefit all of our customers. These improvements are sometimes reflected as rate structure adjustments. We thank you for your understanding when such adjustments are necessary. Please contact our office if you should have any questions concerning this report or the HBA water system in general.

HOW TO CONTACT US
If you have any questions about this report, or questions concerning the Hollidaysburg Borough Authority or the water system in general, you may contact:

Rick Pope, Borough of Hollidaysburg
401 Blair Street, Hollidaysburg PA 16648
695-7543, weekdays, 8AM to 4PM
r pope@hollidaysburgpa.org
www.hollidaysburgpa.org

We want our valued customers to be informed about their water utility. If you want to learn more, please attend any of our regularly scheduled meetings. They are held on the third Tuesday of each month, at 5:30 PM, in the Council Chambers of the Borough of Hollidaysburg, 401 Blair Street, Hollidaysburg.