# Blawnox Borough

376 Freeport Road, Blawnox, PA 15238

# ANNUAL DRINKING WATER QUALITY REPORT FOR YEAR 2021

# **PWS ID No. 5020004**

Este informe contiene información muy importante acerca da su agua potable. Haga que alguien lo traduzca o hable con alguien que lo entienda. (This report contains very important information about your drinking water. Have someone translate it for you, or speak to someone who understands it.)

Blawnox Borough is pleased to present our Annual Drinking Water Quality Report covering all water testing preformed between January 1 and December 31, 2021. This report 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 protect our water resources. We are committed to enduring the quality of your water.

If you have any questions about this report, or concerning your water utility, please contact Randall Stoddard, Borough Council Member, at (412) 828-4141. We want our customers to be informed about their water. If you want to learn more, please attend any of our regularly scheduled Borough Council meetings, which are held on the 2<sup>nd</sup> Wednesday of each month at 6:30 P.M. at the Borough Building, 376 Freeport Road, Blawnox, PA.

## Where Does Our Water Come From?

Blawnox Borough purchases its water from Fox Chapel Authority (FCA), which in turn, purchases its water from Pittsburgh Water and Sewer Authority (PWSA). Our water is obtained by PWSA and is treated surface water from the Allegheny River. PWSA treats the water it obtains from the Allegheny River at the PWSA Water Treatment Plant, located on the north shore of the Allegheny River at the eight (8) mile marker directly across from the Waterworks Mall on Freeport Road. In 2002, a *Source Water Assessment* of the Allegheny River was completed by the Pennsylvania Department of Environmental Protection (PA DEP). The Assessment has found that the Allegheny River is potentially most susceptible to contamination from transportation corridors, boating traffic, auto repair shops, utility substations, combined sewer overflows, petroleum pipeline, storm water runoff from residential developments and abandoned mines, and power plants. Overall, the Allegheny River has a moderate risk of significant contamination. A summary report of the Assessment is available at <a href="http://www.dep.state.pa.us/dep/deputate/watermgt/wc/Subjects/SrceProt/SourceAssessment/default.htm">http://www.dep.state.pa.us/dep/deputate/watermgt/wc/Subjects/SrceProt/SourceAssessment/default.htm</a> or by calling the *PA DEP Southwest Regional Office* at (412) 442-4000. To learn more about our watershed, go to the U.S. EPA Surf Your Watershed at <a href="https://www.epa.gov/surf">www.epa.gov/surf</a>.

## IMPORTANT HEALTH INFORMATION

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 microbiological contaminants are available from the:

Safe Drinking Water Hotline 1-800-426-4791

or

EPA's website at www.epa.gov/safewater/hfacts.html.

### **Water Testing Results**

Blawnox Borough routinely monitors for constituents in your drinking water according to Federal and State laws. We are pleased to report that our drinking water meets or exceeds all federal, state, and local requirements. The tables on the following pages show the results of our monitoring for the period of January 1, 2021 through December 31, 2021. The State allows us to monitor for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of our data is from prior years in accordance

with the Safe Drinking Water Act. The year that monitoring was done is noted on the results tables. Fox Chapel Authority, our supplier, conducted sampling for a series of unregulated contaminants. Unregulated contaminants are those for which the EPA has not established drinking water standards. The purpose of unregulated contaminant monitoring is to assist EPA in determining the occurrence of unregulated contaminants in drinking water and whether future regulation is warranted. If you are interested in examining the results, please contact Don Kendrick at 412-963-0212 or by stopping at the FCA office at 255 Alpha Drive, Pittsburgh, PA 15238.

#### **GLOSSARY**

In the following tables you may find many terms and abbreviations you might not be familiar with, to help you better understand these terms we've provided the following definitions:

**Action Level** (AL) – The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.

**Less Than** (<) – This sign indicates that the sample result is actually below the stated number.

*Maximum Contaminant Level* – The "Maximum Allowed" (MCL) is 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.

*Maximum Contaminant Level Goal* – The "Goal" (MCLG) is 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 Residual Disinfectant Level (MRDL)* – The highest level of disinfectant allowed in drinking water. There is convincing evidence that addition of disinfectant is necessary for control of microbial contaminants.

*Maximum Residual Disinfectant Level Goal (MRDLG)* – 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 contamination.

*Millirems per year (mrem/yr.)* – A measure of radiation absorbed by the body.

*Nephelometric Turbidity Unit (NTU)* - A measure of turbidity, or the clarity of the water. Turbidity in excess of 5 NTU is just noticeable to the average person.

*Non-Applicable* (N/A) – Does not apply.

Non-Detects (ND) – Laboratory analysis indicated that the contaminant is not present at a detectable level.

*Parts per billion (ppb) or Micrograms per liter* ( $\mu g/l$ ) – One part per billion corresponds to one minute in 2,000 years, or a single penny in \$10,000,000.

Parts per million (ppm) or Milligrams per liter (mg/l) – One part per million corresponds to one minute in two years, or a single penny in \$10,000.

*Picocuries per liter (pCi/L)* – A measure of the radioactivity in water.

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

*Turbidity* – A measure of the clarity of water.

|  |                     | BLAWNOX B                 | OROUGH TEST                               | ING RESUL | ΓS          |   |  |  |
|--|---------------------|---------------------------|---|-----------|-------------|---|--|--|
|  |                     | INORGA                    | ANIC CONTAM                               | INANTS    |             |   |  |  |
| Contaminant (Unit of Measurement)              | Violation<br>Yes/No | Level Detected            | Range                                     | MRDLG     | Sample Date | Likely Source of<br>Contamination                                       |  |  |
| Chlorine (ppm) Residual in Distribution System | No                  | 0.57 (a)                  | 0-0.57                                    | 4         | 2021        | Water additive for disinfection   |  |  |
|  |                     | VOLATILE (                | ORGANIC CON                               | TAMINANT: | S           |   |  |  |
| Contaminant (Unit of Measurement)              | Violation<br>Yes/No | Average Level<br>Detected | Range                                     | MCLG      | MCL         | Likely Source of<br>Contamination                                       |  |  |
| Total Trihalomethanes (ppb)                    | No                  | 58                        | 39-87                                     | 0         | 80          | By-product of drinking water chlorination                               |  |  |
| Haloacetic Acids (ppb)                         | No                  | 10                        | 0-15                                      | 0         | 60          | By-product of drinking water chlorination                               |  |  |
|  |                     | LEAD                      | AND COPPER                                | RULE      |             |   |  |  |
| LEAD AND COPPER RULE ROUND 1                   |                     |                           |   |           |             |   |  |  |
| Contaminant (Unit of Measurement)              | Violation<br>Yes/No | 90th Percentile           | Results                                   | MCLG      | MCL         | Likely Source of<br>Contamination                                       |  |  |
| Copper (ppm)                                   | No                  | 0.090                     | 1 site above AL<br>out of 20<br>sampled   | 1.3       | AL = 1.3    | Corrosion of household<br>plumbing systems; natural<br>deposits erosion |  |  |
| Lead (ppb)                                     | No                  | 3                         | No sites above<br>AL out of 20<br>sampled | 0         | AL = 15     | Corrosion of household plumbing systems; natural deposits erosion       |  |  |
|  |                     | LEAD AND                  | COPPER RULI                               | E ROUND 2 |             |   |  |  |
| Contaminant (Unit of Measurement)              | Violation<br>Yes/No | 90th Percentile           | Results                                   | MCLG      | MCL         | Likely Source of<br>Contamination                                       |  |  |
| Copper (ppm)                                   | No                  | 0.106                     | No sites above<br>AL out of 20<br>sampled | 1.3       | AL = 1.3    | Corrosion of household<br>plumbing systems; natural<br>deposits erosion |  |  |
| Lead (ppb)                                     | No                  | 2                         | No sites above<br>AL out of 20<br>sampled | 0         | AL = 15     | Corrosion of household plumbing systems; natural deposits erosion       |  |  |
|  |                     | LEAD AND                  | COPPER RULI                               | E ROUND 3 |             |   |  |  |
| Contaminant (Unit of Measurement)              | Violation<br>Yes/No | 90th Percentile           | Results                                   | MCLG      | MCL         | Likely Source of<br>Contamination                                       |  |  |
| Copper (ppm)                                   | No                  | 0.106                     | No sites above<br>AL out of 20<br>sampled | 1.3       | AL = 1.3    | Corrosion of household plumbing systems; natural deposits erosion       |  |  |
| Lead (ppb)                                     | No                  | 0                         | No sites above<br>AL out of 20<br>sampled | 0         | AL = 15     | Corrosion of household plumbing systems; natural deposits erosion       |  |  |
|  |                     |                           | LOGICAL CONT                              |           |             |   |  |  |

| PWSA TESTING RESULTS                       |                     |                               |                |             |                                     |  |  |  |  |  |
|--|---------------------|-------------------------------|----------------|-------------|-------------------------------------|--|--|--|--|--|
| INORGANIC AND ORGANIC CONTAMINANTS         |                     |                               |                |             |                                     |  |  |  |  |  |
| Contaminant (Unit of Measurement)          | Violation<br>Yes/No | Average Level Detected        | Range          | MCLG        | MCL                                 | Likely Source of<br>Contamination  |  |  |  |  |
| Flouride (ppm)                             | No                  | 0.80                          | (b)            | 2           | 2                                   | Erosion of natural deposits; water<br>additive which promotes strong<br>teeth; discharge from fertilizer and<br>aluminum factories |  |  |  |  |
| Nitrate (ppm)                              | No                  | 0.49                          | 0.37-0.71      | 10          | 10                                  | Runoff from fertilizers; leaching from sewage; natural deposits  |  |  |  |  |
| Barium (ppm)                               | No                  | 0.027                         | (b)            | 2           | 2                                   | Discharge from drilling wastes;<br>discharge from metal refineries;<br>erosion of natural deposits                                 |  |  |  |  |
| Calcium (ppm)                              | No                  | 27.88                         | 23.2-34.0      | 2           | 2                                   |  |  |  |  |  |
| CORROSION CONTROL                          |                     |                               |                |             |                                     |  |  |  |  |  |
| Contaminant (Unit of Measurement)          | Violation<br>Yes/No | Average Level<br>Detected     | Range          | MCLG        | MCL                                 | Likely Source of<br>Contamination  |  |  |  |  |
| Orthophosphate (ppm)                       | No                  | 1.6                           | 0.99-2.70      | None        | None                                | Water additive for corrosion control   |  |  |  |  |
| TOTAL ORGANIC CARBON                       |                     |                               |                |             |                                     |  |  |  |  |  |
| Contaminant (Unit of Measurement)          | Violation<br>Yes/No | Average Level<br>Detected     | Range          | MCLG        | MCL                                 | Likely Source of<br>Contamination  |  |  |  |  |
| Total Organic Carbon (TOC) (c) (% Removal) | No                  | No Quarters out of Compliance | 37.0% to 41.2% | N/A         | TT = 35%                            | Naturally present in the environment   |  |  |  |  |
| FOX CHAPEL AUTHORITY UCMR4 (2019)          |                     |                               |                |             |                                     |  |  |  |  |  |
| Contaminant (Unit of Measurement)          | Violation<br>Yes/No | Range                         | Units          | Sample Date | Location                            | Likely Source of<br>Contamination  |  |  |  |  |
| Manganese (ppb)                            | No                  | 0.59-2.00                     | ppb            | 2019        | PWSA<br>Connection at<br>River Road | Erosion of natural deposits; Discharge from Steel & Plating Mills  |  |  |  |  |
| HAA5 (ppb)                                 | No                  | 8.60-30.34                    | ppb            | 2019        | Distribution<br>System              | By-product of drinking water chlorination  |  |  |  |  |
| HAA6Br (ppb)                               | No                  | 5.92-11.80                    | ppb            | 2019        | Distribution<br>System              | By-product of drinking water chlorination  |  |  |  |  |
| HAA9 (ppb)                                 | No                  | 14.0-40.40                    | ppb            | 2019        | Distribution<br>System              | By-product of drinking water chlorination  |  |  |  |  |

# Table Footnotes:

- (a) Highest concentration of total chlorine detected.
- (b) Only one sample required.(c) Adequate removal of TOC may be necessary to control formation of disinfection by products.

## **Other Violations**

The Blawnox Borough Public Water System had a number of violations for the failure to meet the distribution disinfectant residual treatment technique for the period from January 1, 2021 through March 1, 2021 and May 3, 2021 through November 22, 2021. Disinfectant residual is the amount of chlorine or related disinfectant present in the pipes of the distribution system. If the amount of disinfectant is too low, organisms could grow in the pipes. We are required to maintain a minimum disinfectant residual concentration in the distribution system of at least 0.2 mg/L in the water supplied to consumers.

During the months of January through March and May through November, water samples showed a disinfectant residual concentration less than 0.2 mg/L in 31 samples. The standard is that the disinfectant residual cannot be under 0.2 mg/L in more than 5% of samples for two months in a row. As a result of these treatment technique violations, there was a risk that the water may have contained disease-causing organisms.

In addition, the Blawnox Borough Public Water System had Failure to Monitor violations in the months of August and November 2021. Results of regular monitoring are an indicator of whether or not our drinking water meets health standards. During these two months we failed to monitor for free chlorine during one of the weeks and therefore cannot be sure of the quality of our drinking water during that time.

There is nothing you need to do as a result of these treatment technique or monitoring violations. You do not need to boil your water or take other corrective actions. If you have a severely compromised immune system, have an infant, are pregnant, or are elderly, you may be at increased risk and should seek advice from your health care providers about drinking this water. General guidelines on ways to lessen the risk of infection by microbial contaminants are available from EPA's Safe Drinking Water Hotline at 1-800-426-4791.

Inadequately treated water may contain disease-causing organisms. These organisms include bacteria, viruses, and parasites which can cause symptoms such as nausea, cramps, diarrhea, and associated headaches.

These symptoms are not caused only by organisms in your drinking water, but also by other factors. If you experience any of these symptoms, and they persist, you may want to seek medical advice.

What does this mean? This is not an emergency. If it had been, you would have been notified within 24 hours. What is being done? We did the following to return disinfectant to an acceptable level: The Borough of Blawnox has received several grants to do work on the water tank and several valves in the distribution system. The Borough is currently in the process of having these repairs done. The Borough has also been working with the PA Department of Environmental Protection to come up with a plan to correct the deficiencies we have been seeing in our disinfectant residuals for the Borough.

For more information, please contact Blawnox Borough Assistant Borough Manager Mallori McDowell or Borough Manager Kathy Ulanowicz at 412-828-4141 or stop at the Borough Office at 376 Freeport Road, Blawnox, PA 15238.

Please share this information with all the other people who drink this water, especially those who may not have received this notice directly (for example, people in apartments, nursing homes, schools, and businesses). You can do this by posting this notice in a public place or distributing copies by hand or mail.

# **Additional Information**

Thank you for allowing us to continue providing your family with safe, high quality water this year. We at Blawnox Borough work to provide top quality water to every home and business we serve. We ask that all our customers help us protect our water sources, which are the heart of our community, our way of life and our children's future.

Since a number of federal acts passed, such as Public Health, Security and Bioterrorism Preparedness and Response Act and the Homeland Security Act, small water systems like ours are actively involved in security issues. We ask that our customers who live near our remote tank sites, pumping facilities and fire hydrants to notify the Borough Office or Police if they notice any suspicious activity and we will investigate.

#### **Educational Information**

All sources of drinking water are subject to potential contamination by constituents that are naturally occurring or man-made. Those constituents can be microbes, organic or inorganic chemicals, or radioactive materials.

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 before it is treated include:

**Microbial contaminants**, such as disease-causing viruses and bacteria which may come from sewage treatment plants, septic systems, agricultural livestock operations and wildlife.

**Inorganic chemical 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 and residential uses.

**Radioactive contaminants**, which can be naturally occurring or be the result of oil and gas production and mining activities.

**Organic chemical contaminants**, including synthetic and volatile chemicals, which are by-products of industrial processes and petroleum production, and can also come from gas stations, urban stormwater runoff and septic systems.

**Nitrates**, as a precaution we always notify physicians and health care providers in this area if there is ever a higher than normal level of nitrates in the water supply.

In order to ensure that tap water is safe to drink, the EPA and PA DEP prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. Our water is treated according to the EPA's regulations. Food and Drug Administration (FDA) and PA DEP regulations establish limits for contaminants in bottled water which must provide the same protection for public health.

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 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 (800-426-4791).

# **Should You Be Concerned About Lead?**

If present, elevated levels of lead in drinking water 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. Blawnox Borough 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 the EPA's website at <a href="http://www.epa.gov/safewater/lead">http://www.epa.gov/safewater/lead</a>.