Last year, the Newmanstown Water Authority provided its 1,003 customers with 40.0 million gallons of water (or approximately 109,600 gallons per day on average). Please contact us if you see a sign of a water leak, as we continuously strive to control expenses.

The *Source Water Assessment*, which was completed by the PA DEP, for our Authority, the Womelsdorf-Robesonia Joint Authority (WRJA) and the Borough of Richland continues to be implemented. **Our goal is to reduce the possibility of contaminants entering our water supply sources.** Protecting our wells is a critical element to delivering a safe and reliable supply of drinking water to our customers. Source water protection not only benefits the water supply, but ultimately the economic, social, and environmental well-being of our community. Several point and non-point potential sources of contamination (PSOC) were identified in the preparation of the plan. The Assessment found that our sources are potentially most susceptible to agricultural activities, but overall, the Authority's wellhead protection area has a low risk of contamination. The Authority continues to work with the farmers to minimize spreading manure near its well.

Specific activities in 2019 included:

- We met with Richland and WRJA officials to discuss a potential joint project that would result in our Authority's acquiring the current WRJA customers along North Sheridan Road.
- Our billing system was updated.
- Martz Technologies, of Berwick, completed the installation of new SCADA well pump controls and alarm system.
- A DEP Sanitarian performed its day-long triennial inspection of our system in March.
- Staff continued with the on-going replacement of customers' old water meters.
- The Board adopted updated Rules and Regulations in October; and copies, in booklet form, are available to customers upon request. A copy is given to all new customers moving into the Township.

If you have a question about this report or our water system, please contact our Chairman, John Kantner, at 610.589.1754. Written comments can be sent to the Authority at either address listed below. We want you to be informed about your water utility. If you want to learn more, please attend any of our meetings, which are held on the last Monday of each month at 7:00 p.m. at our office at 30 Avenue A.

Newmanstown Water Authority
PO Box 247
Newmanstown PA 17073
Phone: (610) 589-1754
Fax: (610) 589-4046
Email: newmanstownwa@gmail.com

Undetected Contaminants Tested for by Newmanstown Water Authority

Inorganic Chemicals (2018)
Antimony
Arsenic
Asbestos (2012)
Barium
Beryllium
Cadmium
Chromium
Cyanide (Free)
Fluoride
Mercury
Nickel
Nitrite (2019)
Selenium
Thalium

Volatile Organic Chemicals (2017)
1,1,1-Trichloroethane
1,1,2-Trichloroethane
1,1-Dichloroethylene
1,2,4-Trichlorobenzene
1,2-Dichloroethane
1,2-Dichloropropane
Benzene
Carbon tetrachloride
Chlorobenzene
cis-1,2-Dichloroethylene
Dichloromethane
Ethylbenzene
Para-Dichlorobenzene
o-Dichlorobenzene
Styrene
Tetrachloroethylene
Toluene
trans-1,2-Dichloroethylene
Trichloroethylene
Vinyl chloride
Xylenes (Total)

Synthetic Organic Chemicals (2017)
1,2-Dibromo, 3-Chloroprop
2,3,7,8-TCDD (Dioxin)
2,4-D
2,4,5-TP Silvex
Alachlor
Atrazine
Benzo(A)Pyrene
Carbofuran
Chlordane
Dalapon
Di (2-Ethylhexyl) Adipate
Di (2-Ethylhexyl) Phthalate
Dinoseb
Diquat
Endothall
Endrin
Ethylene Dibromide
Glyphosate
Heptachlor
Heptachlor Epoxide
Hexachlorobenzene
Hexachlorocyclopentadiene
Lindane
Methoxychlor
Oxymal (Vydate)
PCB's
Pentachlorophenol
Piclorem
Simazine
Toxaphene

Disinfection By-Products
Bromoform (THM)
Monochloracetic Acid (HAA)
Monobromoacetic Acid (HAA)
Dibromoacetic Acid (HAA)

Radiological Contaminants (2012)
Combined Uranium

Microbiological Contaminants
Total Coliforms

Note: *All contaminants are not sampled every year. Those contaminants which were not sampled in 2019 are noted with the last year of sampling in the table above.*

Know the Health Effects *(Continued from reverse side)*

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 advice from your health care provider.

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. Newmanstown Water Authority 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 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*.

In 2007, the Authority finalized the upgrade of the water distribution system which eliminated all lead piping.

Since December 2016, the Authority is debt-free, having made at that time the final payment on the loan taken out the for the 2007 water system upgrade and improvement project.

As was reported in last year's report, new quarterly charges went into effect September 1, 2019, consisting of: a $1.00 hydrant maintenance fee; and a $2.00 PA DEP fee to cover the cost of a new annual charge imposed on the Authority by the State. Our rate schedule also was amended in 2019 so that: (i) a customer with a ½" service line is assessed the same minimum charge as a customer with a 5/8" service line; and (ii) "Service Line Rates" shall be substituted for "Meter Rates". The Minimum Charge is assessed on the basis of the service line size, not the size of the meter.

Este informe contiene información muy importante sobre su agua potable. Tradúzcalo ó hable con alguien que lo entienda bien.

Das Bericht hot wichdich Sache tzu saage wege eire Drinkwasser.

FOR THE YEAR 2019

Public Water Supply Identification (PWSID) Number is 7380028

Drinking Water Quality Report

We're very pleased to provide you with our twenty-second annual *Drinking Water Quality Report*. We want to keep you informed about the excellent water and services we have delivered to you over the past year.

Our goal is and always has been to provide to you a safe and dependable supply of drinking water. Our water sources consist of two deep wells which are located in Millcreek Township. We have not used surface water from the Gold Stream since 1993.

Newmanstown Water Authority

What does this mean?

The Authority routinely monitors for constituents 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, 2019. All drinking water, including bottled drinking water, may be reasonably expected to contain at least small amounts of some constituents. It is important to remember that the presence of these constituents does not necessarily pose a health risk.

As you can see by the Table, our system had no exceedances. We're proud that our drinking water meets or exceeds Federal and State requirements. The Authority submitted the CCR Certification Form to the PA DEP in 2019, but it was not submitted until September 2019. This issue has since been resolved.

Definitions:

In these tables you will find some terms and abbreviations you might not be familiar with. To help you better understand these terms we've provided the following definitions:

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

MCL - *Maximum Contaminant Level:* The "Maximum Allowed" 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.

MCLG - *Maximum Contaminant Level Goal*: The "Goal" 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.

mg/l - *Milligrams per liter or Parts per million (ppm): one* milligram per liter corresponds to one minute in two years or a single penny in $10,000.

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 - *Maximum Residual Disinfectant Level Goal*: 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.

pCi/l - *Picocuries per liter:* Picocuries per liter is a measure of the radioactivity in water.

ug/l - *Micrograms per liter* or *Parts per billion (ppb):* one part per billion corresponds to one minute in 2,000 years, or a single penny in $10,000,000.

Impurities Detected by the Newmanstown Water Authority

Contaminant	NWA Highest Detected Level		Range of NWA Detected Levels		Highest Level Allowed (MCL)		EPA MCLG (EPA Goal)		Sources of Contamination	Violation Y/N
Inorganic Chemicals										
Nitrate	4.25	mg/l	3.5 - 4.25	mg/l	10	mg/l	10	mg/l	Geology, farmland runoff, septic tanks, sewage	N
Radioactive Contaminants										
Gross Alpha, 1/2015	5.5	pCi/l	5.5	pCi/l	15	pCi/l	0	pCi/l	Erosion of natural deposits	N
Radium-(226&228), 1/2018	2.08	pCi/l	2.08	pCi/l	5	pCi/l	0	pCi/l	Erosion of natural deposits	N
Disinfectant Byproducts										
Trihalomethanes (TTHMs)	29.6	Ppb	12.2 -29.6	ppb	80	ppb	N/A	ppb	By-product of drinking water chlorination	N
Haloacetic Acids (HAA5's)	6.5	Ppb	3.1 - 6.5	ppb	60	ppb	N/A	ppb	By-product of drinking water chlorination	N
Bromodichloromethane (THM)	3.5	ug/l	3.3 - 3.5	ug/l	N/A	ug/l	N/A	ug/l	By-product of drinking water chlorination	N
Chlorodibromomethane (THM)	1.6	ug/l	1.6	ug/l	N/A	ug/l	N/A	ug/l	By-product of drinking water chlorination	N
Chloroform (THM)	24.4	ug/l	7.3 - 24.4	ug/l	N/A	ug/l	N/A	ug/l	By-product of drinking water chlorination	N
Dichloroacetic Acid	5	ug/l	3 - 5	ug/l	N/A	ug/l	N/A	ug/l	By-product of drinking water chlorination	N
Trichloroacetic Acid	2.0	ug/l	ND - 2	ug/l	N/A	ug/l	N/A	ug/l	By-product of drinking water chlorination	N
Disinfectant Residual										
Chlorine	1.12	mg/l	0.75 - 1.12	mg/l	MRDL = 4	mg/l	MRDLG = 4	mg/l	Water additive used to control microbes	N

Entry Point Disinfectant Residual

Contaminant	Minimum Disinfectant Residual	Lowest Level Detected	Range of Detections	Units	Sample Date	Sources of Contamination	Violation Y/N
Chlorine, Location 103	0.4	0.73	0.73 - 1.26	mg/l	1/3/2019	Water additive used to control microbes	N

Lead and Copper Rule[1,2] (9/2019)

Contaminant	NWA Range of Detected Values	90th Percentile Value	Action Level (AL)	EPA MCLG (EPA Goal)	# of Sites Above AL of Total Sites	Source of Contamination	Violation Y/N
Copper	0.045 - 0.137 mg/l	0.135 mg/l	1.3 mg/l	1.3 mg/l	0 of 10	Pipes, geology, wood preservatives	N
Lead	ND - 2 ppb	2 ppb	15 ppb	0	0 of 10	Corrosion of old pipes, geology	N

Notes:
1. The PA DEP allows us to monitor for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. Items not sampled for in 2019 are noted with the last year of sampling.
2. The action level for Lead and Copper serves as a trigger for water systems to take additional treatment steps if exceeded in more than 10% of tap water samples. The action level for Lead is 15 ppb, and the action level for Copper is 1.3 mg/l.

Know The Health Risks:

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 the water poses a health risk. In order to ensure that tap water is safe to drink, EPA and DEP prescribe regulations which limit the amount of certain contaminants in water provided by public water systems. The Food and Drug Administration (FDA) and DEP regulations establish limits for contaminants in bottled water which must provide the same protection for public health. More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hotline at 1-800-426-4791.

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 run-off, 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 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.

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. The Environmental Protection Agency (EPA) and The Center Disease Control (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 (800-426-4791).

MCL's are set at very stringent levels for health effects. To understand the possible health effects described for many regulated constituents, a person would have to drink 2 liters of water every day at the MCL level for a lifetime to have a one-in-a-million chance of having the described health effect.

…Continued on reverse side