

BOROUGH OF POINT PLEASANT
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Point Pleasant Borough — Water Quality Report 2017

WATER CUSTOMER POINT PLEASANT, NEW JERSEY 08742

Is my water safe?

We are pleased to present this year's Annual Water Quality Report (Consumer Confidence Report) as required by the Safe Drinking Water Act (SDWA). This report is designed to provide details about where your water comes from, what it contains, and how it compares to standards set by regulatory agencies. This report is a snapshot of last year's water quality. We are committed to providing you with information because informed customers are our best allies.

Where does my water come from?

Your water comes from (4) groundwater wells located within Point Pleasant in addition to water purchased from the Brick Township Municipal Utilities Authority and New Jersey American Water. The Borough of Point Pleasant wells are between 80 to 1300 feet deep and draw their water from the Kirkwood, Englishtown and Raritan formations. The water from Brick is drawn from wells, Metedeconk River and is treated at their facilities on Route 88 West. Water from New Jersey American comes from Englishtown and Raritan formations along with surface water from the Jumping Brook Treatment Plant.

Source Water Assessment and its availability

The Source Water Assessment Report and summary for this public water system is available at www.state.nj.us/dep/watersupply/swap/ or by contacting NJDEP, Bureau of Safe Drinking Water at (609-292-5550).

Susceptibility Ratings for Point Pleasant water sources

If a system is rated susceptible for a contaminant category, it does not mean a customer is or will be consuming contaminated water. The rating reflects the potential for contamination of source water, not the existence of contamination. Public Water Systems are required to monitor for regulated contaminants and to install treatment if any contaminants are detected at frequencies and concentrations above allowable levels. As a result of assessments, DEP may customize (change existing) monitoring schedules based on the susceptible ratings.

	Pathogens	Nutrients	Pesticides	Volatile Organic Compounds	Inorganics	Radio Nuclides	Radon	Disinfection Byproduct Precursors
Sources	H M L	H M L	H M L	H M L	H M L	H M L	H M L	H M L
Wells 4	4	1 3	4	1 3	1 3	1 2 1	1 3	1 3
GUDI-0								
Surface Water intake								

How can I get involved?

If you would like more information about this report or have any questions you may contact Bob Forsyth, Licensed Water Plant Operator at 732-892-1287 or send an email to publicworks@ptboro.com. We want to keep you informed about your water supply and distribution system. You may also attend any of the regular Borough Council meeting held at Town Hall located at 2233 Bridge Avenue on the first and third Tuesdays of each month at 7:00 p.m.

Water Conservation Tips

Did you know that the average U.S. household uses approximately 400 gallons of water per day or 100 gallons per person per day? Luckily, there are many low-cost and no-cost ways to conserve water. Small changes can make a big difference – try one today and soon it will become second nature. Water your lawn at the least sunny times of the day. WATERING HOURS 7:00 a.m. to 9:00 a.m. ONLY!! Odd/even house numbers from May 15 – September 15. Fix toilet and faucet leaks. Take short showers. A five minute shower uses 4-5 gallons of water compared to up to 50 gallons for a bath. Turn the faucet off while brushing teeth and shaving. 3-5 gallons go down the drain per minute. Teach your kids about water conservations to ensure a future generation that uses water wisely. Make it a family effort to reduce next month's water bill.

Additional Information for 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. Point Pleasant 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 <http://www.epa.gov/safewater/lead>.**

Reference Key (for tables on following pages)

MCLG = Maximum Contaminant Level Goal	MRDL= Maximum Residential Disinfectant Level	NA= Not Applicable	ppm: parts per million, or milligrams per liter (mg/L)
MCL = Maximum Contaminant Level	MRDLG= Maximum Residential Disinfectant Level Goal	ND= Not detected	ppb: parts per billion, or micrograms per liter (ug/L)
RUL = Recommend Upper Limits	MPL= Maximum Permissible Level	TT= Treatment Technique	pCi/L=picocuries per liter (a measure of radioactivity)
NR= Monitoring not required, but recommended	MPL= Maximum Permissible Level	AL= Action Level	LRAA= Locational Running Annual Average
MNR= Monitored Not Regulated			



In order to ensure that tap water is safe to drink, EPA prescribes regulations which limit the amount of contaminants in water provided by public water systems. The table below lists all of the drinking water contaminants that we detected during the calendar year of this report. Although many more contaminants were tested, only those substances listed below were found in your water. All sources of drinking water contain some naturally occurring contaminants. At low levels, these substances are generally not harmful in our drinking water. Removing all contaminants would be extremely expensive, and in most cases, would not provide increased protection of public health. A few naturally occurring minerals may actually improve the taste of drinking water and have nutritional value at low levels. 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 vary significantly from year to year, or the system is not considered vulnerable to this type of contamination. As such, some of our data, though representative, may be more than one year old.

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 Water Drinking Hotline (800-426-4791).

2017 Water Quality Report - Point Pleasant Borough - NJ1524001									
Contaminants	MCLG or MRDLG	MCL, TT, or MRDL	Average for Your Water	Range		# Samples Exceeding AL	Sample Date	Violation	Typical Source
				Low	High				
Disinfectants & Disinfectant By-Products									
(There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants)									
Chlorine (as Cl ₂) (ppm)	4	4	0.60	0.20	1.55	NA	2017	No	Water additive used to control microbes
THM's (Total Trihalomethanes) (ppb) STAGE 2	ND	80	24.3	1.7	70.0	NA	2017	No	By-product of drinking water chlorination
Total Coliform Bacteria	0	<5%	NA	NA	NA	1	NA	No	Typical Source: Naturally present in the environment
Haloacetic Acids (HAAs) (ppb) STAGE 2	ND	60	11.47	1.36	33.8	NA	2017	No	By-product of drinking water chlorination
Inorganic Contaminants									
Nitrate [measured as Nitrogen] (ppm)	10	10	0.71	<0.02	2.79	NA	2017	No	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
Barium (ppm)	2	2	0.064	0.029	0.097	NA	2017	No	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits
Copper - action level at consumer taps (ppm)	1.3	1.3	0.056*	ND	0.219	0	2017	No	Corrosion of household plumbing systems; Erosion of natural deposits
Lead - action level at consumer taps (ppb)	0	15	1.39*	ND	50.3	1	2017	No	Corrosion of household plumbing systems; Erosion of natural deposits
Radioactive Contaminants									
Radium (combined 226/228) (pCi/L)	0	5	2.89	< 1.0	3.93	NA	2017	No	Erosion of natural deposits
Alpha emitters (pCi/L)	0	15	4.41	3.10	5.79	NA	2017	No	Erosion of natural deposits

* As required by NJDEP, these values are the levels detected at the 90th percentile of all samples taken. Therefore, 90% of the samples had levels at or below this value.

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: Microbial contaminants, such as viruses and bacteria, that 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 storm water 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 storm water 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 storm water runoff, and septic systems; and 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.

Unregulated Contaminants Monitoring Rule (UCMR3)

During 2013 & 2014, Point Pleasant participated in the third phase of the Unregulated Contaminant Monitoring Rule (UCMR3). Unregulated contaminants are those for which the EPA has not established drinking water standards. Monitoring assists the EPA in determining the occurrence of these compounds and whether or not regulation is warranted. For general information on UCMR3, visit <http://water.epa.gov/lawsregs/rulesregs/sdwa/ucmr/ucmr3> or contact EPA's Safe Drinking Water Hotline at 1-800-426-4791. Testing for these parameters will be done again in 2019.

Microbiological Contaminants

As required by NJDEP, the Borough collects twenty (20) samples per month and has them tested for coliform bacteria. These samples are taken at various location within the Borough's distribution system.

Coliform bacteria are naturally occurring in our everyday environment. These bacteria are not harmful themselves, but their presence is an indicator that there is the potential for other forms of bacteria. All water delivered to the Borough's distribution system is adequately treated to prevent the formation of such bacteria.

In September of 2017, one (1) sample tested positive for Coliform bacteria. As required by NJDEP rules, follow up samples were taken at the subject location and at two (2) other locations within three (3) service connections of the positive sample. All these samples tested negative for Coliform bacteria. In addition, we tested the water from the nearest well and that well also tested negative for Coliform bacteria.

Current NJDEP rules require that the Borough test all active wells when a positive sample is received. Having failed to do so in the designated time frame, the Borough subsequently tested all of its wells and all tested negative for Coliform bacteria.

Secondary Contaminants

Contaminant	Units	RUL	Amount Detected
Iron ₁	ppm	0.3	ND to 0.286
Aluminum	ppm	0.2	ND to 0.35
Manganese ₂	ppm	0.05	ND to 0.07
Sodium	ppm	50	6.85 - 41.8
Chloride	ppm	250	5.43 - 71.7

¹The recommended upper limit for iron is based on unpleasant taste of the water and staining of laundry. Iron is an essential nutrient, but some people who drink water with iron levels well above the recommended upper limit could develop deposits of iron in a number of organs of the body.

²The recommended upper limit for manganese is based on staining of laundry. Manganese is an essential nutrient, and toxicity is not expected from high levels which would be encountered in drinking water.

Additional Contaminants

In an effort to insure the safest water possible the State has required us to monitor some contaminants not required by Federal regulations. Of those contaminants only the ones listed below were found in your water

Contaminants	State MCL	Your Water	Violation	Explanation and Comment
MTBE	70 ppb	ND to 0.22	No	Octane enhancer in unleaded gas

For additional information please contact:

Bob Forsyth
730 Albert Clifton Avenue
Point Pleasant, NJ 08742
732-892-1287

WEBSITE: www.ptboro.com
publicworks@ptboro.com

Reference Key (for tables on following pages)

MCLG = Maximum Contaminant Level Goal	MRDL= Maximum Residential Disinfectant Level	NA= Not Applicable	ppm= parts per million, or milligrams per liter (mg/L)
MCL = Maximum Contaminant Level	MRDLG= Maximum Residential Disinfectant Level Goal	ND= Not detected	ppb= parts per billion, or micrograms per liter (ug/L)
RUL = Recommend Upper Limits	MPL= Maximum Permissible Level	TT= Treatment Technique	pCi/L=picocuries per liter (a measure of radioactivity)
NR= Monitoring not required, but recommended	MPL= Maximum Permissible Level	AL= Action Level	LRAA= Locational Running Annual Average
MNR= Monitored Not Regulated			

Those substances not listed in this table were not found in the treated water supply.

Contaminant	Units	MCL	MCLG	Range Detected	Highest Level Detected	Compliance Achieved	Typical Source
Regulated Substances¹							
Microbiology							
Total coliform	cfu	coliform detected no more than 5% of monthly samples	0	NA	0.09 % ¹²	Yes	Naturally present in environment
Inorganic Chemicals							
Fluoride ²	ppm	4	4	ND to 0.84	0.84	Yes	Erosion of natural deposits; Water additive which promotes strong teeth
Total Chromium	ppb	100	100	ND to 1.4	1.4 ⁷	Yes	Discharge from steel and pulp mills; Erosion of natural deposits
Nitrate	ppm	10	10	ND to 0.35	0.35	Yes	Runoff from fertilizer use; industrial or domestic wastewater discharges; erosion of natural deposits
Treatment Byproducts Stage-2							
Total Trihalomethanes [TTHMs]	ppb	80	NA	4.3 to 89.7	59.9 ³	Yes	By-product of drinking water disinfection
Total Haloacetic Acids [THAA5]	ppb	60	NA	0.0 to 41.0	24.0 ³	Yes	By-product of drinking water disinfection
Turbidity							
Turbidity ⁹	ntu	TT	NA	0.06 to 0.28	0.28	Yes	Soil runoff
Treatment Byproducts Precursor Removal							
Total Organic Carbon	ppm	TT	NA	0.31 to 2.20	2.20	Yes	Naturally present in the environment
Disinfectants							
Chlorine / Chloramines	ppm	MRDL = 4	MRDLG = 4	0.09 to 2.85	1.40 ⁴	Yes	Water additive used to control microbes
Radiological Substances							
Alpha Emitters ¹¹	pCi/L	15	0	ND to 5.0	5	Yes	Erosion of natural deposits
Combined Radium 226 and Radium 228	pCi/L	5 ¹⁰	0	ND to 1.3	1.3	Yes	Erosion of natural deposits
Tap water samples were collected for lead and copper analysis from homes in the service area							
Contaminant	Units	Action Level	MCLG	Amount Detected (99th %tile)	Homes Above Action Level	Compliance Achieved?	Typical Source
Copper 2017	ppm	1.3	1.3	0.125	none	Yes	Corrosion of household plumbing systems
Lead 2017	ppb	15	0	3	4	Yes	Corrosion of household plumbing systems

Contaminant	Units	RUL	Amount Detected
Iron ⁵	ppm	0.3	ND to 0.11 ⁷
Manganese ⁶	ppm	0.05	ND to 0.045 ⁷
Sodium ⁸	ppm	50	20.6 to 45.0 ⁷
Hardness	ppm	250	76 to 120 ⁷

Unregulated Contaminant Monitorbg	Units	NJDEP Guidance Level	Range Detected	Highest Level Detected	Use or Environmental Source
Chlorate	ppb	NA	ND to 760	760	Agricultural defoliant or desiccant; disinfection byproduct; and used in production of chlorine dioxide.
Hexavalent Chromium	ppb	NA	ND to 0.53	0.53	Major sources of hexavalent chromium (chromium-6) in drinking water are discharges from steel and pulp mills, and erosion of natural deposits of chromium-3. Hexavalent Chromium is not currently regulated as an individual substance. NJ American Water voluntarily performed this monitoring based on recommendations from USEPA. For more information on Hexavalent Chromium (Chromium 6), please visit our web site.
Strontium	ppb	NA	37.6 to 508.5	508.5	Naturally occurring element; commercial use of strontium has been in the faceplate of glass cathode ray tube televisions to block x-ray emissions.
1,4- Dioxane	ppb	NA	ND to 0.50	0.50	Used as a solvent in manufacturing and processing of paper, cotton, textile products, automotive coolant, cosmetics and shampoos.

1. Under a Waiver granted by the State of New Jersey Department of Environmental Protection, our system does not have to monitor for synthetic organic chemicals/pesticides because several years of testing have indicated that these substances do not occur in our source water. The SDWA regulations allow monitoring waivers to reduce or eliminate the monitoring requirements for volatile organic chemicals and synthetic organic chemicals. Our system received monitoring waivers for synthetic organic chemicals.

2. Fluoride is added to the water (Shrewsbury and Ocean County areas of Coastal North System.) because the concentrations of these substances do not change frequently.

3. This level represents the highest annual quarterly Locational Running Average calculated from the data collected.

4. This level represents the highest annual quarterly Average calculated from the data collected.

5. The recommended upper limit for iron is based on unpleasant taste of the water and staining of laundry. Iron is an essential nutrient, but some people who drink water with iron levels well above the recommended upper limit could develop deposits of iron in a number of organs of the body.

6. The recommended upper limit for manganese is based on staining of laundry. Manganese is an essential nutrient, and toxicity is not expected from high levels of which would be encountered in drinking water.

7. The State of New Jersey allows us to monitor for some substances less than once per year. Some of our data, though representative, is more than one year old.

8. For healthy individuals, the sodium intake from water is not important, because a much greater intake of sodium takes place from salt in the diet. However, sodium levels above the recommended upper limit may be of concern to individuals on a sodium restricted diet.

9. Turbidity is a measure of the cloudiness of the water. 100% of the turbidity readings were below the treatment technique requirement of 0.3 ntu. We monitor it because it is a good indicator of the effectiveness of our filtration system.

10. Radium 226 and Radium 228 have a combined MCL of 5 pCi/L.

11. Certain minerals are radioactive and may emit a form of radiation known as alpha radiation. Some people who drink water containing alpha emitters in excess of the MCL over many years may have an increased risk of getting cancer.

12. Maximum percentage of positive samples collected in any one month.

Overview

In 2017, Brick Utilities continued participation in the Partnership for Safe Drinking Water, a national initiative to help achieve operational excellence in surface water treatment. The Partnership is a voluntary cooperative effort between the U.S. Environmental Protection Agency, AWWA and other drinking water organizations, with more than 200 surface water utilities throughout the United States.

Brick Utilities maintains a laboratory that is certified by the New Jersey Department of Environmental Protection. The laboratory, which has operated continuously since 1975, is a key component of Brick Utilities Comprehensive Water Quality Monitoring Program. The Authority conducts monitoring of its source water treatment process and finished water in excess of the number and types of tests that are required by state or federal regulations. The Authority believes that a comprehensive source water testing program is essential, considering that 74% of the water that is treated comes from the Metedeconk River. The river is fed by a 70-square mile watershed that is subject to both natural and manmade contamination, which can cause the quality of the source or untreated water to change.

Water Source

Brick Utilities treats approximately 3.5 billion gallons of water each year. In addition to water from the Metedeconk River and Brick Reservoir, the Authority draws water from high volume wells that tap into the Potomac-Raritan-Magothy Aquifer. These wells are nearly 2,000 feet deep and are not influenced by surface phenomena. The Authority also draws a relatively small amount of water from the Cohansey Aquifer.

The New Jersey Department of Environmental Protection (NJDEP) has completed and issued the Source Water Assessment Report and Summary for public water systems, which is available at www.state.nj.us/dep/swap or by contacting the NJDEP, Bureau of Safe Drinking Water at (609) 292-5550.

The source water assessment performed on our three sources determined the following:

SUSCEPTIBILITY RATINGS FOR BRICK TOWNSHIP MUA SOURCES

Sources	Pathogens			Nutrients			Pesticides			Volatile Organic Compounds			Inorganics			Radio-nuclides			Radon			Disinfection Byproduct Precursors		
	H	M	L	H	M	L	H	M	L	H	M	L	H	M	L	H	M	L	H	M	L	H	M	L
Wells—11		6	5	7		4		7	4	7		4	7		4	7	4			7	4	7	4	
GUDI—2	2			2						2			2			2				2		2		
Surface water intakes—1	1				1				1	1		1						1			1	1		

The table provides ratings of high (H), medium (M) or low (L) for each contaminant category. If a system is rated highly susceptible for a contaminant category, it does not mean a customer is or will be consuming contaminated drinking water. The rating reflects the *potential* for contamination of source water, not the existence of contamination. Public water systems are required to monitor for regulated contaminants and to install treatment if any contaminants are detected at frequencies and concentrations above allowable levels. NJDEP found the following potential contaminant sources within the source assessment areas for our sources: underground storage tanks, known contaminated sites, cemeteries, discharge to ground/surface water permits, storm sewer permits, landfills. If you have questions regarding the Source Water Assessment Report or Summary please contact the Bureau of Safe Drinking Water at swap@dep.state.nj.us or call (609) 292-5550.

Explanation of Violations

There were no violations.

Variations/Exemptions

This water system was given a waiver by the NJDEP for exemption from monitoring for synthetic organic compounds (SOCs). SOC's include substances like pesticides, herbicides, and plasticizers. The waiver was given after the NJDEP performed extensive analyses on the Metedeconk River.

Unregulated Contaminants

The U.S. Environmental Protection Agency (EPA) is working to resolve several scientific issues that will allow it to set cryptosporidium safety standards. The Authority's testing performed in 2017 exhibited no detectable presence of cryptosporidium on any occasion. No precaution about the drinking water is currently needed for the general public. The Authority's water undergoes extensive treatment to include coagulation, sedimentation, and filtration. Cryptosporidium is effectively removed by filtration, consequently no finished water delivered by Brick Utilities has ever shown any presence of cryptosporidium.

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 transplants, people with HIV/AIDS or other immune system disorders, some elderly, and infants may be particularly at risk from infection. These individuals 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 are available from the Safe Drinking Water Hotline (800) 426-4791.

2017 WATER QUALITY REPORT – BRICK TOWNSHIP MUA – PWSID# NJ1506001

Contaminant	Violation Y/N	Brick Twp	MUA	Unit Measurement	MCLG	MCL	Major sources in Drinking Water
MICROBIOLOGICAL CONTAMINANTS							
Total Coliform	N	2.2 %		% Samples	0	5% of monthly samples are positive	Naturally present in the environment.
Turbidity (1)	N	0.06 Avg. 0.20 Max. 100 % samples <0.3 NTU		NTU	N/A	95% samples < 0.3 NTU TT	Soil runoff. Turbidity is a measure of cloudiness in the water. We monitor it because it is a good indicator of water quality. High turbidity can hinder the effectiveness of disinfectants.
INORGANIC CONTAMINANTS							
Antimony	N	0.37 Max. Range: ND-0.37		ppb	6	6	Discharge from petroleum refineries; fire retardants; ceramics; electronics; solder.
Arsenic	N	2.78 Max. Range: ND-2.78		ppb	0	10	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes.
Barium	N	0.09 Max. range: 0.04-0.09		ppm	2	2	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits.
Cadmium	N	0.91 Max. range: ND-0.91		ppb	5	5	Corrosion of galvanized pipes; Erosion of natural deposits; Discharge from metal refineries; Runoff from waste batteries and paints.
Chromium	N	0.94 Max. range: ND-0.94		ppb	100	100	Discharge from steel and pulp mills; Erosion of natural deposits.
Copper (2)	N	90th percentile: 0.03 0 sites > AL		ppm	1.3	AL=1.3	Corrosion of household plumbing systems; erosion of natural deposits.
Fluoride	N	0.08 Max. range: ND-0.08		ppm	4	4	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories.
Lead (2)	N	90th percentile: 2.95 0 sites > AL		ppb	0	AL=15	Corrosion of household plumbing systems; erosion of natural deposits.
Nitrate (as Nitrogen)	N	1.01 Max. range: ND-1.01		ppm	10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits.
Selenium	N	1.38 Max. range: ND-1.38		ppb	50	50	Discharge from petroleum and metal refineries; Erosion of natural deposits; Discharge from mines.
Thallium	N	0.79 Max range: ND-0.79		ppb	0.5	2	Leaching from one-processing sites; Discharge from Electronics, glass, and drug factories.
DISINFECTANTS AND DISINFECTION BY-PRODUCTS							
THM (total trihalomethanes)	N	STAGE2 highest LRAA 38.6 range: 20.3-37.7		ppb	N/A	80	By-product of drinking water disinfection.
HAA5 (Haloacetic Acids)	N	STAGE2 highest LRAA 24.9 range: 10.8-25.4		ppb	N/A	60	By-product of drinking water disinfection.
Chloramine	N	highest annual avg: 1.29 range: 0.06-1.76		ppm	4 (MRDLG)	4 (MRDL)	Water additive used to control microbes.
Chlorine	N	highest annual avg: 0.99 range: 0.07-1.55		ppb	4 (MRDLG)	4 (MRDL)	Water additive used to control microbes.
RADIOLOGICAL CONTAMINANTS (3)							
Combined Radium	N	1.03		pCi/L	0	5	Erosion of natural deposits.

Key To Table (above)

AL = Action Level
TT = Treatment Technique
ND = None Detected

MCL = Maximum Contaminant Level
MCLG = Maximum Contaminant Level Goal
NTU = Nephelometric Turbidity Units
MRDL = Maximum Residual Disinfectant Level

pCi/L = picocuries per liter (a measure of radioactivity)
ppm = parts per million, or milligram per liter (mg/l)
ppb = parts per billion, or micrograms per liter (ug/l)
MRDLG = Maximum Residual Disinfectant Level Goal

1. Turbidity is a measure of the cloudiness of water and is a good indicator of the effectiveness of the filtration system.
2. Lead and copper were tested in 2017, in accordance with permit requirements.
3. The State allows us to monitor for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. This data, though representative, is more than one year old. Radiological monitoring was conducted by Brick Township MUA in 2014, in

See advice about special populations and a source for further information on the next page.

Required Additional Health Information

To ensure that tap water is safe to drink, EPA prescribes limits on the amounts of certain contaminants in water provided by public water systems. FDA regulations establish limits for contaminants in bottled 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 Safe Drinking Water Hotline at (800) 426-4791.

The sources of drinking water (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 have been present in source water include:

(A) Microbial contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.

(B) Inorganic contaminants, such as salts and metals, which can be naturally occurring or resulting from urban storm runoff, industrial or domestic wastewater discharges, oil and gas production, mining or farming.

(C) Pesticides and herbicides, which may come from a variety of sources such as agriculture, storm water runoff, and residential uses.

(D) 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 storm water runoff, and septic systems.

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

(F) Radon, which is a colorless, odorless, cancer-causing gas that occurs naturally in the environment. For more information go to <http://www.nj.gov/dep/rpp/radon/index.htm> or call 800-648-0394.

(G) Disinfection By-Product Precursors, which are formed when disinfectants (usually chlorine) used to kill pathogens react with dissolved organic material (for example leaves) present in surface water.

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

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. Brick Utilities 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 <http://epa.gov/safewater/lead>.

Special Considerations Regarding Children, Pregnant Women, Nursing Mothers and Others

Children may receive a slightly higher amount of a contaminant present in the water than do adults, on a body weight basis, because they may drink a greater amount of water per pound of body weight than do adults. For this reason, reproductive or developmental effects are used for calculating a drinking water standard if these effects occur at lower levels than other health effects of concern. If there is insufficient toxicity information for a chemical (for example, lack of data on reproductive or developmental effects), an extra uncertainty factor may be incorporated into the calculation of the drinking water standard, thus making the standard more stringent, to account for additional uncertainties regarding these effects. In the cases of lead and nitrate, effects on infants and children are the health endpoints upon which the standards are based.

LEAD: Infants and children who drink water containing lead in excess of the action level could experience delays in their physical or mental development. Children could show slight deficits in attention span and learning abilities. Adults who drink this water over many years could develop kidney problems or high blood pressure.

Infants and young children are typically more vulnerable to lead in drinking water than the general population. It is possible that lead levels at your home may be higher than at other homes in the community as a result of materials used in your home plumbing. If you are concerned about elevated lead levels in your home water, you may wish to have your water tested and flush your tap for 30 seconds to 2 minutes before using tap water. Additional information is available from the Safe Drinking Water Hotline at (800) 426-4791.

National Primary Drinking Water Regulation Compliance and Other Monitoring

Brick Utilities is active in protecting the environment and community, and the health and safety of customers is this Authority's highest priority. This Authority welcomes questions residents may have about Brick Utilities and the quality of water. For more information, call Joseph Maggio, P.E., Director of Water Quality at (732) 458-7000 Ext. 4226. Water quality data for community water systems throughout the United States is available on the internet at www.waterdata.com.

An Explanation of the Water Quality Data Table

The chart on the preceding page provides representative analytical results of water samples routinely collected through 2017 from your water system. Please note the following definitions:
Maximum Contaminant Level (MCL): The highest level of 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 (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.

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

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

Maximum Residual Disinfectant Level (MRDL): 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.

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.