



ANNUAL DRINKING WATER QUALITY REPORT FOR 2022

JERICHO WATER DISTRICT | 125 CONVENT RD. SYOSSET, NY 11791
(PUBLIC WATER SUPPLY ID# 2902831)

INTRODUCTION

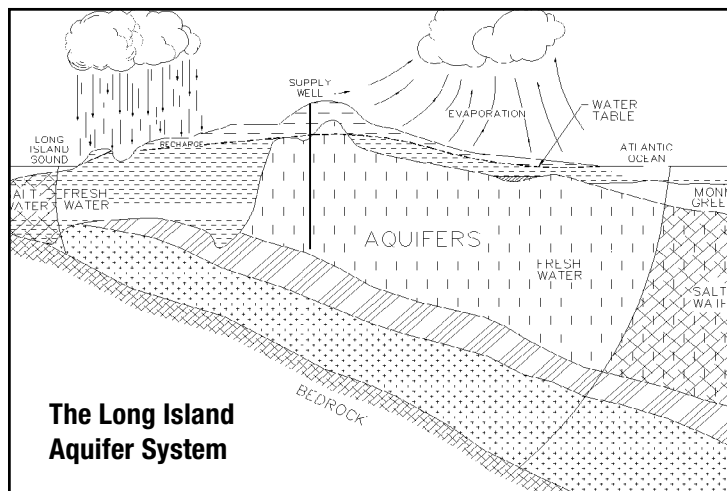
To comply with State regulations, the Jericho Water District will annually issue a report describing the quality of your drinking water. The purpose of this report is to raise your understanding of drinking water and awareness of the need to protect our drinking water sources. This report provides an overview of last year's water quality. Included are details about where your water comes from, what it contains, and how it compares to State standards. An annual supplement is available at the Jericho Water District Office. This supplement contains water quality data for each well operated during 2022.

If you have any questions about this report or concerning your drinking water, please contact District Superintendent, Peter F. Logan, at (516) 921-8280 or the Nassau County Department of Health at (516) 227-9692. We want you to be informed about your drinking water. If you care to learn more, please attend any of our regularly scheduled Board of Commissioners meetings. The meetings are held at the District office at 125 Convent Rd. Syosset, on the first and third Wednesday of each month, commencing at 8:30 a.m.

WHERE DOES OUR WATER COME FROM?

In general, 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 materials, and can pick up substances resulting from the presence of animals or from human activities. Contaminants that may be present in source water include microbial contaminants; inorganic contaminants; pesticides and herbicides; organic chemical contaminants; and radioactive contaminants. In order to ensure that tap water is safe to drink, the State and the EPA prescribe regulations which limit the amount of certain contaminants in water provided by public water systems. The State Health Department and the FDA's regulations establish limits for contaminants in bottled water which must provide the same protection for public health.

All of our water is pumped from 25 wells, ranging in depth from 372-688



**The Long Island
Aquifer System**

feet, located throughout the District on 15 different well sites. The water delivered to your tap is a blend of water produced by the individual wells. 5 wells are located in Syosset, 5 are in Woodbury, 1 is in Laurel Hollow, 3 are in Jericho, 5 are in Muttontown, 3 are in Brookville, 2 are in Old Brookville and 1 is in Glen Head. 24 of the wells pump from the Magothy Aquifer and one well pumps from the Lloyd Aquifer. Six storage tanks have a total storage capacity of 12.90 million gallons with a usable storage capacity of 8.79 million gallons. The District covers 37 square miles and maintains 353 miles of mains. The District maintains interconnections with the following neighboring water districts - City of Glen Cove, Hicksville, Locust Valley, Old Westbury, Oyster Bay, Plainview, Roslyn, South Huntington, and Westbury. In the event of an emergency, the Jericho Water District could supply or be supplied with water via these interconnections. During 2022, our system did not experience any restriction of our water source.

WATER TREATMENT

In compliance with the requirements of the Nassau County Board of Health, the District adds Sodium Hydroxide to the water at the individual wells, prior to distribution. This is added to adjust the pH of the water so as to minimize its corrosive effect on water mains and water services. Additionally, the District adds chlorine at the level of .9 mg/l leaving the pumping stations and maintains a chlorine residual of .2 mg/l at the most remote point in the District. The District currently has 10 wells being treated at the source, for elevated levels of Volatile Organic Compounds (VOC); 6 wells are using Granular Activated Carbon and 4 are treated using Packed Tower Aeration.

SOURCE WATER ASSESSMENT

The NYSDOH, with assistance from the local health department and the CDM consulting firm, has completed a source water assessment for this system, based on available information. Possible and actual threats to this drinking water source were evaluated. The source water assessment includes a susceptibility rating based on the risk posed by each potential source of contamination and how rapidly contaminants can move through the subsurface to the wells. The susceptibility of a water supply well to contamination is dependent upon both the presence of potential sources of contamination within the well's contributing area and the likelihood that the contaminant can travel through the environment to reach the well. The susceptibility rating is an estimate of the potential for contamination of the source water, it does not mean that the water delivered to consumers is or will become contaminated. See section "Are there contaminants in our drinking water?" for a list of the contaminants that have been detected. The source water assessments provide resource managers with additional information for protecting source waters into the future.

Drinking water is derived from 25 wells. The source water assessment has rated most of the wells as having a high susceptibility to industrial solvents and a high susceptibility to nitrates. The very high susceptibility to industrial solvents is due primarily to point sources of contamination related to transportation routes and commercial/industrial facilities and related activities in the assessment area. The high susceptibility to nitrate contamination is attributable to un-sewered residential and commercial land use and related practices in the assessment area, including fertilizing lawns.

A copy of the assessment, including a map of the assessment area, is available for review at the District's main office.

FACTS AND FIGURES

Our water system serves 58,000 people through 19,661 services. The total water produced in 2022 was 4,830,416,000 gallons. The daily average of water treated and pumped into the distribution system is 13,234,016 gallons per day. The maximum daily pumpage occurred on August 7th, 2022 wherein 32.61 million gallons were pumped. The minimum daily pumpage occurred on January 20th, 2022 when 5.03 million gallons of water were pumped. For 2022, the unaccounted-for water was calculated at 10.8%, which is slightly above the DEC goal of 10%. The unaccounted-for water is comprised of water used for sampling, to flush mains and hydrants, street cleaning and fighting fires. Water lost through leaking services, hydrants, mains, and out-of-order water meters accounts for the remainder of the 496,783,000 million gallons. The meters that were not recording correctly have been replaced. In 2022, water customers within the boundary of the District were billed for water as follows:

Minimum Charge per Quarter - \$12.00

Minimum Charge per Quarter - \$11.30

0 – 10,000 gallons	\$1.20 per 1,000
10,001 – 30,000 gallons	\$1.26 per 1,000
30,001 – 100,000 gallons	\$2.40 per 1,000
Over 100,000 gallons	\$3.18 per 1,000

Tax Rate - \$26.303 per \$100.00 of assessed valuation.

Outside the boundary of the District, customers were billed as follows:

Minimum Charge per Quarter - \$15.60

0 – 10,000 gallons	\$1.56 per 1,000
10,001 – 30,000 gallons	\$1.64 per 1,000
30,001 – 100,000 gallons	\$3.12 per 1,000
Over 100,000 gallons	\$4.13 per 1,000

On Long Island, the average family of four uses approximately 120 – 150 gallons of water per person per day. Based on this average, the quarterly cost for water would range from \$68.45 - \$94.80

Annual Demand Charge – Fire Line and Standpipe Connections:

Size of Connection From District Mains	Charge per Annum Payable in Advance
Up to 2" Diameter	\$40.00
3" Diameter	\$56.00
4" Diameter	\$114.00
6" Diameter	\$333.00
8" & larger Diameter	\$666.00

SPECIAL NEEDS CUSTOMERS

Some of the District's customers may require a continuous supply of water. Most commonly, these are people who use dialysis machines at home. If you have this special need, kindly inform the District by letter, so that we can update our emergency plan.

ARE THERE CONTAMINANTS IN OUR DRINKING WATER?

As the State regulations require, we routinely test your drinking water for numerous contaminants. These contaminants include: total coliform, turbidity, inorganic compounds, nitrate, nitrite, lead and copper, volatile organic compounds, total trihalomethanes, radiological and synthetic organic compounds. In 2022, we conducted tests for over 150 contaminants. We detected 50 of these contaminants. The table presented below depicts which compounds were detected in your drinking water. The State allows us to test for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of our data, though representative, is more than one year old.

“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. Jericho Water District is responsible for providing high quality drinking water and removing lead pipes but cannot control the variety of materials used in plumbing components in your home. You share the responsibility for protecting yourself and your family from the lead in your home plumbing. You can take responsibility by identifying and removing lead materials within your home plumbing and taking steps to reduce your family's risk. Before drinking tap water, flush your pipes for several minutes by running your tap, taking a shower, doing laundry or a load of dishes. You can also use a filter certified by an American National Standards Institute accredited certifier to reduce lead in drinking water. If you are concerned about lead in your

drinking water and wish to have it tested, contact the Jericho Water District at (516) 921-8280. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available at <http://www.epa.gov/safewater/lead>.

As you can see by the table, our system had no violations, but we have learned through our testing that some contaminants have been detected; however, these contaminants were detected below New York State requirements. Although nitrate was detected below the MCL, it was detected at 10.0 mg/L which is greater than one-half of the MCL. Therefore, we are required to present the following information on nitrate in drinking water:

“Nitrate in drinking water at levels above 10 mg/l is a health risk for infants of less than six months of age. High nitrate levels in drinking water can cause blue baby syndrome. Nitrate levels may rise quickly for short periods of time because of rainfall or agricultural activity. If you are caring for an infant, you should ask for advice from your health care provider.”

It should be noted that all drinking water, including bottled drinking water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily indicate that water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hotline (1 800-426-4791) or the Nassau County Department of Health at (516) 227-9692..

DEFINITIONS:

Maximum Contaminant Level (MCL): The highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible. The MCL is established by the E.P.A. It is defined in terms of health risk as follows – If a person drank one-half gallon of water each day for 70 years and that water contained a contaminant at the MCL, there would be a one in a million risk of developing an adverse reaction to that substance.

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.

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.

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

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

Level 1 Assessment: A Level 1 assessment is an evaluation of the water system to identify potential problems and determine, if possible, why total coliform bacteria have been found in our water system.

Level 2 Assessment: A Level 2 assessment is an evaluation of the water system to identify potential problems and determine, if possible, why an E. coli MCL violation has occurred and/or why total coliform bacteria have been found in our water system on multiple occasions.

Non-Detects (ND): Laboratory analysis indicates that the constituent is not present.

Nephelometric Turbidity Unit (NTU): A measure of the clarity of water. Turbidity in excess of 5 NTU is just noticeable to the average person.

Milligrams per liter (mg/l): Corresponds to one part of liquid in one million parts of liquid (parts per million - ppm).

Micrograms per liter (ug/l): Corresponds to one part of liquid in one billion parts of liquid (parts per billion - ppb).

Nanograms per liter (ng/l): Corresponds to one part of liquid to one trillion parts of liquid (parts per trillion - ppt).

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

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

Million Fibers per Liter (MFL): A measure of the presence of asbestos fibers that are longer than 10 micrometers.

90TH Percentile: The value reported for the lead and copper represent the 90th percentile. A percentile is a value on a scale of 100 that indicates the percent of a distribution that is equal to or below it. The 90th percentile is equal to or greater than 90% of the lead and copper values detected at your water system.

n/a: Not applicable, i.e., no value is assigned by regulatory authorities.

Contaminant	Violation (Yes/No)	Date of Sample	Level Detected Avg / Max (Range) ⁽¹⁾	Unit Measurement	MCLG OR MRDLG	Regulatory Limit (MCL or MRDL)	Likely Source of Contamination
MICROBIOLOGICAL CONTAMINANTS							
Total Coliform	No	12/27/2022	1 sample positive ⁽²⁾	n/a	0	TT - greater than or equal to 5% samples positive	Naturally present in the environment
Inorganic Contaminants							
Barium	No	9/13/2022	0.0076 (0.004 - 0.0076)	mg/L	2	MCL - 2	Discharge of drilling wastes; Discharge from metal refineries; Erosion of natural deposits
Calcium	No	11/29/2022	12.7 (1.3 - 12.7)	mg/L	n/a	n/a	Naturally occurring
Chloride	No	9/19/2022	12.2 (5.8 - 15.2)	mg/L	n/a	MCL - 250	Naturally occurring or indicative of road salt contamination
Copper	No	6/1/2022	0.0128 (0.00073 - 0.025)	mg/L	1.3	MCLG - 1.3	Corrosion of household plumbing systems; Erosion of natural deposits; leaching from wood preservatives.
Magnesium	No	6/1/2022	2.64 (0.78 - 4.5)	mg/L	n/a	n/a	Naturally occurring
Nickle	No	6/1/2022	0.0037 (0.001 - 0.0065)	ug/L	n/a	18	Naturally occurring
Perchlorate	No	10/11/2022	12.5 (ND - 12.5)	ug/L	n/a	18 ⁽⁶⁾	Oxygen additive in solid fuel propellant for rockets, missiles, and fireworks.
Sodium	No	9/13/2022	24.1 (4.3 - 24.1)	mg/L	n/a	20 / 270 ⁽³⁾	Naturally occurring; Road salt; Water softeners; Animal waste
Sulfate	No	9/19/2022	17.8 (6.3 - 17.8)	mg/L	n/a	MCL - 250	Naturally occurring
Zinc	No	3/15/2022	0.075 (ND - 0.075)	mg/L	n/a	MCL - 5	Naturally occurring; Mining waste
INORGANIC CONTAMINANTS (NITRATE AND NITRITE)							
Nitrate as N	No	6/27/2022	10.0 (0.18 - 10.0)	mg/L	10	MCL - 10	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
Nitrate-Nitrite (as N)	No	6/27/2022	10.0 (0.18 - 10.0)	mg/L	10	MCL - 10	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
PHYSICAL CHARACTERISTICS							
Calcium Hardness	No	11/29/2022	31.7 (3.3 - 31.7)	mg/L	n/a	n/a	Naturally occurring
Corrosivity	No	3/15/2022	-5.22 [-5.22 - (-1.16)]	-	n/a	n/a	Naturally occurring
pH	No	6/14/2022	7.88 (5.5 - 7.88)	units	n/a	n/a	Naturally occurring
Total Alkalinity	No	11/29/2022	65 (1.5 - 65)	mg/L	n/a	n/a	Naturally occurring
Total Dissolved Solids	No	9/13/2022	140 (7.8 - 140)	mg/L	n/a	n/a	Naturally occurring
Total Hardness	No	9/13/2022	39.6 (7.8 - 39.6)	mg/L	n/a	n/a	Naturally occurring
DISINFECTANT							
Chlorine Residual	No	5/21/2022	1.21 (0.00 - 1.21)	mg/L	n/a	MRDL - 4 ⁽⁴⁾	Water additive used to control microbes
VOLATILE ORGANIC CONTAMINANTS							
1,1 - Dichloroethene	No	10/26/2022	1 (ND - 1)	ug/L	n/a	MCL - 5	Discharge from industrial chemical factories
1,2 - Dichloropropane	No	10/26/2022	2.5 (ND - 2.5)	ug/L	n/a	MCL - 5	Discharge from industrial chemical factories
Chlorodifluoromethane	No	9/1/2022	4.2 (ND - 4.2)	ug/L	n/a	MCL - 5	Used as a refrigerant
Tetrachloroethene	No	10/26/2022	0.71 (ND - 0.71)	ug/L	n/a	MCL - 5	Discharge from metal degreasing sites and other factories
Trichloroethene	No	10/26/2022	4 (ND - 4)	ug/L	n/a	MCL - 5	Discharge from metal degreasing sites and other factories
OTHER PRINCIPAL ORGANIC CONTAMINANTS							
1,1 - Dichloroethane	No	10/5/2022	1.3 (ND - 1.3)	ug/L	n/a	MCL - 5	Released into the environment as fugitive emissions and in wastewater during production and use as a chemical intermediate solvent; used in vinyl chloride manufacturing; chlorinated solvent intermediate; coupling agent in anti-knock gasoline; degreasing agent
Chloromethane (Methyl Chloride)	No	4/11/2022	1.1 (ND - 1.1)	ug/L	n/a	MCL - 5	Used in organic chemistry; used as an extractant for greases, oils, and resins; as a solvent in the rubber industry; as a refrigerant, blowing agent and propellant in polystyrene foam production; as an anesthetic; as an intermediate in drug manufacturing; as a food additive, a fumigant and a fire extinguisher.

Contaminant	Violation (Yes/No)	Date of Sample	Level Detected Avg / Max (Range) ⁽¹⁾	Unit of Measurement	MCLG OR MRDLG	Regulatory Limit (MCL, MRDL, or AL)	Likely Source of Contamination
SYNTHETIC ORGANIC CONTAMINANTS INCLUDING PESTICIDES AND HERBICIDES							
1,4 - Dioxane	No	9/1/2022	10.9 (ND - 10.9)	ug/L	n/a	MCL - 1	Released into the environment from commercial and industrial sources and is associated with inactive and hazardous waste sites.
Perfluorooctanoic Acid	No	8/1/2022	7.9 (ND - 7.9)	ng/L	n/a	MCL - 10	Released into the environment from widespread use in commercial and industrial application
Perfluorooctanesulfonic Acid	No	10/4/2022	2.0 (ND - 2.0)	ng/L	n/a	MCL - 10	Released into the environment from widespread use in commercial and industrial application
Disinfection By-Products - Routine Sampling							
Bromodichloromethane	No	12/19/2022	1 (ND - 1)	ug/L	n/a	MCL - 80	By-product of drinking water chlorination needed to kill harmful organisms.
Bromoform	No	12/19/2022	0.84 (ND - 0.84)	ug/L	n/a	MCL - 80	By-product of drinking water chlorination needed to kill harmful organisms.
Chloroform	No	12/19/2022	1.1 (ND - 1.1)	ug/L	n/a	MCL - 80	By-product of drinking water chlorination needed to kill harmful organisms.
Dibromochloromethane	No	12/19/2022	1.2 (ND - 1.2)	ug/L	n/a	MCL - 80	By-product of drinking water chlorination needed to kill harmful organisms.
Total Trihalomethanes	No	12/19/2022	4.1 (ND - 4.1)	ug/L	n/a	MCL - 80	By-product of drinking water chlorination needed to kill harmful organisms.
RADIOACTIVE CONTAMINANTS							
Gross Alpha Activity	No	6/30/2022	1.80 (-0.55 - 1.80)	pCi/L	0	MCL - 15	Erosion of natural deposits
Gross Beta	No	7/1/2022	3.77 (0.084 - 3.77)	pCi/L	0	50 ⁽⁶⁾	Decay of natural deposits and man-made emissions
Combined Radium 226/228	No	6/30/2022	1.58 (0.35 - 1.58)	pCi/L	0	MCL - 5	Erosion of natural deposits
Uranium	No	6/30/2022	0.9 (ND - 0.9)	ug/L	0	MCL - 30	Erosion of natural deposits
UNREGULATED CONTAMINANT MONITORING RULE 5 CONTAMINANTS ⁽⁷⁾							
Perfluoroheptanoic Acid (PFHpA)	No	8/1/2022	25.7 (ND - 25.7)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
Perfluorohexanesulfonic Acid (PFHxS)	No	12/6/2022	3 (ND - 3)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
Perfluorononanoic Acid (PFNA)	No	8/1/2022	1.8 (ND - 1.8)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
Perfluorobutanesulfonic Acid (PFBS)	No	2/1/2022	1.9 (ND - 1.9)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
Perfluorobutanoic Acid (PFBA)	No	2/1/2022	51.2 (ND - 51.2)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
Perfluoropentanoic Acid (PFPeA)	No	2/1/2022	48.0 (ND - 48.0)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
Perfluorohexanoic Acid (PFHxA)	No	2/1/2022	46.3 (ND - 46.3)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
6:2 Fluorotelomer Sulfonic Acid (6:2 FTS)	No	12/6/2022	17.2 (ND - 17.2)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
Perfluoropentane Sulfonic Acid (PFPeS)	No	10/4/2022	7.5 (ND - 7.5)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
Nonafluoro-3,6-dioxheptanoic Acid (NFDHA)	No	12/6/2022	6.3 (ND - 6.3)	ng/L	n/a	MCL - 50,000	Released into the environment through consumer products and industrial processes
DISINFECTATION BY-PRODUCTS - STAGE II SAMPLING							
Total Trihalomethanes	No	8/2/2022	1.43 (ND - 2.7)	ug/L	n/a	MCL - 80	By-product of drinking water chlorination needed to kill harmful organisms
Contaminant	Violation (Yes/No)	Date of Sample	90th Percentile and Range	Unit of Measurement	MCLG	Regulatory Limit (AL)	Likely Source of Contamination
LEAD AND COPPER CONTAMINANTS							
Copper	No	8/21/2022	0.18 (0.038 - 0.28) ⁽⁸⁾	mg/L	1.3	AL - 1.3	Corrosion of household plumbing systems; Erosion of natural deposits; leaching from wood preservatives
Lead	No	8/16/2022	1.4 (ND - 5.9) ⁽⁹⁾	ug/L	0	AL - 15	Corrosion of household plumbing systems; Erosion of natural deposits

Notes:

- (1) When compliance with the MCL is determined more frequently than annually, the data reported is the highest average or maximum of any of the sampling points used to determine compliance and the range of detected values.
- (2) In March 2020, total coliforms were detected in 1 of 63 routine compliance samples collected in our system. Coliforms are bacteria that are naturally present in the environment and are used as an

indicator that other potentially harmful, waterborne pathogens may be present or that a potential pathway exists through which associated contamination may enter the drinking water system. After this detection, additional samples were collected, and total coliforms were not detected in those samples. Since total coliforms were detected in <5% of the samples collected during each of those months, the system did not trigger Level 1 assessments. It should be noted that E. coli,

- with human and animal fecal waste, was not detected in any of the samples collected.
- (3) Water containing more than 20 mg/L of sodium should not be used for drinking by people on severely restricted sodium diets. Water containing more than 270 mg/L of sodium should not be used for drinking by people on moderately restricted sodium diets.
 - (4) The value presented represents the Maximum Residual Disinfectant Level (MRDL). MRDLs are not currently regulated, but in the future, they will be enforceable in the same manner as MCLs.
 - (5) An MCL has not been established for this contaminant. The value presented represents a State Action level.
 - (6) The State considers 50 pCi/L to be the level of concern for beta particles.
 - (7) The Unregulated Contaminant Monitoring

- Rules 3/4 (UCMR3/4) are US EPA water quality sampling programs which monitor unregulated but emerging contaminants in drinking water. The results of the sampling will determine if such contaminants need to be regulated in the future.
- (8) The level presented represents the 90th percentile of the 30 sites tested. A percentile is a value on a scale of 100 that indicates the percent of a distribution that is equal to or below it. The 90th percentile is equal to or greater than 90% of the copper values detected at your water system. In this case, thirty samples were collected at your water system and the 90th percentile value was the twenty-seventh highest value (0.19 mg/L).
 - (9) The level presented represents the 90th percentile of the 30 sites tested. The action level for lead was not exceeded at any of the sites tested.

regulations, some people may be more vulnerable to disease causing microorganisms or pathogens 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 from their health care provider about their drinking water. EPA/CDC guidelines on appropriate means to lessen the risk of infection by Cryptosporidium, Giardia and other microbial pathogens are available from the Safe Drinking Water Hotline (1 800-426-4791).

NON – DETECTED CONTAMINANTS

According to State regulations, the Jericho Water District routinely monitors your drinking water for various contaminants. The following contaminants were analyzed for but not detected:

Organics (also including Synthetic Organics and Other Principal Organics) - 1,1,1,2-Tetrachloroethane, 1,1,1-trichloroethane, 1,1,2,2-tetrachloroethane, 1,1,2-trichloroethane, 1,1,2-trichlorotrifluoroethane, 1,1-dichloropropene, 1,2,3-trichlorobenzene, 1,2,4-trichlorobenzene, 1,2,4-trimethylbenzene, 1,2-dichlorobenzene, 1,2-dichloroethane, 1,3,5-trimethylbenzene, 1,3-dichlorobenzene, 1,3-dichloropropane, 1,4-dichlorobenzene, 2,2-dichloropropane, 2/4-chlorotoluene, benzene, bromobenzene, bromochloromethane, bromomethane, carbon tetrachloride, chlorobenzene, chloroethane, chloromethane, dibromomethane, dichlorodifluoromethane, ethylbenzene, hexachloro-1,3-butadiene, isopropylbenzene, methylene chloride, styrene, toluene, trichlorofluoromethane, vinyl chloride, cis-1,2-dichloroethene, cis-1,3-dichloropropene, m&p-xylene, n-butylbenzene, n-propylbenzene, o-xylene, p-isopropyltoluene, sec-butylbenzene, tert-butylbenzene, trans-1,2-dichloroethene, trans-1,3-dichloropropene, 1,2-dibromo-3-chloropropane, 1,2-dibromoethane, alachlor, aldrin, chlordane, dieldrin, endrin, heptachlor, heptachlor epoxide, hexachlorobenzene, hexachlorocyclopentadiene, methoxychlor, PCB screen, toxaphene, gamma-BHC (lindane), 2,4,5-TP (Silvex), 2,4-D, dalapon, dicamba, dinoseb, pentachlorophenol, picloram, 3-hydroxycarbofuran, aldicarb, aldicarb sulfone, aldicarb sulfoxide, carbaryl, carbofuran, methomyl, oxamyl, glyphosate, endothall, and diquat.

Microbiological – Escherichia coli.

Inorganics and Physical Characteristics – Antimony, arsenic, beryllium, cadmium, chromium, color, fluoride, free cyanide, iron, MBAS, mercury, nitrogen-ammonia, odor, selenium, silver, and thallium.

Disinfection By-Products – bromoacetic acid, chloroacetic acid, dichloroacetic acid, haloacetic acids (total), and trichloroacetic acid.

Unregulated Contaminant Monitoring Rules 3/4 – germanium, alpha-BHC, chlorpyrifos, dimethipin, ethoprop, merphos-oxone, oxyfluorfen, permethrin, profenofos, tebuconazole, tribufos, n-butanol, 2-methoxyethanol, 2-propen-1-ol, total organic carbon, perfluorobutanesulfonic acid, perfluorooctanesulfonic acid, bromodichloroacetic acid, chlorodibromoacetic acid, bromoacetic acid, chloroacetic acid, tribromoacetic acid, trichloroacetic acid, butylated hydroxyanisole, o-toluidine, and quinoline. You may obtain the monitoring results by calling Superintendent Peter F. Logan at 516-921-8280.

WATER CONSERVATION

The water supply is one of the most critical environmental elements that must be safeguarded to ensure the continuance of an adequate supply for present and future generations. The District must be concerned with both quality and quantity issues, as they are inextricably linked. What is not wasted or contaminated will be available for future use. It is clear then that the responsibility for conserving water rests with each and every one of us. Each person must take a hard look at their individual water use and implement as many conservation measures as may apply to their lifestyle. By conserving water, you are also:

- Saving energy and some of the costs associated with both of these necessities of life;
- Reducing the cost of energy required to pump water and the need to construct costly new wells, pumping systems and water towers; and
- Lessening the strain on the water system during a dry spell or drought, helping to avoid severe water use restrictions so that essential firefighting needs are met.

Each person can play a role in conserving water and saving money in the process by becoming conscious of the amount of water your household is using and by looking for ways to use less whenever they can. It is not hard to conserve water.

WHAT DOES THIS INFORMATION MEAN?

As you can see by the table, our system did not have any violations. We have learned through our testing that some contaminants have been detected; however, these contaminants were detected below the level allowed by the State.

IS OUR WATER SYSTEM MEETING OTHER RULES THAT GOVERN OPERATIONS?

When a public water system (PWS) is issued a deferral, the water system agrees to a schedule for corrective action and compliance with the new PFOS, PFOA or 1,4-dioxane MCLs. In exchange, the New York State Department of Health (the Department) agrees to defer enforcement actions, such as assessing fines, if the PWS is meeting established deadlines. Deferral recipients are required to update the Department and the Nassau County Department of Health each calendar quarter on the status of established deadlines. The Department can resume enforcement if the agreed upon deadlines are not met. Information about our deferral and established deadline can be found at the following site: <https://www.jerichowater.org/wp-content/uploads/2021/10/JWD-MCL-Deferral-Quarterly-Report-Q4-2021.pdf>

The New York State Department of Health issued a deferral on November 24th, 2020 to the Jericho Water District for MCL compliance for **1,4-Dioxane**. This deferral acts as an exemption or State permission not to meet an MCL under certain conditions. Under this deferral, the District agrees to a schedule for corrective action and compliance with the MCLs.

The **1,4-Dioxane** contaminant was found in the District drinking water above its New York State MCL of **1 ug/L** during 2020. The **1,4-Dioxane** MCL is set well below levels known to cause health effects in animal studies. Therefore, consuming water with **1,4-Dioxane** at the level(s) detected does not pose a significant health risk and the water continues to be acceptable for all uses.

The deferral period is effective until August 25th, 2022. During this period, the District prepared and began to implement an aggressive action plan which includes the construction of Advanced Oxidation Process (AOP) facilities for the removal of 1,4-dioxane in seven (7) different wells. These AOP systems also include Granular Activated Carbon which remove PFOA and PFOS. In addition, the District has developed plans for the installation of a new well and associated treatment to expand its clean water supply. Additional information will be shared as further testing and progress occurs. This process is similar for any chemical detected in public drinking water that requires mitigation. The compliance timetable will ensure that your drinking water will meet the MCL as rapidly as possible. The deferral is effective until August 25, 2023.

In July of this year (2022) the District requested, and was granted, a deferral renewal. This renewal will allow the District to continue to operate while construction of the AOP systems continues. While supply chain issues have plagued these projects, the District is confident that they will be in operation before the renewal expires on August 25th, 2023.

The District is also required to submit a quarterly update to the NYSDOH and the NCDOH on the status of the project(s). The full deferral approval notification is included as Appendix A to the Annual Water Quality Report. The project schedule, and quarterly updates, can be viewed at www.jerichowater.org/deferralquarterlyreport

DO I NEED TO TAKE SPECIAL PRECAUTIONS?





Although our drinking water met or exceeded state and federal

CONSERVATION TIPS INCLUDE:

- Automatic dishwashers use 15 gallons for every cycle, regardless of how many dishes are loaded. So, get a run for your money and load it to capacity.
- Turn off the tap when brushing your teeth.
- Check every faucet in your home for leaks. Just a slow drip can waste 15 to 20 gallons a day. Fix it up and you can save almost 6,000 gallons per year.
- Check your toilets for leaks by putting a few drops of food coloring in the tank, watch for a few minutes to see if the color shows up in the bowl. It is not uncommon to lose up to 100 gallons a day from one of these otherwise invisible toilet leaks. Fix it and you save more than 30,000 gallons a year.
- Use your water meter to detect hidden leaks. Simply turn off all taps and water using appliances, then check the meter after 15 minutes, if the dial on the meter has moved, you have a leak.

LEAKS – COSTLY AND WASTEFUL

APPROXIMATE NUMBER OF GALLONS WASTED*

Size of leak	Per Hour	Per Day	Per Quarter	Cost per Quarter
	547	13,128	1,181,520	\$3,960.78
	308	7,392	665,280	\$2,001.90
	137	3,288	295,920	\$825.30
	34	816	73,440	\$140.40

- At 60 pounds per square inch of water pressure

SYSTEM IMPROVEMENTS

Commenced in 2022 / to be completed in 2023

- Contracts were publicly bid and awarded, and notice to proceed was issued for the electrical upgrade to the Juneau booster pumping station
- Contracts were publicly bid and awarded, and notice to proceed was issued and construction has commenced on the new well and treatment plant at the Southwoods Rd. site
- Work on rehabilitating the pumps & motors for Wells 17 and 29 was started
- Contracts were publicly bid and awarded, and notice to proceed was issued and construction has commenced on the construction of booster station for Split Rock tank
- Gooseneck replacement survey, design, and implementation
- Installation of new hardware and software to upgrade the District's SCADA system was completed
- The replacement of the transfer switches at the main office and wells 3 & 29 was completed
- Commence construction of Advanced Oxidation Process (AOP) treatment plant for Wells 9 & 14
- Commence construction of Advanced Oxidation Process (AOP) treatment plant for Wells 25 & 26
- Continued construction of Packed Tower Aeration System (PTAS) treatment plant for Wells 6 & 16
- Commence construction of AOP treatment plant at Wells 20 & 21
- Design and prepare bid documents for the construction of an Advanced Oxidation Process (AOP) treatment plant at Well 22
- Commence construction of new elevated water storage tank at Convent Rd. site
- Renovated the interior of Well 14, Tobie Lane
- Contract was publicly bid and awarded, and notice to proceed was issued for the replacement of the garage doors at the operations center
- Contract was publicly bid and awarded, and notice to proceed was issued for the renovation of the kitchen and restrooms in the administration building
- Contract was publicly bid and awarded, and notice to proceed was issued for the replacement of the windows at several well sites

CLOSING

“To take anything for granted, is in a real sense, to neglect it and that is how most of us treat water.”

- Robert Raikes, Water Weather and Prehistory

Water is one of the most precious resources and yet it is often taken for granted simply because it is always there for us. The purpose of this report is to keep you informed about your water supply. Knowledge is power. The power to conserve and protect this resource is in all of our hands. Please feel free to call us at (516) 921-8280 with any questions you may have relative to this report.

APPENDIX A

IMPORTANT INFORMATION ABOUT YOUR DRINKING WATER Deferral Issued for 1,4-Dioxane in the Jericho Water District

WHY ARE YOU RECEIVING THIS NOTICE/INFORMATION?

You are receiving this notice because testing of our public water system found the chemical 1,4-Dioxane in your drinking water above New York State's maximum contaminant level (MCL) of 1 ppb for 1,4-dioxane. The MCLs are set well below levels known to cause health effects in animal studies. Therefore, consuming water with 1,4-dioxane at the level detected does not pose a significant health risk. Your water continues to be acceptable for all uses.

The Jericho Water District has submitted, and the New York State Department of Health (Department) has issued, a deferral to the Jericho Water District. When a public water system is issued a deferral, the water system agrees to a schedule for corrective action and compliance with the new MCLs. In exchange, the Department agrees to defer enforcement actions, such as assessing fines, if the water district is meeting the established deadlines. We are required to update the Department and the Nassau County Department of Health each calendar quarter on the status of our projects. If we do not meet the agreed upon deadlines, the Department can resume enforcement.

WHAT ARE THE HEALTH EFFECTS OF 1,4-DIOXANE?

Laboratory studies show that 1,4-dioxane caused liver cancer in animals exposed at high levels throughout their lifetime. Other types of cancer have also been reported, although less consistently than liver cancer. There is no evidence of 1,4-dioxane cancer effects in humans. The United States Environmental Protection Agency considers 1,4-dioxane a likely human carcinogen based upon studies of animals exposed to high levels of this chemical over their entire lifetimes.

At the level of 1,4-dioxane detected in your water, exposure from drinking water and food preparation is well below 1,4-dioxane exposures associated with health effects.

WHAT IS NEW YORK STATE DOING ABOUT 1,4-DIOXANE IN PUBLIC DRINKING WATER?

The New York State Department of Health (NYS DOH) has adopted a drinking water regulation that requires all public water systems to test for 1,4-dioxane. If found above the MCLs, the water supplier must take steps to lower the level to meet the standard. Exceedances of the MCL signal that steps should be taken by the water system to reduce contaminant levels.

WHAT IS BEING DONE TO REMOVE THESE CONTAMINANTS?

The Jericho Water District has prepared and begun to implement an aggressive action plan which includes the construction of Advanced Oxidation Process (AOP) facilities for the removal of 1,4-dioxane in seven (7) different wells. These AOP systems also include Granular Activated Carbon which remove PFOA and PFOS. In addition, the District has developed plans for the installation of a new well and associated treatment to expand its clean water supply. Additional information will be shared as further testing and progress occurs. This process is similar for any chemical detected in public drinking water that requires mitigation. The compliance timetable will ensure that your drinking water will meet the MCL as rapidly as possible. The deferral is effective until August 25, 2023.

WHERE CAN I GET MORE INFORMATION?

For more information, please contact Peter F. Logan, Superintendent at (516) 921-8280 or at 125 Convent Road in Syosset, NY. You can also contact the Nassau County Department of Health at (516) 227-9692.

If you have additional questions about these contaminants and your health, talk to your health care provider who is most familiar with your health history and can provide advice and assistance about understanding how drinking water may affect your personal health.

Public Water System ID# NY2902831

Date December 18th, 2020