Water Connection

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BethpageWater.org

New Well Provides Water Outside Plume

New High Quality Water Supply Will Save Residents Money on Treatment Costs

The Bethpage Water District Board of Commissioners William J. Ellinger, John R. Sullivan and Gary S. Bretton proudly announced the completion of a brand new well in Bethpage State Park. The well, located on South Park Drive, is part of the District's efforts to access water beyond the plume to provide the highest quality of water to residents without the added cost of advanced purification.

Commissioners John R. Sullivan, William J. Ellinger and Gary S. Bretton review plans for the new well in Bethpage State Park.

The South Park Drive well is the District's ninth well, and it will further the reliability of the District's system. The brand new well provides three million gallons of water daily from a brand new source. The well includes new chemical feed systems, solar panels, interior process piping, pump station construction (including roof system and siding) and electrical work. Located on a four-acre parcel of land in Bethpage State Park, the new well is in excess of one mile from the District's previous eight wells.

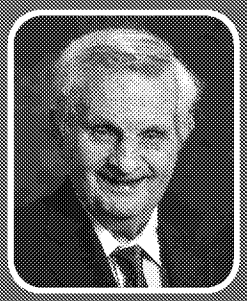
The Bethpage Water District worked with New York State to determine a location that would allow the District to deliver high quality water without costly purification requirements. The new well is projected to save residents money by eliminating treatment expenses.

"You can't put a price tag on the safety of our community. As Bethpage residents, we aim to protect our families and our neighbors whenever we make decisions regarding our water," said Bethpage Water District Commissioner Gary S. Bretton. "This new well is an example of our commitment to delivering the safest water supply to our neighbors for the lowest possible cost."

DISTRICT PARTNERS WITH SENATOR SCHUMER

The Bethpage Water District would like to thank Senator Schumer for his continuing efforts and tireless support on behalf of the Bethpage community. His call for EPA involvement has become all too necessary to remediate the damage Northrop Grumman has caused to our water supply. It is time Northrop Grumman takes responsibility for continually risking the health and safety of Bethpage residents and for leaving them to bear the burden of high treatment costs.

BETHPAGE WATER DISTRICT BOARD OF COMMISSIONERS



William J. Ellinger
Chairman

John R. Sullivan
Treasurer

Gary S. Bretton
Secretary

How to Read Your Water Statement

The Bethpage Water District conducts more than 10,000 water-quality tests for more than 130 parameters and contaminants, of which, 115 have been undetected in the drinking water supply. When reading your water statement, it is important to keep some terms in mind to best understand its components.

- **Contaminants:** Any impurity found in water. Most are naturally occurring and not harmful. Others are man-made and can be harmful at high exposure levels. Please visit the USEPA website at http://water.epa.gov/drink/contaminants/ for information about contaminants found in drinking water.
- **Inorganic Compounds:** Inorganic compounds are nonbiological organisms. Essential metallic elements commonly found naturally occurring in groundwater due to the weathering of rocks, minerals and pipes. Compounds such as including iron, zinc, sodium, calcium and nickel, are inorganic compounds.
- **Volatile Organic Compounds:** VOC's come found in products including plastic, refrigerants, gasoline, solvents, paints and dry-cleaning fluids. When improperly disposed, VOC's may be released into the environment, and any amount that does not evaporate into the atmosphere may seep into the soil when it rains. VOC's do not naturally occur in groundwater and are the consequence of industrial waste disposal. In the instance of the Bethpage Water District, pollutants comprising the Northrop Grumman plume, such as Trichloroethene (TCE), have been detected in the groundwater, but are removed in drinking water.
- **Parts-Per-Billion (ppb):** One ppb represents one-billionth of a gram, per gram of the sample. It is also represented as one microgram per liter (ug/L). So, one gallon in a billion would be one gallon in a reservoir sized at one square mile and 5 feet deep.
- **Parts-Per-Trillion (ppt):** One ppt represents one-trillionth of a gram, per gram of the same. It is also represented as one nanogram per liter (ng/L). To contextualize, an Olympic swimming pool contains approximately 50 billion drops of water. A part-per trillion would be one drop in 20 Olympic-size swimming pools.
- **Maximum Contaminant Level (MCL):** The highest level of a substance allowed in drinking water.
- **Maximum Contaminant Level Goal (MCLG):** The level of a substance in drinking water below which there is no known risk to health.

Water Treatment Process

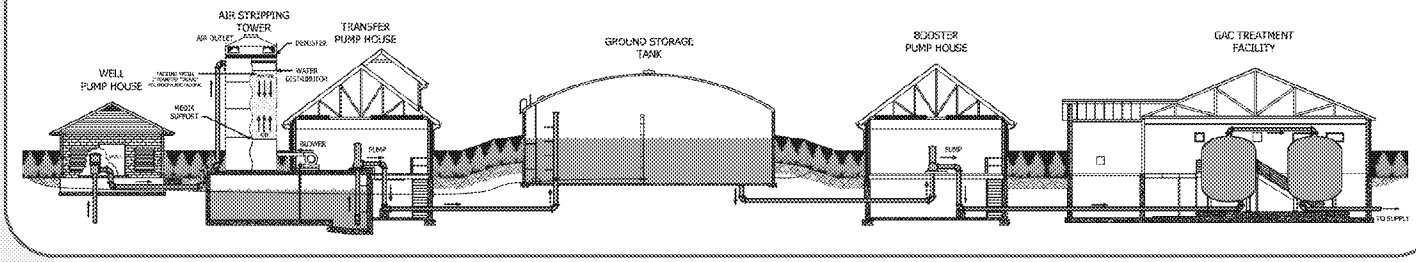
Our goal is to provide drinking water of the highest quality, free of any VOC's. Our treatment processes illustrated below- combined with our aforementioned rigorous testing, ensure that the thousands of gallons of water pumped per minute in the Bethpage Water District is both clean and pure.

Air Stripping:
This proven state-of-the-art equipment is in place at District plant sites to remove any traces of volatile organic compounds (VOC's) that may be present in the water pumped from the ground long before it enters the public supply system. Air stripping exposes a large surface area of water to air. Water is pumped to the top of a tower and then cascades downward over a large number of inert packing materials or small round objects that resemble wiffle balls. Simultaneously, filtered air is blown upward through the tower, breaking the water molecules and removing, or "stripping," any VOC's.

Carbon Filter:
After air stripping, the water goes through a granular activated carbon (GAC) filter to remove remaining organic compounds. The activated carbon's porous composition provides tremendous surface area that acts as an adsorption system. The water is purified as it passes through the carbon filters and the used carbon is replaced periodically according to industry standards. GAC filters are similar to air strippers as they both remove VOC's.

Nitrate Removal:
The ion exchange process for the removal of nitrates is both simple and effective. It operates in the same manner as a common water softener and can easily remove much more than 90 percent of nitrates. The process uses a strong-base ion exchange resin, which regenerates with common salt.

BETHPAGE WATER DISTRICT AIR STRIPPING TREATMENT PROCESS

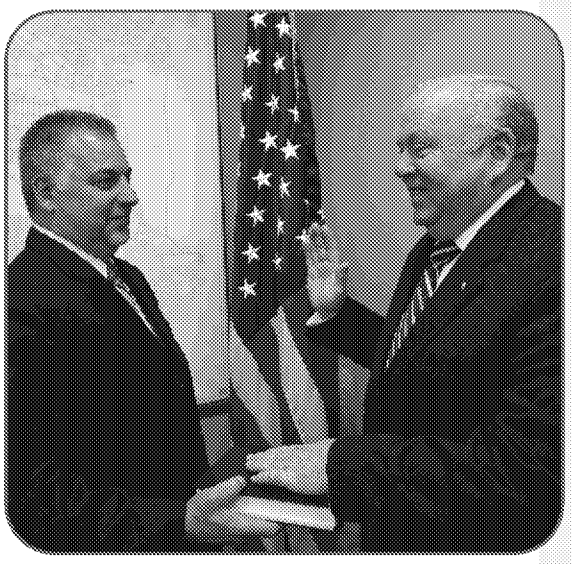


Bethpage Water District Swears In Commissioner John R. Sullivan for 2015

During a Board of Commissioners meeting on Tuesday, March 24, 2015, the Bethpage Water District inducted John R. Sullivan as Treasurer of the Board of Commissioners. Treasurer Sullivan was re-elected as a Commissioner this past December.

"As a lifelong Bethpage resident, it is an honor to continue serving my community as a member of the Board of Commissioners for the next three years," said Commissioner Sullivan. "I look forward to continue using my professional knowledge and my involvement in the water industry to provide safe, high quality water to our community."

Commissioner Sullivan gained extensive experience throughout the water industry before and during his time as a member of the Bethpage Water District Board of Commissioners. He is a union plumber/foreman and continues to serve as an officer on the Finance Board of Plumbers' Union Local 200. In addition to his responsibilities as Commissioner, Sullivan served as Treasurer and Past President of the Nassau-Suffolk Water Commissioners' Association and is an active member of both the Long Island Water Conference and American Water Works Association.

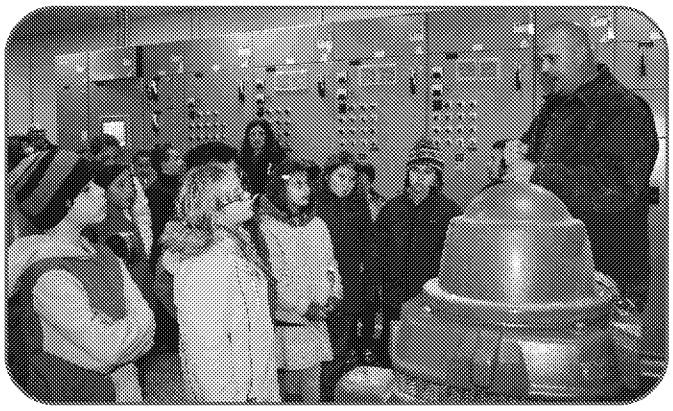


John R. Sullivan is sworn in as a Commissioner and the Treasurer of the Bethpage Water District.

Bethpage Students Go With the Flow

Local Elementary School Students Learn Where Their Water Comes From When Touring Bethpage Water Plant #4

Bethpage Water District Board of Commissioners—Chairman William J. Ellinger, Treasurer John R. Sullivan, Secretary Gary S. Bretton and Secretary to the Board Sal Greco—recently invited local students to tour the District's fourth plant on Sophia Street. Throughout the tour, Superintendent Michael Boufis and Senior Water Plant Operator Peter Schimmel detailed the path water takes from the ground to faucets to Charles Campagne, Kramer Lane and Central Boulevard Elementary School students.



Senior Water Plant Operator Peter Schimmel led students from three local Bethpage schools on a tour of Bethpage Water District Plant #4 at Sophia Street.

The Bethpage Water District team led students throughout the plant to teach them how a well is drilled, where water comes from and how water is pumped to Bethpage homes and businesses. During the tour, students scanned the advanced machinery and listened to what an actual working well sounds like. Students asked questions as they learned about the chemical injection and air stripping procedures that ensure the water delivered is of the highest quality possible.

"Water plays an important role in these students' and all of our daily lives," said Board of Commissioners Secretary Gary S. Bretton. "We hope to educate the youth of Bethpage to make informed decisions about protecting their water supply and to inspire them to become plant operators and engineers in the future."

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Hours: 8:00 a.m. to 4:00 p.m. weekdays
24-Hour Emergency Number: (516) 931-0093

BethpageWater.com

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Bethpage Students Participate in Annual Bethpage Water District Poster Contest

The Bethpage Water District Board of Commissioners William J. Ellinger, John R. Sullivan and Gary S. Bretton are thrilled by the overwhelming number of submissions from the Bethpage School District and its students in the Bethpage Water District Poster Contest *Bethpage Protects, Bethpage Conserves.* More than 150 students submitted posters of their own design to answer the question, "How Can I Conserve and Protect My Water?"

Commissioners Ellinger, Sullivan and Bretton are judging each poster to select the top three submissions per grade that creatively, visually and accurately convey the best message. The winners will be honored by the District during the month of June, where they will be able to share their posters with friends, family and school faculty. The posters will then be displayed in the Bethpage Public Library.

Chairman William J. Ellinger, Treasurer John R. Sullivan and Secretary Gary S. Bretton spend some time before—and after—a Board of Commissioners meeting judging posters created by Bethpage students submitted to this years' Poster Contest.