

Sleuth Crews Use Clues to Seek Leaks

Using sound as its principal weapon, DEP's Leak Detection Unit systematically searches for leaks throughout New York City's water distribution system to prevent water loss and property damage. Created in the late 1970s, the program's crews are equipped with sophisticated sound monitoring equipment to check water mains for leaks by listening to the flow of water in them. Leaks can usually be identified by the distinctive noise created as the water escapes the pipe, and are repaired before they can develop into larger water main breaks.

As part of the Bureau of Water and Sewer Operations, District Supervisor **Richie Mazzella** leads a team of 15 people. Not only does the crew respond to leak complaints that DEP re-



ceives through 311, the "bread and butter" of the team's activity is conducting daily surveys where leaks are not even visible. These "detectives" are able to identify leaks without seeing them, or needing to dig up streets unnecessarily.

Last year, more than 4,000 miles of water mains were investigated and 389 leaks were located.

(Continued on reverse side)

Spotlight on Safety

October is Eye Injury Prevention Month

In general DEP has very few employee eye injuries, but they do happen and can be serious. Studies show that the two main reasons workers suffer eye injuries are:

1. They weren't wearing any eye protection.
2. They were wearing the wrong kind of protection.

These findings give you a clue about what to focus on to prevent eye injuries. You need to recognize all the potential eye hazards in your job, which could include:

- **Impact**—from flying chips, particles, sand, and dirt, etc.
- **Burns**—from sparks, molten metal, or chemical splashes.

Next, you need to use the right eye protection for the job. The wrong

kind may be worse than no protection in some cases. Good examples of eye protection include:

- **Safety glasses with side shields or goggles** provide good protection against impact hazards.

- **Safety goggles** prevent vapors, splashes or dust from getting at delicate eye tissue.

Finally, follow these safe work practices when eye hazards may be present:

- **Obey all warning signs** requiring eye protection.
- **Always put on eye protection before entering an area** where hazards may be present.

For the complete article, including additional tips, please click here [🔗](#).

Commissioner's Corner

This morning I was in Albany at State DEC headquarters with a DEP team that included Deputy Commissioners **Vincent Sapienza**, **Carter Strickland**, **Angela Licata**, General Counsel **Robin Levine** and members of their teams to formally kick off the negotiations that will operationalize the NYC Green Infrastructure Plan that **Mayor Bloomberg** launched nearly one month ago. DEC Assistant Commissioner for Water Resources **Jim Tierney** and a team from DEC listened to an overview of the plan, and the resources New York City is committing to implement it. While we have a lot of work ahead of us, we agreed that DEC and DEP have a unique opportunity to incorporate green infrastructure into the way the City handles CSOs, and we need to take advantage of it. Stay tuned for progress reports as our discussions continue. Yesterday we hosted a group of committed environmental stakeholders, including S.W.I.M. (Stormwater Infrastructure Matters) Coordinator **Kate Zidar**, Riverkeeper's Hudson River Program Director **Phillip Musegaas** and Natural Resources Defense Council's **Larry Levine**, to begin public engagement on the green infrastructure plan that will be critical to its success. I also met with Council Member **Brad Lander**, who represents the district that includes the Gowanus CSO drainage area, to discuss how we can enlist the support of community groups as we begin to implement the plan.

On Friday, I opened the Water Finance Authority's (WFA) annual investors' conference, organized by Chief Executive Officer **Alan Anders** and Executive Director **Tom Paolicelli**. For those of you unfamiliar with the WFA, they are a public benefit corporation that issues the bonds to finance DEP's capital program and operations. Without their efforts, and the support of the investor community, the water system would be much more expensive to run, maintain, and build. You can learn more about the WFA and its critical role in the running of the water system here [🔗](#). I provided an overview of DEP's operations and highlights from the year to date, including the important water quality milestones we've reached [🔗](#), the challenges we successfully faced this sum-



mer thanks to the efforts of BWSO and BWT, and the status of customer service initiatives, including the 500,000th wireless water meter installation. Thanks to all of your efforts to keep the water system running smoothly and efficiently, and WFA's prudent fiscal management, DEP's cost of capital is low, which lessens the long-term burden on our 835,000 customers.

From funding it to actually building it, DEP hit some significant milestones this week on two important construction projects. At the Bowery Bay Wastewater Treatment Plant, DEP just completed the installation of new electrical systems and collections equipment as part of a \$253 million upgrade [🔗](#). The project, supervised by BEDC Wastewater Treatment & Reservoir Chief **Matthew Osit** and Acting Chief of Facilities Construction East **Shannon Chen**, is a necessary precursor to install technology that will dramatically reduce the amount of nitrogen that Bowery Bay discharges as part of the treatment process. Bowery Bay is a critical component of our overall effort to reduce nitrogen levels in the East River and Long Island Sound. Additionally, under the oversight of BEDC Chiefs **George Schmitt** and **Paul Smith**, the first ultraviolet units were installed last week at the \$1.6 billion Ultraviolet Disinfection Facility in Westchester [🔗](#). These units will provide the federally-required secondary treatment, in addition to chlorine, that will enable New York City to remain one of only five large cities in the country to receive a majority of its drinking water from unfiltered sources. Congratulations and keep up the great work!

At DEP, everyone is responsible for safety. If you or anyone on your team is concerned about your working conditions, it's okay to ask your supervisor or your bureau's EHS liaison how they can help. If you've still got questions, you can call the EHS Employee Concerns Hotline. It's DEP's responsibility to acknowledge and fix unsafe situations, procedures, and practices. With your help, we'll not only get the job done, we'll make it safer for ourselves, our coworkers, our families, and our city.

CALL (800) 897-9677 OR SEND A MESSAGE THROUGH PIPELINE. HELP IS ON THE WAY. [🔗](#)

Focus on the Field



If a pipe breaks in the distribution system and no one is around to hear it, does it make a sound? Just ask **John Lobello**. John—one of four supervisors in the Leak Detection Unit in the Bureau of Water and Sewer Operations—and his team use sound monitoring equipment to listen to our water as it flows through mains on its way to being distributed throughout the city.

John has been at this a long time—26 years to be exact—and he knows that if his equipment detects any noise coming from water mains, there's probably a leak. When water is flowing properly through mains, it's quiet but when there's a leak,

John can hear the water as it escapes from the pipes. The Leak Detection Unit's goal is to survey the entire water system every three years and to catch unreported leaks before they become a bigger problem. Its John's responsibility to assist in coordinating this work and make sure the unit is on track to complete the three year cycle on time.

One of the reasons that John thinks his job is so interesting is because each set of water mains brings a new challenge with a different set of circumstances. In fact, John "feels like a detective" on some days as he searches different water mains in different sections of the city. John's most memorable day came on 9/11 when he searched for hydrants that were connected to functioning mains for the FDNY, which was a very tall task under the circumstances.

When John isn't out in the field, he enjoys spending time with his family and watching sports, including his favorite team, the Yankees.

Event Calendar:

DEP's **NYC Water-On-the-Go fountains** will be out from October 24th – October 30th, including at this great event:

Pumpkin Festival - Saturday, October 30th 12:00-5:00 PM, Naumburg Bandshell (Central Park). For information, click here: [🔗](#)

For more information on Water-On-the-Go locations, click here [🔗](#)

Beyond New York



A plaque in San Francisco highlights the role of a special hydrant during the 1906 earthquake and fire. It reads: "Though the water mains were broken and dry on April 18, 1906 yet from this Greenberg hydrant on the following night there came a stream of water allowing the firemen to save the Mission District." The fire hydrant, at the corner of 20th & Church Streets, was the only hydrant that continued to function.

According to the San Francisco Examiner, "The hydrant became an inanimate hero two days after the quake." Repainting the still-active hydrant gold is a ritual that was started in the 1960s by dentist and historian Doc Bullock. Since then, each year on April 18, relatives of survivors of the 1906 earthquake, current members of the Fire Department, and others spray gold paint on the fire hydrant, now dubbed the Little Giant.

Kudos Corner

DEP Police Sergeant Frank Lynch of the 6th Precinct was honored by the Irish Echo as one of America's Most Distinguished Law and Order Leaders at an event on October 20, where he received their Irish Law and Order award.

Sleuth Crews Use Clues to Seek Leaks... continued)

By successfully detecting and repairing those leaks, DEP conserved over 60 million gallons a day of water

Just like in the past, sound is still the best way to pick up leaks. The main device used is the Digital Correlator, which has two sounding devices—similar to microphones—that are used on either side of a suspected leak. Each device is affixed to an access point in the distribution system, which are located at every intersection and fire hydrant. These sounding devices transmit signals to the Digital Correlator base station, and

together with other data, DEP calculates and pinpoints suspected problems in the system.

Special features in the equipment also filter out subway and other disruptive noise. This is important because water flowing through an unbroken pipe is "silent," but with a leak sound is produced by the disturbance in the flow.

With this data in hand, DEP crews are able to proactively fix leaks before they become a big issue. To all the leaks out there—you can "run," but you cannot hide!

ELECTION DAY IS NOVEMBER 2 – REMEMBER TO VOTE

Tuesday, November 2, is Election Day, and it's more important than ever that each and every New Yorker have their voices heard. Please make sure your voice is heard by voting on Election Day.

Press Box

NYC Water is the envy of the nation. So much so that people in Florida are trying to replicate it, causing a legal battle between two restaurants who "claim (they) can make water out of the tap here in South Florida taste like New York City drinking water." – South Florida Sun-Sentinel; October 25, 2010

NAME THE FIVE NEW BREAKOUT ROOMS!

The 19th Floor has a new look. The Commissioner's bullpen worked so well we expanded it to most of the 19th floor—and now there are another five new breakout rooms that need names.

SUBMIT THE WINNING NAMES AND WIN A TRIP TO THE TOP OF THE DIGESTER EGGS!

All employees are invited to submit names for the new meeting spaces. This is your chance to be creative - November 2 is the deadline—so start thinking and get your entry in to newsletter@dep.nyc.gov.

The winners will be announced in a future Weekly Pipeline. Good luck everyone!

We welcome your feedback! To submit an announcement or suggestion, please email us at: newsletter@dep.nyc.gov. [🔗](#)