

OPERATION

Rinnle Fffect[™] SIMPLE STEPS: BIG BENEFITS FOR THE MOHAWK RIVER

PROJECT BULLETIN

Normally, our sanitary sewer system has enough capacity to operate properly. But, when we get heavy rains or sudden snow melts, stormwater overwhelms the system and causes overflows into the Mohawk River. That stormwater runoff enters the sanitary sewer system from multiple sources: deteriorated and damaged public sanitary sewers; and private property connections, such as roof leaders and sump pumps.

Operation Ripple Effect is a program of the Oneida County Sewer District that asks residents, businesses, and municipalities to do their part to reduce overflows. Together, we can help keep the Mohawk River clean.

MAJOR COMPONENTS **OF THE BIOSOLIDS** HANDLING PROJECT **INCLUDE:**

- Two new egg-shaped primary digesters. Egg-shaped tanks were chosen for efficiency and decreased cleaning needs and grit accumulation versus traditional tanks.
- One new secondary digester with a dual membrane gas holding cover.
- Energy recovery facility to include digester gas cleaning, and combined heat and power (CHP) generation with new 600kW microturbines.
- A new lime stabilization system as backup to the anaerobic digesters.
- New septage receiving facilities. •
- Replacement of existing waste • activated sludge pumps.
- Refurbishment of all four gravity thickeners.
- Two new belt filter presses and reconfiguration of two existing belt filter presses for dewatering of digested sludge.

MAKING PROGRESS: BIG ADVANCES AT THE WATER POLLUTION CONTROL PLANT

This fall will kick off a series of construction projects at the Water Pollution Control Plant (WPCP) to address overflows into the Mohawk River and the needs of the City of Utica's Long Term Control Plan.

Contracts have been awarded to upgrade and expand the current biosolids handling process.

The WPCP currently utilizes gravity thickeners and belt filter presses to dewater sludge, which is then pumped to incinerators. Anaerobic digesters will replace the incineration process, thus improving efficiency. Anaerobic digesters offer a more sustainable approach for long-term operations with the ability to recover energy from the digestion process.

Electrical power produced by the process will be utilized onsite. Heat produced will be recovered and utilized for digester and building heating.



Bid results for the **Biosolids Handling Project:**

General Construction	\$36.62
C.O. Falter Construction Corp., Syracuse, NY	million
Electrical Construction	\$6.2
O'Connell Electric Company, E. Syracuse, NY	million
HVAC Construction	\$1.66
J.W. Danforth Company, Victor, NY	million
Plumbing Construction	\$0.25
H.J. Brandeles Corp., Utica, NY	million
TOTAL	\$44.73 million

