New York's Storm Mitigation Loan Program

New York State's Storm Mitigation Loan Program (SMLP) was created in 2014 to assist local governments in strengthening long-term resilience for wastewater and drinking water treatment facilities in areas impacted by Hurricane Sandy. Elevating power systems, reducing infiltration and waterproofing electrical components are some of the projects being funded through the program.

Background

In the aftermath of Hurricane Sandy, the U.S. Congress appropriated \$600 million in SRF funds for New York and New Jersey to "reduce flood damage risk and vulnerability or to enhance resilience to rapid hydrologic change or a natural disaster at treatment works ... " New York used these funds to create the Storm Mitigation Loan Program (SMLP) for Clean Water and Drinking SRF projects. Between federal Water appropriations and state matching funds, the state made available \$339.7 million in CWSRF funds for storm resilience and mitigation projects.



Program Overview

Photo Credit: US Navy

The goals of the program include promoting the use of sustainable practices in the design and construction of infrastructure, in order to reduce the risk from future storms and other natural disasters to water systems in the 14 counties affected by Hurricane Sandy, and to protect human health and the environment. To help achieve these goals, the SMLP provides financial assistance in the form of zero-interest loans and grants to help address rising sea levels and severe storms.

The need for this funding was apparent as the New York State Environmental Facilities Corporation, which administers the SRF program for New York, received 110 applications totaling more than \$900 million for clean water projects under the SMLP. In 2014, based on the funding available, 36 projects were selected. These projects range from flood-proofing critical treatment systems to correcting significant I/I problems that reduce the likelihood of sewer backups or flooding of a treatment facility to upgrading and hardening pump stations to ensure peak flow capacity during a storm event. As an example, Nassau County is undertaking a project to reduce potential Sanitary Sewer Overflows that caused neighborhood basement backups during the storm. The County was approved to receive \$25.4 million for the project, with \$6.4 million in grant and the remainder in zero-interest loan.



ECOS

This factsheet was developed by the Environmental Council of the States. It is one of ten factsheets on how states have used flexibility in the Clean Water State Revolving Loan Funds to pursue innovative projects. To view the other factsheets and information on other state projects visit <u>www.ecos.org</u>.

Published in March 2016

Setting New Standards

In order to help ensure resiliency, New York established new standards for the elevation of critical equipment and other storm-related measures funded under the SMLP. Critical equipment in an area subject to tidal change or sea-level rise is to be placed at the highest of the 100-year flood level plus five feet, the Sandy high-water mark plus four feet, or the 500-year flood level. Generally, any facility that has

The SMLP makes zero-interest loans and grants to help address rising sea levels and severe storms. flooded or may flood due to sea level rise must be designed for the most protective of the 100-year flood level plus two feet, the Sandy high-water mark plus one foot or the 500year flood level. These standards are being studied as a potential model by the New England Interstate Water Pollution Control Commission and others looking to identify best practices to protect water and wastewater infrastructure from the impacts of more intense storms and rising sea levels resulting from climate change.

Suffolk County Example

To protect the existing ocean outfall from experiencing high operating pressures during storm conditions, pumping must be maintained to avoid submerging the plant processes and equipment and avoid sewer system backups. The final effluent pump station upgrades will allow the Bergen Point WWTP to more consistently convey wet weather flow and to discharge the effluent safely, protecting the plant and upstream areas from flooding.



More Information

For more information on these programs visit: <u>http://www.efc.ny.gov/CWSRF</u> or contact Timothy Burns at <u>timothy.burns@efc.ny.gov</u> or 518-402-7396

This project has been funded wholly or in part by the United States Environmental Protection Agency under assistance agreement X5-83395401 to the Environmental Council of the States. The contents of this document do not necessarily reflect the views and policies of the Environmental Protection Agency, nor does the EPA endorse trade names or recommend the use of commercial products mentioned in this document.