



## GREEN STREETS | GREEN JOBS | GREEN TOWNS INITIATIVE

The Green Streets, Green Jobs, Green Towns Partnership (G3) aims to stimulate the green jobs market and enable families to work where they live and play. Small to mid-sized communities can boost their local economies and protect water resources through the use of watershed planning, design and construction of stormwater best management practices.



## G3 DEMONSTRATION SITE – TOWN OF FOREST HEIGHTS, MD

Forest Heights demonstrates effective stormwater management on their municipal grounds.

The Forest Heights Stormwater Retrofit and BMP Demonstration Site is part of a comprehensive community greening initiative to reduce the impact of stormwater runoff pollution to the Oxon Run – a tributary of the Potomac River. The project is one of many proactive initiatives the Town has implemented to achieve its resolution to become a zero runoff municipality, the first of its kind in the state.

the simple to the more complex: bioretention cells, living Wall SmartSlope technology, green roof, rain barrel and cistern rain water reuse, conservation landscaping, and various pervious surfaces. The latest phase was the installation of a PaveDrain System, a permeable pavement product that treats stormwater through natural filtration.

The goals of the initiative were to establish the municipal grounds as an example of effective stormwater management; build the knowledge of elected officials and citizens of Forest Heights on the values and benefits of environmentally friendly behaviors; change local policies influencing stormwater; and provide a working demonstration site that can be used by educators.

The project incorporated a number of best management practices from



90% zero run off effective rate in a 2-3 inch rain event and 100% of the first flush



800 gallons of water storage



3400 ft<sup>2</sup> of rain gardens



1600 native plants



2535 ft<sup>2</sup> riparian plantings



5,000 ft<sup>2</sup> of permeable pavement



2,770 ft<sup>2</sup> of impervious pavement removed



## PROJECT ELEMENTS

- **Bioretention cells** – These features filter and reduce stormwater runoff, allowing it to infiltrate into the ground before it enters into the storm drain system.
- **Green roof** – Plants and appropriate media added to the roof capture rain falling onto the roof, reducing the amount of water that falls off the roof
- **Rainwater cisterns and rain barrels**– Water that does emerge from the roof system is captured in cisterns during rain events, released after the rain is over when the ground can absorb it.
- **Conservation landscaping** – Native plants, which require less maintenance, capture rainwater and hold soils in place.
- **Permeable pavement** – Permeable pavement allows stormwater to soak into the ground. Several different kinds of permeable pavement are used at this site, allowing visitors to compare and contrast options for their own use.
- **Green Jobs and Engagement of local businesses** – Local management firms, construction firms, and suppliers were used to complete the project, supporting local jobs. In addition, the site has been used to train young people seeking jobs in the stormwater realm.
- **Educational signage** – Signage educates visitors throughout the site about the various stormwater practices and features on the grounds

## SUSTAINABILITY & GROWTH: ADDITIONAL GREEN ACTIVITIES

The Town of Forest Heights is involved in several major greening initiatives, advanced and supported through this project. The greening of Forest Heights began in 2007, when the Town Council planted trees along the parking lot as a way to catch polluted stormwater before it made its way to the local waterway. In 2008, the Town advanced its "Go Green" initiative by becoming the first local government in Prince George's County to convert all government owned facilities to the green standard with the unveiling of the green roof on the municipal building.

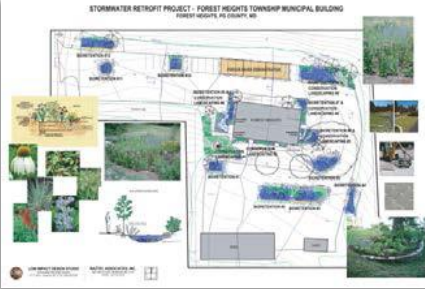
This completed demonstration project on the municipal grounds has provided and will continue to provide an opportunity for townspeople to see how these best management practices might look on their own property and learn about the benefits of each practice. The site has already been used as training grounds for nonprofit organizations and green jobs programs for youth.

The Town's efforts continue: Since the completion of this project, Forest Heights has pursued the design of and construction funding for two stretches of its thoroughfares, including Arapoe Avenue, based on support provided by this grant program. In addition, the Town has been aiming to map and increase its tree cover, as part of the Tree Canopy Program. This program will provide green coverage in many places within the town to reduce sun heat exposure, improving air quality by natural methods and erecting trees for a cooler overall temperature. Finally, the Town plans to convert its municipal energy use to solar through installation of solar panels. Much of this work is supported by aggressive and successful grant seeking.

G3 Grant Awarded: \$55,000

Match Contribution: \$295,000

Status: Completed 05/17/2012



Municipal building green roof



Mapping tree canopy



Project Partners: Town of Forest Heights, Chesapeake Bay Trust, MD Department of the Environment, U.S. Environmental Protection Agency, Ernest Maier/Performance Pavement, PaveDrain

For additional information: visit [www.epa.gov](http://www.epa.gov) and [www.cbtrust.org](http://www.cbtrust.org).