

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.





13 blocks of impervious surface to be treated

About ASLA:

- Founded in 1899
- Represents over 15,000 members
- **49** professional chapters
- 72 student chapters
- Mission: "...to advance landscape architecture through advocacy, communication, education, and fellowship."

(from asla.org)









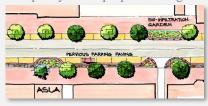
American Society of Landscape Architects

Improving a Model for Enhanced Stormwater Management in Urban Areas

The American Society Landscape Architects (ASLA) is currently working in the Chinatown neighborhood in D.C., on an experimental green project throughout I street. The project area, 13-blocks in downtown D.C., offers the opportunity to examine a plethora of street-types provides the basis for a case study project. As the Chinatown project area varies from potential complete retrofitting of the streetscape to simple "back of curb" techniques, this project will have solutions for green street technologies ranging in size and cost. Therefore, the master plan will also serve as a "sourcebook" for other communities. in D.C. and nationwide, to follow and guide through planning implementing a green and complete street in their own community.

In addition, the design team refined the project goals and means for measuring its success. To do this, they completed data collection for existing I street "baseline" characteristics. This task will assist stakeholders to know existing conditions of the project area and how well it is currently performing. With these baseline data, the team collected additional data for proposed "benchmark" goals, using the average D.C. design criteria applied to the project area. This task shows what would be implemented following current regulatory conditions and will be a reference when comparing baseline performance to green street technologies

As a demonstration project, the design team will push the limit on green infrastructure technologies to incorporate innovation, function, and education, while maintaining a high-quality design aesthetic. As designs are developed, stakeholders, community members, and the ASLA Site Sustainability Task Force (SSTF) will evaluate the quality of the proposed designs.



PROJECT ELEMENTS

- Streetside bioretention cells /stormwater planters— These features filter and reduce stormwater runoff, allowing it to infiltrate into the ground before it enters into the storm drain system. Curb cuts allow water to enter from the street during rain events.
- **Sidewalk trees/Tree boxes** Native trees reduce urban heat island effect, reduce stormwater runoff, improve air quality, and increase property values.
- Impervious pavement removal— The existing roadway was narrowed significantly, allowing implementation of conservation landscaping.
- **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.
- **Conservation landscaping** Native plants, which require less maintenance, capture rainwater and hold soils in place.

SUSTAINABILITY & GROWTH: ADDITIONAL GREEN ACTIVITIES

ASLA's Green Roof Demonstration Project set the precedent for the organization's piloting of innovative practices at our national headquarters building in Washington, DC. Faced with the need to replace the existing roof, ASLA took the opportunity to install a roof that would showcase leading-edge design, maximize the benefits of green infrastructure, and serve as a model for the DC area and beyond.

By monitoring the performance of the green roof and measuring its contributions to water runoff reduction and water quality improvement, ASLA amply demonstrated the significant impact green roofs have toward meeting the sustainability goals set by the Chesapeake Bay Foundation (CBF) and the District of Columbia's Water and Sewer Authority. ASLA's 3,000-square-foot green roof, dedicated in April 2006, is one of seven green roof demonstration projects in the Anacostia River Watershed that the Chesapeake Bay Foundation partially funded with an incentive grant.

In addition to monitoring the green roof's performance data, ASLA offers tours and educational opportunities for landscape architects, other design professionals, students, academics, government officials, community members, and other visitors. Since the completion of the green roof in 2006, more than 6,000 individuals have visited the roof. This includes some 250 grade-school students from DC and around the country, who also can access a special area on the ASLA website, "The Roof Is Growing," that serves as a learning tool for students and provides educational materials for teachers to use. This page has received more than 78,000 page views since being launched. The general ASLA green roof homepage has won several honors, most recently an Honorable Mention is the 2012 Webby Awards, and serves as a virtual conduit to those who are not able to experience the green roof in person.

G3 Grant Amount: \$47,600.00

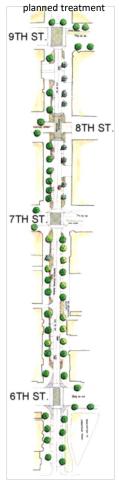
In-kind and cash match total: \$95,050

Status: Complete



Above: Initial conditions vs planned conditions for one section of the road.

Below: Map of the entire stretch of



Project Partners: Chesapeake Bay Trust, MD Department of the Environment, U.S. Environmental Protection Agency, American Society of Landscape Architects