



# 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.

## JAMES RIVER ASSOCIATION

### Bellemeade Green Street Design Plan

A Green Street Concept Plan was completed February 2017 through funding from the Green Streets, Green Jobs, Green Towns program. Since then, partners continued to move the design forward and reached 30% Engineered Design in February 2018. Through this current grant, the James River Association (JRA) worked with partners to develop a final Green Street Engineered Design Plan, which was completed February 2019.

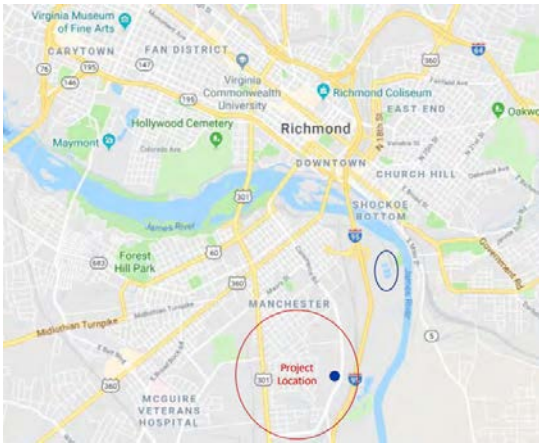
The goals of this design were to create a safe route for youth to ride their bikes to school, increase tree canopy, raise awareness, and improve water quality. Together, these environmental and infrastructural improvements work together to make a healthier and more connected neighborhood.

The Design Plan includes both grey and green infrastructure components along the 0.4 mile project area. A protected bicycle/pedestrian pathway will connect residents and students from Harwood Street down to Gunn Street, which is one

of the community entrances to the Bellemeade Park.

The green infrastructure elements in the design plan include the addition of street trees to shade the existing sidewalk and proposed protected bike lane, and replacing impervious asphalt with 5 bioretention planters and 18 additional planters that will be planted with native trees, shrubs, and perennials. The planters will not only provide a water quality benefit, but will also provide traffic calming measures.

Since the Walkable Watershed concept was introduced in 2011, JRA has been active with involving the Bellemeade community with the planning and development of the project and subsequently the finalization of design plans. Community members were involved at different stages of the design and provided opportunities to learn about the plans and also provide their feedback or concerns. Community feedback was taken into consideration during the plan development.



1 design plan created

0.4 miles of green street to be created

200 lbs trash removed

3 workshops with 30 attendees

1 follow up project to date





## PROJECT ELEMENTS

- **Design plan** – The design plan includes green streets features including tree planting, the removal of impervious pavement, and the installation of bioretention areas.
- **Green streets** – Green streets minimize the impact on the surrounding area through a natural system approach that incorporates a variety of water quality, energy-efficiency, and other environmental best practices.
- **Tree planting** – Native trees and shrubs require less maintenance and absorb rainwater, hold soils in place, and provide food and habitat for birds, pollinators, and other wildlife.
- **Impervious pavement removal** – Rain hits impervious surfaces such as parking lots and roads, and because it cannot soak through, it instead runs off into storm drains or directly local waterways.
- **Bioretention areas** – These features filter, store, and reduce stormwater runoff, allowing it to infiltrate into the ground before it enters into the storm drain system.

### Bellemeade Resident Engagement Day - Storm Drain Stenciling



## SUSTAINABILITY & GROWTH

This project supports the RVAH20 initiative by increasing tree canopy and integrates stormwater management. It supports the City of Richmond's MS4 requirements and they will be able to report the project to the Virginia Department of Environmental Quality to be counted in the Chesapeake Bay Model towards their TMDL goals.

JRA attends Richmond's RVAH20 stakeholder and technical meetings where City departments and other local partners discuss projects with partnering opportunities and share lessons learned. JRA continues to share progress on this project and is seen as a model for other groups to follow.

JRA is looking to use the same approach in a neighborhood in Petersburg, Virginia. A Walkable Watershed plan was developed in 2016 for the Lakemont Neighborhood with a drainage study that followed in 2018. Through the study, priority projects were identified that can address flooding and improve water quality. The same approach is being used there and JRA is securing funding for design development for those projects, followed by implementation. The Neighborhood Watch Group continues to stay involved and JRA meets with the City of Petersburg regularly to discuss upcoming funding opportunities.

In 2019, the James River Association was awarded another Green Streets, Green Jobs, Green Towns grant for implementation of the Bellemeade Green Street design plan. Read more on the Trust blog [here](#).

Year Awarded: 2018

Award Amount: \$30,000

Match Amount: \$40,023



### EDUCATION TRAIL

Along the new pedestrian and cycling trail, icons representing birds, insects, plants, and aquatic wildlife teach students about water, soil, plants, and habitat as they walk to and from school. Signage and graphics along the path provide educational activities.



### COMPOST & RECYCLING

Visible and accessible trash, recycling, and pet clean-up receptacles are incorporated into the new community food production & green spaces. A dedicated composting area near the garden beds minimizes household waste while providing fertilizer for garden plots.



Project Partners: Chesapeake Bay Trust, City of Richmond, Groundwork RVA, James River Association, Timmons Group, U.S. Environmental Protection Agency, 3North