# 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.


28 native plants to be installed

46.21 lb/year Nitrogen to be treated

1 engineered plan created

1 follow up projects pursued to date

# TOWN OF LAUREL

## Implementation of Green Infrastructure at the Dunbar Building

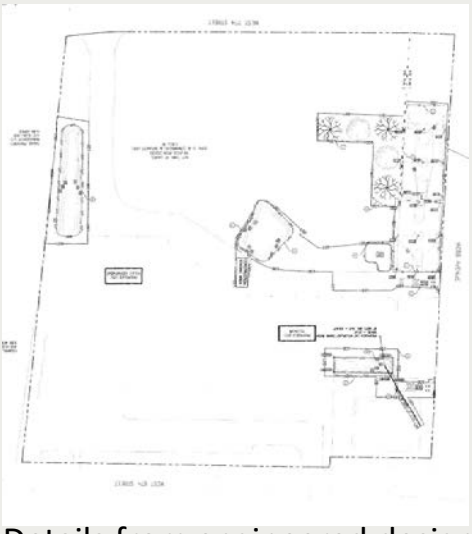
This grant funded the engineering work to implement the Greening Concept Plan for the 6 acres at the Dunbar Building at 1110 W. Sixth St. in Laurel DE. This building, formerly an elementary school, was donated to the Town of Laurel to house its police department. The previous police headquarters was cramped and did not have sufficient space for the department to function effectively. The Dunbar Building is located in a section of Laurel which has the highest concentration of crime. The presence of the Police Department in that neighborhood will help to deter crime and lower the crime rate.

This engineering work yielded detailed plans and specifications at the Dunbar Building, including the calculation of nutrient load reductions and engineered plans for the chosen BMPs. All areas will have native plants installed. Structural BMPs will include bio-retention, rain gardens, impervious area reduction, pervious pavement, water quality inlet retrofits, and tree planting. Non-structural BMPs such as disconnection of rooftop and non-rooftop runoff will be implemented throughout the project to enhance the effectiveness of structural BMPs.

Other goals of the future implementation include the removal of the impervious surface of the basketball court, and trees and Shrubs will be planted to supplement existing mature trees the enhance site's tree canopy as shown on the Concept Plan. Enhancing the tree canopy through planting will provide aesthetic benefits, curb air pollution, capture carbon, mitigate temperature (through reduction of heat island affect), act as a noise buffer, improve soils resistance to erosion, and significantly reduce storm water runoff through interception to decrease peak runoff during storm events. Newly installed BMP's will have informational signage with graphics indicating the benefits on receiving waters and the surrounding ecosystem.

## PROJECT ELEMENTS

- Engineered plan – The engineered plan created by this project had details on the placement and installation of BMPs, which include native plants, tree planting, impervious pavement removal, bio-retention areas, and the installation of pervious pavement.
- Native plants – Native plants offer numerous benefits. Because native plants are adapted to local environmental conditions, they require far less water. They provide vital habitats for birds, insects and other species of wildlife, prevent water run-off, and improve air quality.
- 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.
- Bio-retention areas – These features filter, store, and reduce stormwater runoff, allowing it to infiltrate into the ground before it enters into the storm drain system.
- Pervious paving – This alternative to traditional black top allows surface water to flow into the ground where the volume can be held, infiltrate into the lower soil or conveyed through a stormwater system. Porous paving is a good application for areas that require a hardscape surface and have no viable options for stormwater management. There are various applications and styles making porous asphalt a good aesthetic option as well as functional.



Details from engineered design plan

Concept plan from previous Green Streets grant

Year Awarded: 2019

Award Amount: $49,625

## SUSTAINABILITY & GROWTH

In 2021, the Town of Laurel was awarded a third Green Streets, Green Jobs, Green Towns grant to fully implement the engineering plan funded through this grant.

Project Partners: Chesapeake Bay Trust, George Miles and Buhr, Nanticoke Watershed Alliance, Town of Laurel, U.S. Environmental Protection Agency