

Grey to Blue Stormwater Planning Initiative

FUNDING SOURCE & AMOUNT

EPA 319 Grant

\$106,216 Awarded \$2749.93 City in-kind match

TIMEFRAME

January 2010 - December 2011

GRANT ADMINISTRATOR

North Carolina Coastal Federation

IN-KIND PARTNERS

City of Wilmington, NC

UNC-Wilmington

Withers & Ravenel (Consulting Contractor)

NC DWQ

SUMMARY / DESCRIPTION

Wilmington and NCCF partnered to develop a watershed restoration plan for Hewlett's and Bradley Creek watersheds, following EPA and NC DWQ's guidelines. The restoration plan is designed to reduce nonpoint source pollution loadings that contribute to water quality impairment and provide the foundation for broader citywide efforts to protect and restore water quality. This plan was developed in lieu of preparing a Total Daily Maximum Load (TMDL) for these two creeks.

The plan will be based on decades of accumulated water quality monitoring and scientific research by government agencies and the University of North Carolina at Wilmington (UNCW). This research has documented the relationships between the intensity of land development, hydrologic modifications within these two watersheds, and the increasing bacteria levels in downstream tidal creeks. The goal is to demonstrate an efficient and effective method for addressing water quality impairments in other tidal creeks and sounds in North Carolina without first exhausting valuable time and resources in preparing a TMDL.

GRANT GOAL(S)

- Develop a plan to reduce the volume of stormwater generated by land uses within the Bradley & Hewletts Creek Watersheds
- Focus stormwater reduction measures in locations where they will yield the greatest and most cost effective stormwater volume reductions
- Engage the public in helping to identify opportunities to reduce the volume of stormwater and in measure progress in accomplishing plan goals

SPECIFIC PROJECT DELIVERABLES

- DWQ-approved watershed-based plan for Bradley and Hewletts Creek
 Watersheds to identify pollutant point sources, BMP retrofit opportunities, quantify
 anticipated water quality benefits, and meet the other EPA elements
- Link to plan: https://www.wilmingtonnc.gov/home/showdocument?id=930
- An implementation plan and timeline, including construction drawings for up to five small scale retrofit sites within the watersheds.
- A set of design standards and a handbook to foster the use of sustainable stormwater management devices on City street improvement projects
- A GIS/web-based stormwater retrofit atlas for City, including publicly access
- Public education materials, meetings, and workshops