

# Resiliency through Restoration



Maryland

Larry Hogan, Governor

Boyd K. Rutherford, Lt. Governor

Jeannie Haddaway-Riccio, Secretary



## Background

Since 2011, Maryland has experienced six hurricane and flood events warranting Presidential Disaster Declarations, resulting in more than \$156 million in federal public assistance. These costs don't include impacts from the more common urban and nuisance flood events that impede day-to-day activities across the state. In July 2017, the Department of Natural Resources launched a Resiliency through Restoration Initiative with the goal of using nature-based designs to help protect communities, economies and ecosystems from climate change impacts. As part of this Initiative, the Department provides financial and technical assistance to local government and non-profit partners through the Community Resilience Grant.

## Goals of the Fund

The goal of this Initiative is to implement at least 15 priority restoration projects across the state over a five year period. Projects will demonstrate how nature-based techniques can build community resilience to climate change. Projects include shoreline restoration, beneficial use of dredged material, tidal marsh restoration, dune restoration, landscape-level green infrastructure, and other nature-based practices that provide community and ecosystem benefits. Projects are selected based on community exposure, level of community engagement, project readiness and status, cost efficiency, adaptation potential, ecological enhancement, demonstration value and broader social benefits.

## First of its Kind

Maryland fully funds nature-based designs to enhance local resiliency:

*"Worcester County, the only seaside county in Maryland, is one of the most vulnerable Maryland counties to sea level rise and climate change. The coastal environment is also the bedrock of our local tourism-based economy. Our waterfront communities are increasingly vulnerable and their protection poses numerous challenges. It's essential that we seek solutions for adapting to damaging storms, rising waters, and migrating coastlines and marshes."*

-Katherine Munson, Worcester County

## By the Numbers

16

Projects in Progress

8

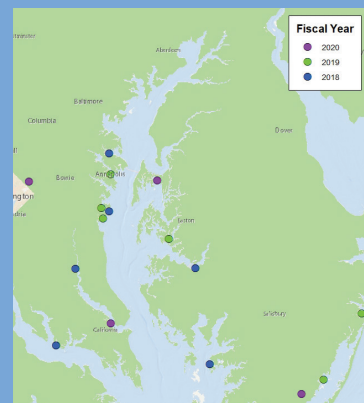
Jurisdictions Represented

\$8,350,000

Allocated State Funds

24

Partnerships Supported



Sixteen unique projects are underway to demonstrate nature-based solutions to climate change.

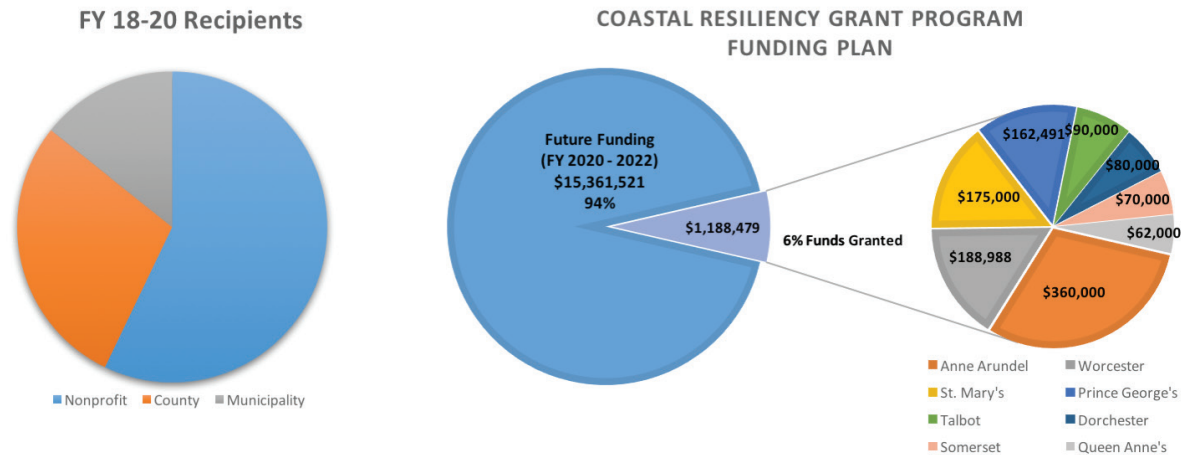
# CHESAPEAKE AND COASTAL SERVICE

## Resiliency through Restoration

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### Partnership and Funding

During the first 3 years of this Initiative, grant funds were awarded to local governments and nonprofits to initiate design of coastal and inland nature-based projects. Partnerships were developed with community associations, local Riverkeepers, churches, and researchers to help foster outreach, community engagement, and project monitoring.



### Program Expansion

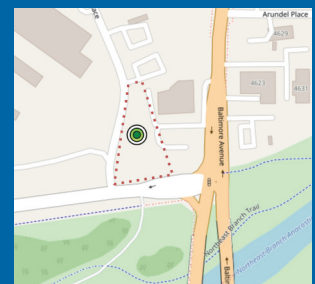
Between FY 2019 and FY 2020, the Department received requests for over 40 projects totaling over \$8.8 million. While the Resiliency through Restoration Initiative was originally developed to address coastal climate change impacts, the program was expanded during this period to also address flood impacts to inland and urban communities. Additional projects will be solicited in FY 2021 through DNR's Grants Gateway, which leverages federal and state funds to foster healthy ecosystems, communities, and economies that are resilient in the face of change.

### Monitoring and Performance

In partnership with the Chesapeake Bay National Estuarine Research Reserve, DNR finalized a monitoring framework and is tracking project performance to inform adaptive management needs and future designs. In preparation for FY 2020 construction projects, DNR staff were trained on shoreline monitoring. Additionally, partnerships were developed with nonprofits and universities to collect wave attenuation data at 1 project site.

### SPOTLIGHT: Addressing Urban Flooding in Hyattsville

The Low Impact Development Center in partnership with the City of Hyattsville is planning for more intense rain events as climate change impacts the region. This project showcases the use of multiple Community Resilience Grants and leveraged federal funds to identify flood-prone areas, propose green infrastructure solutions, and implement practices that are designed to address current and future conditions. Project partners are currently designing a submerged gravel wetland in Lower Ward 1 to reduce localized flooding in a highly impervious area of Hyattsville. During the first quarter of this grant, project partners planned outreach to local businesses and residents to share information about green infrastructure opportunities.



Hyattsville Project Site

The Resiliency through Restoration Initiative is supported through the Maryland Capital Budget Coastal Resiliency Program. Projects are funded completely or in part by the Chesapeake and Coastal Service. For more information, visit [dnr.maryland.gov/ccs](http://dnr.maryland.gov/ccs)