

QUARTERLY PROGRESS MEETING – June 2024

Chesapeake Bay Program



Tree Canopy Updates

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The screenshot shows the homepage of the Chesapeake Tree Canopy Network. At the top, there is a navigation bar with links for 'SIGN UP', 'NEWSLETTER ARCHIVE', 'ABOUT US', 'CONTACT US', and 'CHESAPEAKEFORESTBUFFERS.NET'. Below the navigation bar is a main header with the Chesapeake Tree Canopy Network logo and a welcome message: 'Welcome to the Chesapeake Tree Canopy Network'. A sub-header reads: 'Connecting you with resources, stories, and best practices to understand your canopy, expand your canopy, and maintain your canopy. Learn about and make the case to others why tree canopy is so critical to a healthy, vibrant Chesapeake Bay watershed. We are building this resource as we go, so please send your ideas and suggestions for making the network most helpful.' To the right of the text is a photo of a woman in a yellow safety vest. Below the photo is a link: 'Richmond, VA: An Urban Forestry Collaborative Plants Deep Community Roots Read More'. A secondary navigation bar contains 'Get updates on tree canopy news and events!', 'SIGN UP', and 'NEWSLETTER ARCHIVES'. The main content area is titled 'New Resources to Explore' and includes two sections: 'County Tree Cover Fact Sheets' and 'Guide for Local Government Leaders'. The 'County Tree Cover Fact Sheets' section features a 'Tree Cover Status & Change FOR CUMBERLAND COUNTY, PA' infographic with the following data: Total Percent of County with Tree Cover: 43.6%; Annual Benefits provided by Tree Cover (in reduced air pollution, stormwater, & carbon dioxide): \$42.6 Million; Net Loss of Tree Cover on Developed Lands, 2013 to 2017: -791 Acres. Below this is a breakdown of land use: 'What is the land use/land cover breakdown in your county? 350,179 ACRES OF LAND AREA IN CUMBERLAND COUNTY' and 'Where does tree cover occur in your county? 83.9% is in forest (128,186 acres), 1.4% is over impervious (2,078 acres), 5.3% is other tree cover (8,144 acres)'. The 'Guide for Local Government Leaders' section features a link to 'A Local Government Guide to the Chesapeake Bay Module 4: Capitalizing on the Benefits of Trees'. At the bottom left of the screenshot is the website URL: www.chesapeaketrees.net. A small 'Privacy Terms' icon is visible in the bottom right corner.

Through the Chesapeake Bay Watershed Agreement, the Chesapeake Bay Program has committed to...



Goal: *Vital Habitats*

Outcome: *Tree Canopy*

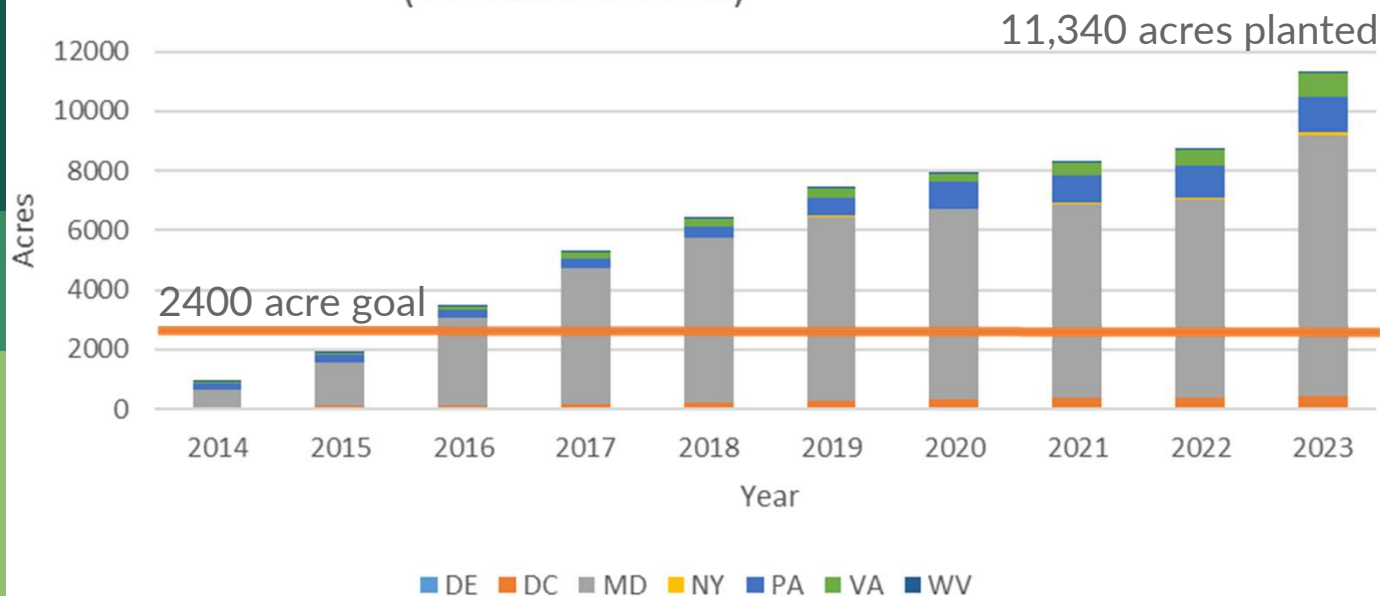
Continually increase urban tree canopy capacity to provide air quality, water quality and habitat benefits throughout the watershed. Expand urban tree canopy by **2,400 acres by 2025.**

What is our Expected and Actual Progress?



1.

Community Tree Planting BMPs Reported
(cumulative acres)



Tree Canopy Indicator recently updated on [Chesapeake Progress](#)

2.

Land Use/Land Cover Change
Detected from Imagery

Tree Canopy Net Change in Census Places (2013/14-2017/18)

Jurisdiction (CB Only)	Net Change (Acres)
Delaware	-28
DC	21
Maryland	-13,804
New York	78
Pennsylvania	-2,444
Virginia	-9,548
West Virginia	-107
Total	-25,832

Successes: Putting New Data to Use



Tree Cover Status & Change

FOR CUMBERLAND COUNTY, PA

43.6%

Total Percent of County with Tree Cover

\$42.6 Million

Annual Benefits provided by Tree Cover (in reduced air pollution, stormwater, & carbon dioxide)

-791 Acres

Net Loss of Tree Cover on Developed Lands, 2013 to 2017

What is the land use/land cover breakdown in your county?

350,179 ACRES OF LAND AREA
IN CUMBERLAND COUNTY

83.9%
is in forest
(128,186 acres)

1.4%
is over impervious
(2,075 acres)

9.4%
is over turf grass
(14,411 acres)

5.3%
is other tree cover
(8,144 acres)

Where does tree cover occur in your county?

43.6% Tree Cover ¹
152,816 acres

8.2% Impervious (Buildings/Pavement)
28,747 acres

36.9% Agriculture
129,193 acres

3.5% Other ²
12,220 acres

7.6% Turf Grass (Lawns)
26,560 acres

0.2% Non-Forested Wetlands
643 acres

What are some benefits of tree cover in your county?

- Total Air Pollution Removal Value**
9,680 lbs removed annually
\$9.2 Million saved annually
Total air pollution removal includes CO, NO₂, O₃, SO₂, and Particulate Matter (PM2.5, PM10).
- Gallons of Reduced Stormwater Runoff Value**
560.8 million gallons reduced annually
\$5.0 million saved annually
- Carbon Sequestered Value**
151,000 tons removed annually
\$28.4 million saved annually

Calculated based on 2017 tree cover data using: landscape.itreetools.org

1. Tree cover includes all trees occurring on all land uses, such as individual trees found over turf, impervious, agricultural, wetlands, or other lands. It also includes areas of "forest," defined in this dataset as patches of tree cover 1 acre or greater, with a minimum patch width of 240 feet.

2. Other includes a mixture of non-treed land uses not captured in the main pie chart categories. See the Data Guide for detailed definitions of "other" and all the land use categories.

Land use/land cover statistics were generated based on 2017 imagery using the 2022 edition of the Chesapeake Bay Land Use and Land Cover Database.

CHESAPEAKE TREES.NET
PUBLISHED FEBRUARY 2023

How is tree cover changing on developed and developing lands?

Understanding how your tree cover changes over time can inform the sustainable management of forests and community trees. The map to the left shows where your county has lost and gained tree cover from 2013 to 2017, focusing on land that is already or newly developed.

Tree cover can be lost quickly due to human activities (e.g., construction) or natural events (e.g., severe weather).

Tree cover can be gradually increased through tree planting and natural regrowth, but these gains may take 10-15 years to be detected in high resolution imagery.

Since mature, healthy trees provide significantly greater community benefits than newly planted trees, it is important to both preserve existing tree cover and seek opportunities to grow new trees and forests. Local land use planning, ordinances, and tree programs play a critical role!

Tree Cover Change on developed/developing lands (2013-2017)

Category	Acres
Gains (202 acres)	202
Losses (994 acres)	994
Acres gained over turf/impervious	179
Acres gained over impervious	23
Acres lost to turf/impervious	406
Acres lost to impervious	588
Net Change = Gains - Losses (-791 acres Net Loss)	-791

Learn More:

- Chesapeake Tree Canopy Network**
Links to county fact sheets, user guides, map viewers, datasets, and more
- Tree Equity Score**
Explore maps of how tree benefits are distributed across communities
- Capitalizing on the Benefits of Trees**
A slideshow for local leaders featuring tree benefits, case studies and resources
- State Urban and Community Forestry Assistance**
(Ned Brockmeyer, Pennsylvania Website)

Fact sheets produced through a grant from the USDA Forest Service. USDA is an equal opportunity provider, employer and lender.

All Chesapeake County Fact Sheets Available at <https://chesapeaketrees.net/understand-your-canopy/>
Municipal Fact Sheets coming late 2024

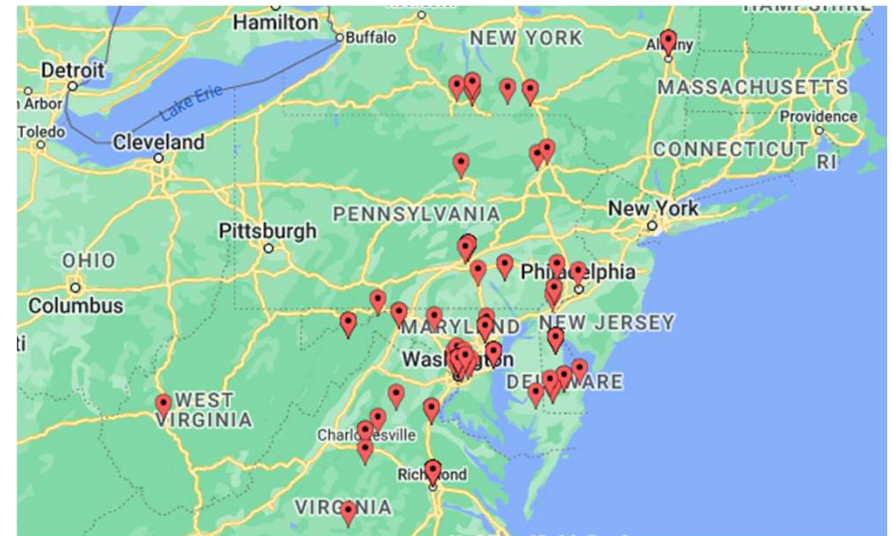
Successes: Tree Canopy Funding & Policy Roundtable

Summary

- March 13-14, 2023
- 125 participants
- Themes: **equity, climate resilience, and tree loss**
- Presentations, panels, breakout discussions

Goal: identify funding, policy, and programmatic solution pathways to expand urban tree canopy in the Chesapeake Bay Watershed

Final Report, Recordings and Jurisdiction Action Plans Posted [here](#)



Jurisdiction Action Plans

[New York](#)

[District of Columbia](#)

[Pennsylvania](#)

[Maryland](#)

[Delaware](#)

[Virginia](#)

[W. Virginia](#)

Successes: Historic Inflation Reduction Act Funding (IRA)

URBAN AND COMMUNITY FORESTRY GRANTS

USDA is an equal opportunity
provider, employer, and lender.

\$1.5 Billion to Expand Tree Canopy and Access to Nature

100% of Benefits Will Flow to Communities in Greatest Need

Urban and Community Forestry Grants, authorized under the Inflation Reduction Act, provide funding to community-based organizations, Tribes, State and local agencies, public colleges and universities, and non-profits working to provide equitable access to trees and nature and the benefits they provide to urban communities.



Investing in a Healthier
Future for America

Expanding Tree Canopy
in our Communities

The Benefits of Trees
in our Communities

Confronting the Growing Threat of
Extreme Heat and Climate Change

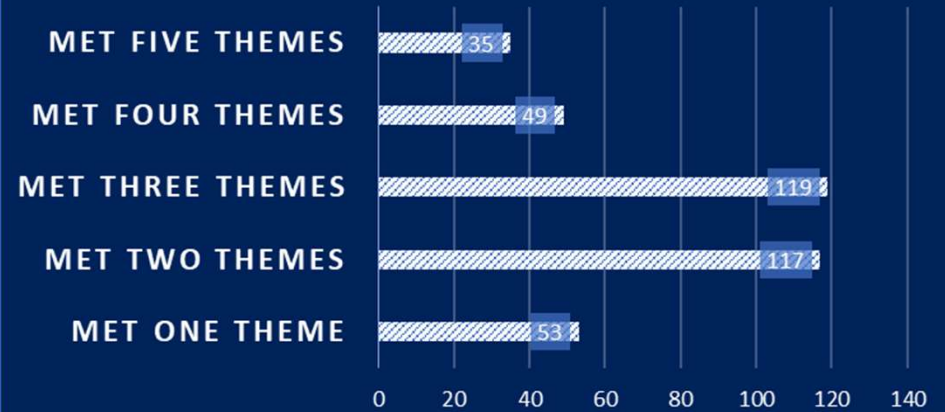


Urban and Community Forestry IRA Grant Themes

- Workforce Development
- Extreme Heat
- Restoration & Resilience
- Tree Planting & Maintenance
- Community Engagement & Planning



AWARDEES ADDRESSING MULTIPLE THEMES



Award selection prioritized projects that addressed multiple IRA-UCF themes.

IRA Awards in the Chesapeake Bay Watershed: DC and MD

State	Project	Partner	Funding
DC	Advancing Tree Equity	Casey Trees	\$9,115,260
MD	The Mid-Atlantic Environmental Justice Fund	Chesapeake Bay Trust	\$17,000,000
MD	Baltimore Tree Trust	Baltimore Tree Trust	\$7,000,000
MD	Baltimore Community Canopy	Civic Works, Inc	\$3,000,000
MD	Gather and Grow	Chesapeake Conservancy	\$2,000,000
MD	Sembrando el Futuro / Embajadores de los Árboles	Defensores de la Cuenca	\$2,000,000
MD	Stillmeadow PeacePark and Learning Center	Stillmeadow Community Projects	\$2,000,000
MD	Tree-Cosystems for Green Communities	Nature Forward	\$1,359,369

Grants selected from 2023 National Notice of Funding Opportunity

For project descriptions, visit <https://www.fs.usda.gov/managing-land/urban-forests/ucf/2023-grant-funding>.

IRA Awards in the Chesapeake Bay Watershed: PA and VA

State	Project	Partner	Funding
PA	Harrisburg City TreeVestment	City of Harrisburg	\$2,000,000
PA	Proactive Systemic Maintenance	City of Lancaster*	\$1,000,000
PA	Trees for All	Borough of Mechanicsburg*	\$500,000
PA	Borough of State College Urban Forestry Sustainability	Borough of State College*	\$369,355
VA	Black and Brown-Led, Coalition-Based Urban Greening	City of Richmond	\$6,000,000
VA	Hampton Roads Blue Green Oasis	Norfolk State University	\$5,000,000
VA	Norfolk Blue-Greenway Project	City of Norfolk	\$4,000,000
VA	Stewarding, Planting, Restoring Our Urban Trees	City of Fairfax*	\$1,000,000
VA	Norfolk Urban Forestry Capacity Building	City of Norfolk Parks & Forestry	\$1,000,000
VA	Winchester Greening and Urban Tree Maintenance	City of Winchester*	\$550,000
VA	Charlottesville Urban Forest Management Planning	City of Charlottesville*	\$150,000

**Funded through national pass-through partners*

Grants selected from 2023 National Notice of Funding Opportunity

For project descriptions, visit <https://www.fs.usda.gov/managing-land/urban-forests/ucf/2023-grant-funding>.

IRA State Urban and Community Forestry Funding (5 year grants)

State	Statewide Funding
Delaware	\$0.75M
District of Columbia	\$0.75M
Maryland	\$6.0M
New York	\$13.5M
Pennsylvania	\$9.8M
Virginia	\$6.6M
West Virginia	\$0.75M
Total	\$38.1M

- 80% of the funding delivered through competitive grant programs
- 100% focus on benefiting Justice 40/disadvantaged communities
- Most state RFPs closed by early 2024, DC still open, DE coming soon

Roundtable Recommendations & Workplan Actions

1. Bolster funding and partnerships

Workplan Actions

Roundtable recommendations

1. Amend regional and state tree canopy grant funding programs to prioritize equity and maintenance.
2. Dedicate adequate state and local funding for tree maintenance on public and private property.
3. Invest in target communities through workforce development: hire tree care coordinators and tree maintenance staff from the communities served; provide training, mentorship, and support.

MANAGEMENT APPROACH 1: Bolster funding and partnerships				
Action #	Description of Step	Responsible Party or Parties	Geographic Location	Expected Timeline
1.1	Implement funding strategies from state tree canopy action plans, with a focus on building dedicated, long-term funding streams for tree maintenance and capacity-building needs.	1. DE FS, DNREC and partners 2. DDOT, DOEE and partners 3. MD FS, MDE and partners 4. NYSDEC, Upper Susquehanna Coalition and partners 5. PA DCNR and partners 6. VA DOF and partners 7. WVDEP, WVDOF, Cacapon Institute and partners	Bay-wide	2024-2025
1.2	Implement federal and state IRA grants supporting disadvantaged communities	USFS, DE FS, DDOT, MD FS, NYSDEC, PA DCNR, VA DOF, WVDOF	Bay-wide	2024-2028
1.3	Complete GIT-funded project on Addressing Regional Tree Supply Challenges and Opportunities	University of Florida (contractor), with input from USFS, Forestry Workgroup	Bay-wide	2024

New 2024- 2025 Workplan now posted on [Chesapeake Progress](https://www.chesapeakeprogress.com/)

Roundtable Recommendations & Workplan Actions

2. Strengthen policy and ordinances

Workplan Actions

Roundtable recommendations

- 4. Share models and best practices for effective incentive-based and regulatory approaches to protect urban tree canopy.
- 5. Strengthen local codes and ordinances to protect trees, especially during development and redevelopment. Where necessary, amend state policy to enable localities to enact ordinance improvements.
- 6. Integrate trees for climate resilience into comprehensive plans (and other local plans) with specific goals, and include climate resilience strategies in urban forest plans and projects.

MANAGEMENT APPROACH 2: Strengthen policy and ordinances				
Action #	Description of Step	Responsible Party or Parties	Geographic Location	Expected Timeline
2.1	Compile models and best practices for effective incentive-based and regulatory approaches to conserve existing urban tree canopy, including case studies that could be replicated.	Forestry Workgroup – new GIT funding proposal	Bay-wide	2024-2025
2.2	Implement policy strategies from state tree canopy action plans	1. DE FS, DNREC and partners 2. DDOT, DOEE and partners 3. MD FS, MDE and partners 4. NYSDEC, Upper Susquehanna Coalition and partners 5. PA DCNR and partners 6. VA DOF and partners 7. WVDEP, WVDOF, Cacapon Institute and partners	Bay-wide	2024-2025
2.3	Develop a trees & climate resilience strategy guide for local governments	Forestry Workgroup – new GIT funding proposal	Bay-wide	2024-2025

Roundtable Recommendations & Workplan Actions

3. Increase technical capacity and knowledge

Workplan Actions

Roundtable recommendations

7. Improve utilization of data on tree canopy coverage and economic value of trees, including through the provision of technical assistance.

8. Provide communities with technical assistance to implement policy and ordinance changes, and to apply for and manage funding and financing opportunities.

MANAGEMENT APPROACH 3: Increase technical capacity and knowledge				
Action #	Description of Step	Responsible Party or Parties	Geographic Location	Expected Timeline
3.1	Convene annual Tree Canopy Summit to engage urban forestry practitioners and cross-sector partners in best practices and innovative strategies	USFS, Forestry Workgroup, Alliance for the Chesapeake Bay	Bay-wide	2024-2025
3.2	Communicate Tree Canopy status & change to stakeholders through updates to the State of Chesapeake Forests <u>Storymap</u> and new municipal factsheets (2013-2018, and with new 2021/2022 data when released)	USFS, USGS, Chesapeake Conservancy, and Forestry Workgroup, with input from Land Use Workgroup, Local Leadership Workgroup	Bay-wide	2024-2025

Roundtable Recommendations & Workplan Actions

4. Expand community outreach and education

Workplan Actions

Roundtable recommendations

9. Develop consistent, customizable, multilingual messaging regarding the many benefits of trees, including guidance on how to address competing priorities.

10. In communities targeted for tree canopy initiatives, proactively identify and meaningfully partner with community voices.

MANAGEMENT APPROACH 4: Expand community outreach and education				
Action #	Description of Step	Responsible Party or Parties	Geographic Location	Expected Timeline
4.1	Host quarterly webinars: tree equity community of practice	USFS, Forestry Workgroup, CBP communications, with input from Diversity Workgroup	Bay-wide	2024-2025
4.2	Continue updating the Chesapeake Tree Canopy Network and e-newsletter as our primary hub for resources and sharing community stories	Alliance for the Chesapeake Bay, USFS, Forestry Workgroup	Bay-wide	2024-2025
4.3	Develop consistent, customizable, multilingual messaging regarding the many benefits of trees, including guidance on how to address competing priorities.	Forestry Workgroup, CBP Communications, TBD-needs funding/contractor support	Bay-wide	2024-2025
4.4	Develop a communication strategy building on recommendations of the Identifying Communications	Forestry Workgroup, CBP Communications, TBD-needs funding/contractor support	Bay-wide	2024-2025

CREATE VIBRANT COMMUNITIES

- Incorporating trees into common spaces in public housing increases social activities.¹
- Having larger trees in yards and on the street can improve home values by 3%-15%.²
- Shoppers will spend 9%-12% more in areas with better tree canopy.³

REDUCE AIR POLLUTION

- Neighborhoods with lots of trees have lower childhood asthma rates.

PROVIDE SHADE & COOLING

- Tree canopy can reduce temperatures by up to 20 degrees, lowering health risks and utility bills.

TREES in COMMUNITIES



Questions and Discussion

IMPROVE HUMAN HEALTH

- Trees help reduce stress, lower blood pressure, and boost the immune system.
- Shade from trees reduces radiation that causes skin cancer.

CONTROL STORMWATER

- Tree roots can trap sediment and filter contaminants from stormwater.
- One tree can reduce stormwater runoff by 13,000 gallons per year.⁴

IMPROVE PUBLIC SAFETY

- Areas with increased green space have lower crime rates.³

Source:

[Chesapeake Forest Restoration Strategy](#)