

The Chesapeake Bay

Watershed Forestry Program



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USDA Forest Service



The roots of forestry are in watershed management

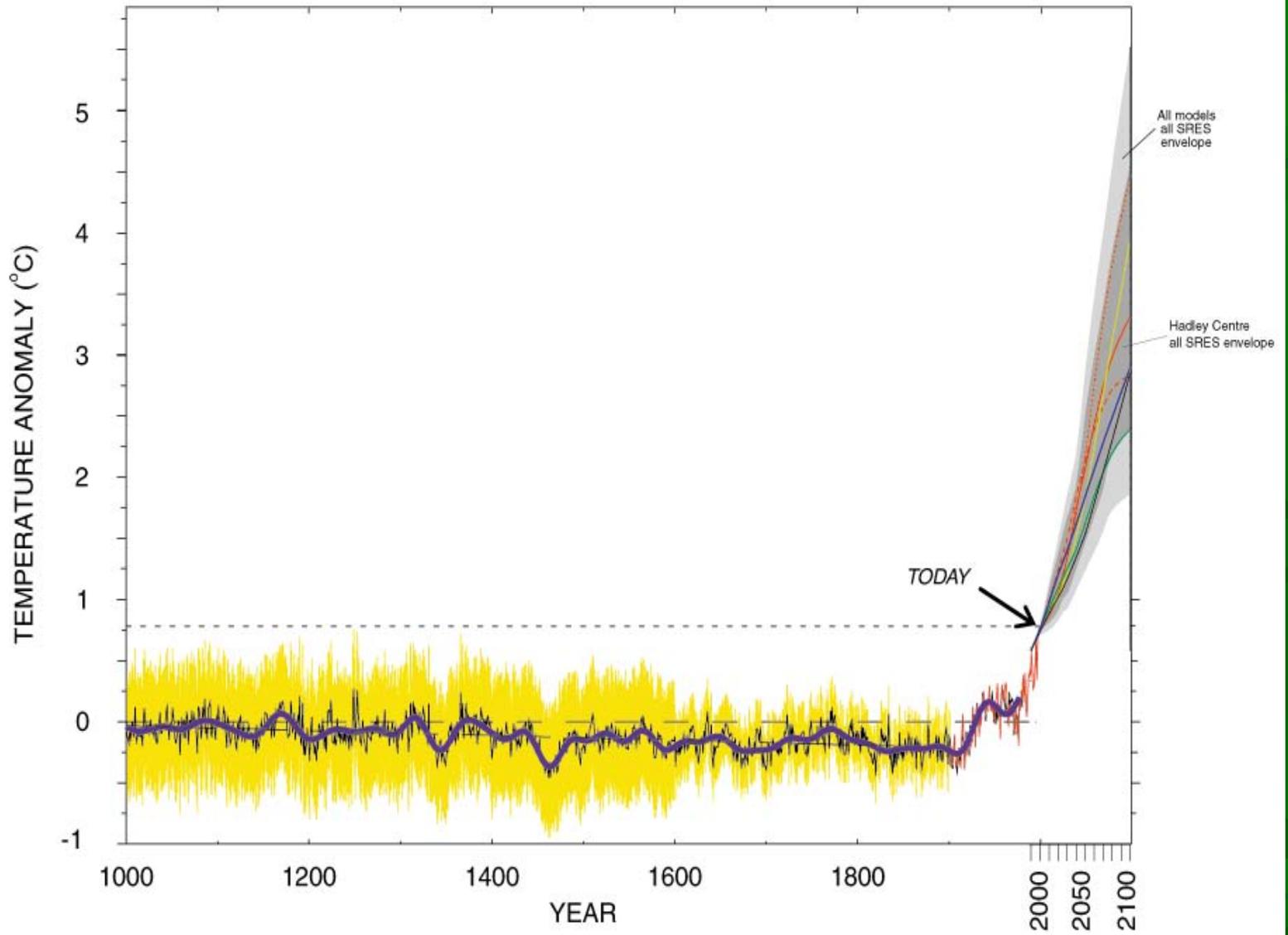
Gifford Pinchot
believed that we
ought to value forests
for their *“effects on
the climate and
floods, rainfall and
runoff, springs and
erosion.”*

1905

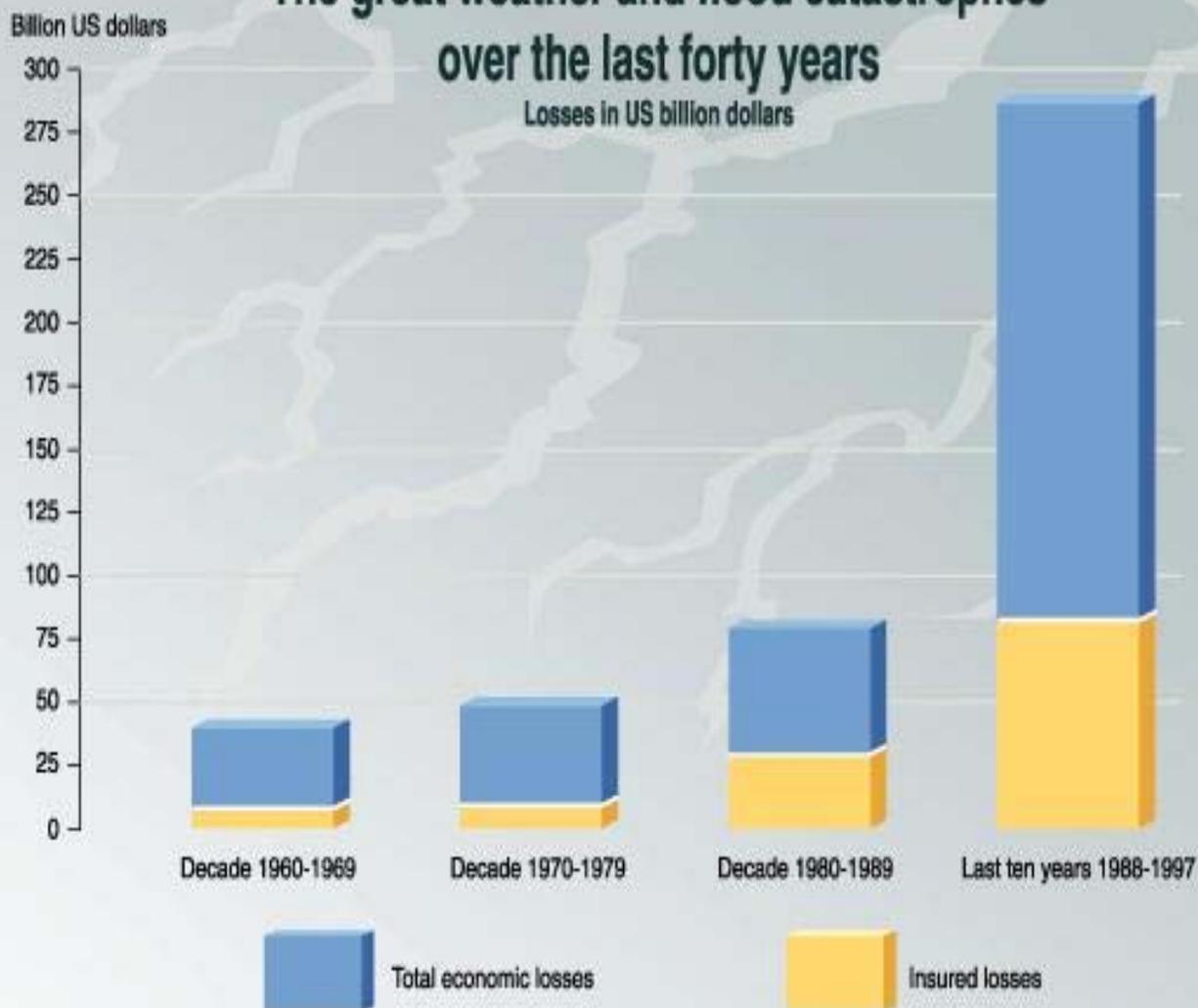




Temperature, past and future



The great weather and flood catastrophes over the last forty years



ABOUT THE CHESAPEAKE BAY



- **World's second largest estuary**
- **A National Treasure**
- **200 miles long**
- **Vast watershed (64,000 mi²)**
- **Six states plus DC**
- **15+ million residents**
- **Atlantic Flyway**
- **2 decades of effort**
- **Internationally significant**
- **Watershed Partnership**



....linking land and water

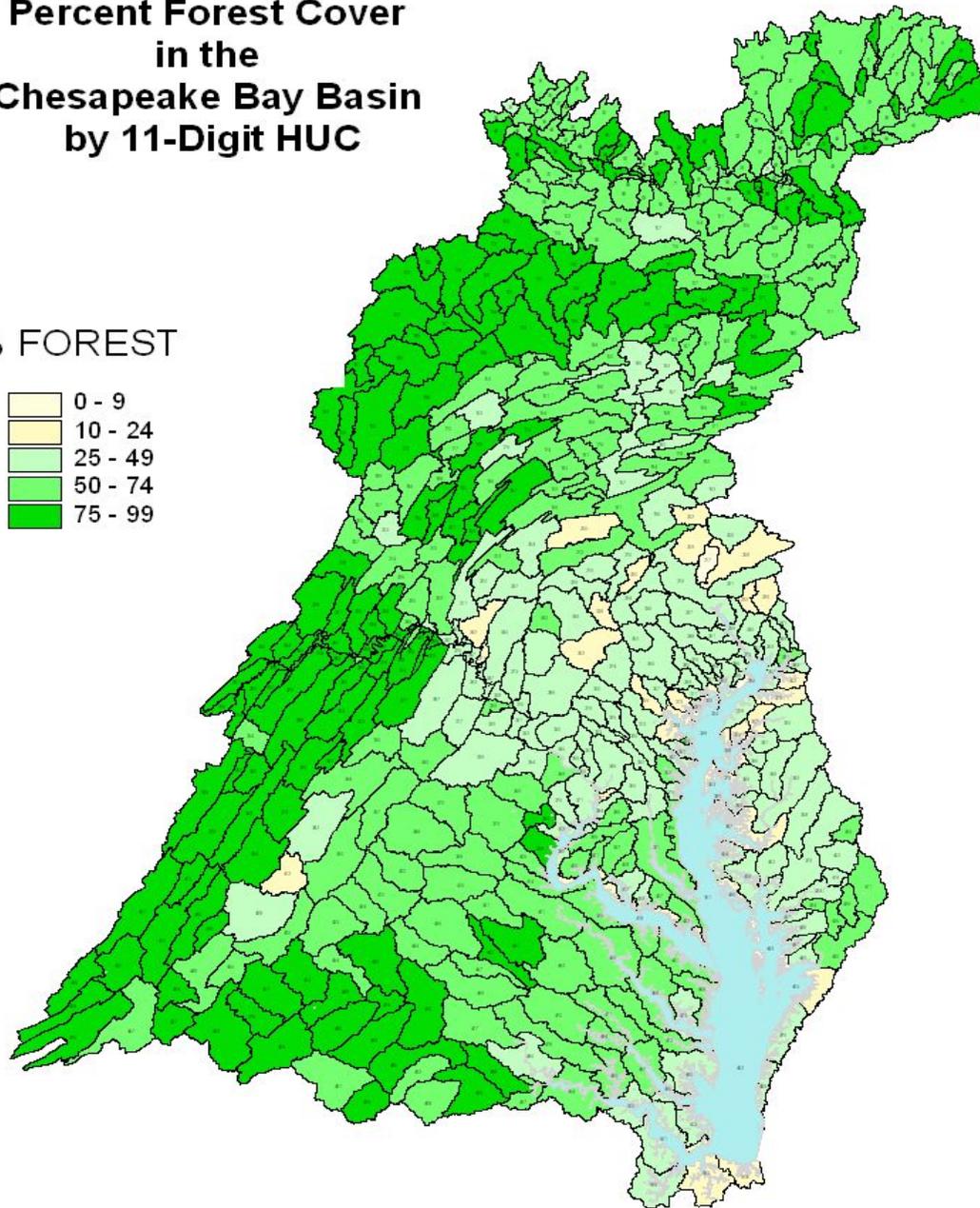
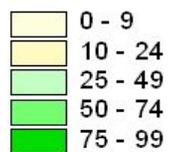
Ratio of Land to Water Volume for Enclosed Coastal Seas

- Chesapeake Bay
- Gulf of Finland
- Great Lakes
- Lake Victoria
- Baltic Sea
- White Sea
- Gulf of Bothnia
- Hudson Bay
- Black Sea

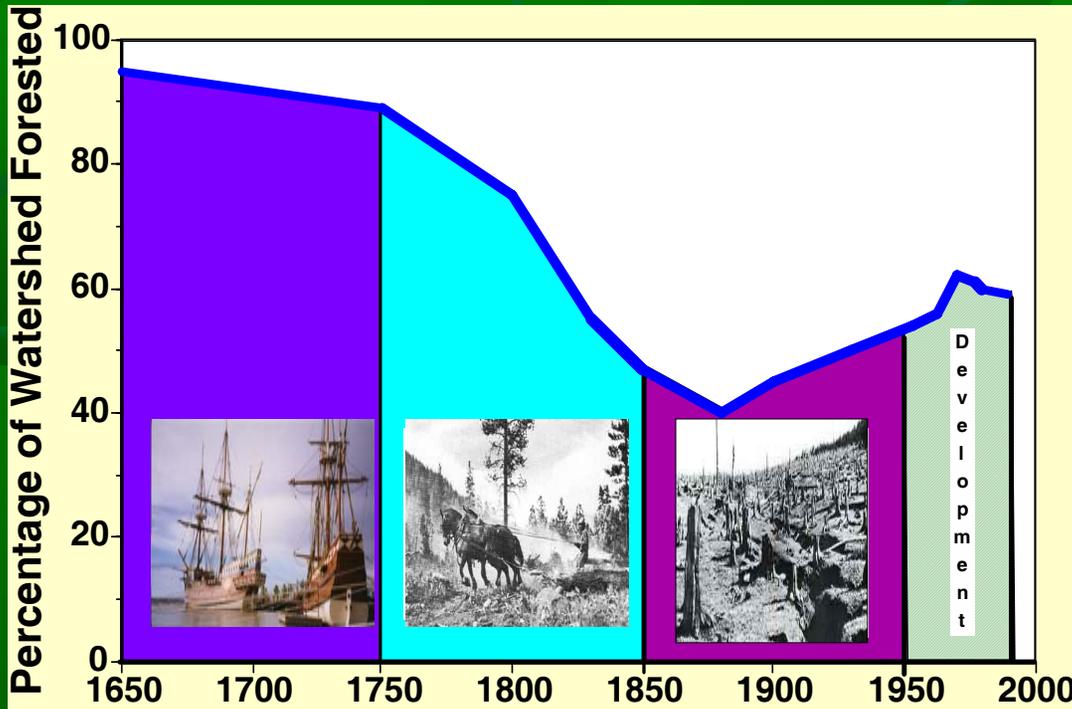


Percent Forest Cover in the Chesapeake Bay Basin by 11-Digit HUC

% FOREST



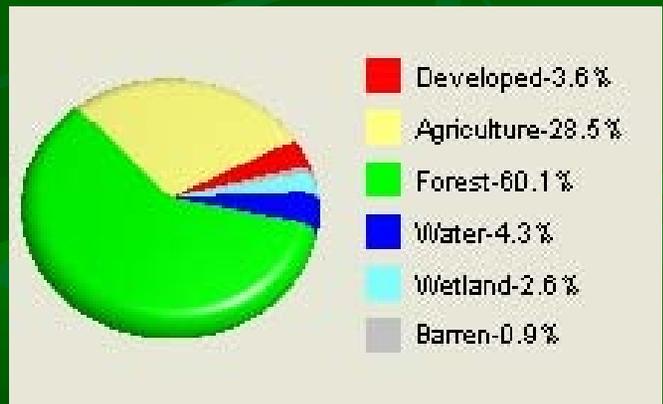
Change in Forest Lands



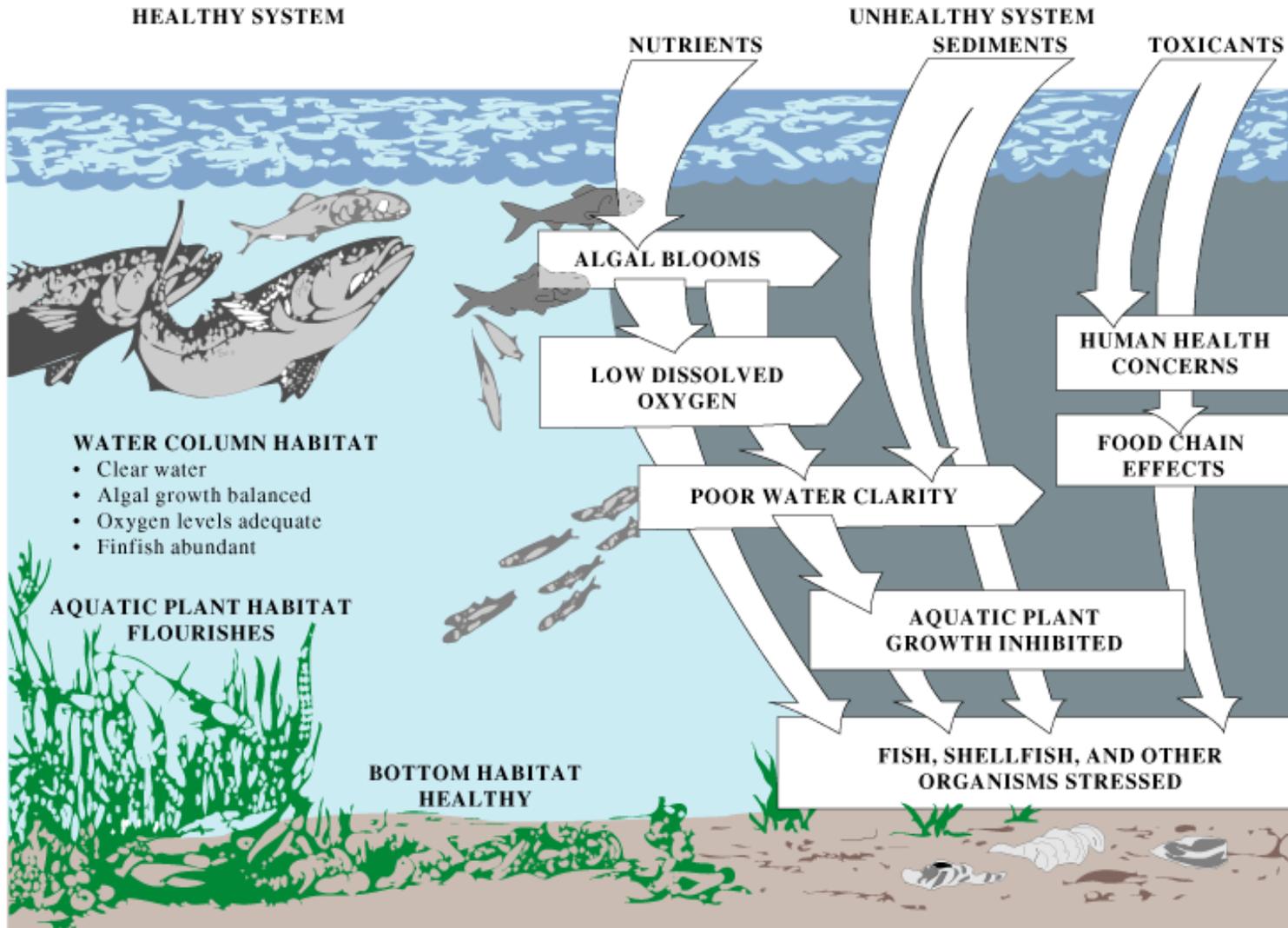
Source: US Forest Service

- In the 1600s, about 95% of the basin was forested.
- Current losses of 100 acres per day.
- Quality may be as important as quantity:
 - proximity to water
 - species diversity
 - habitat fragmentation
 - economic viability.

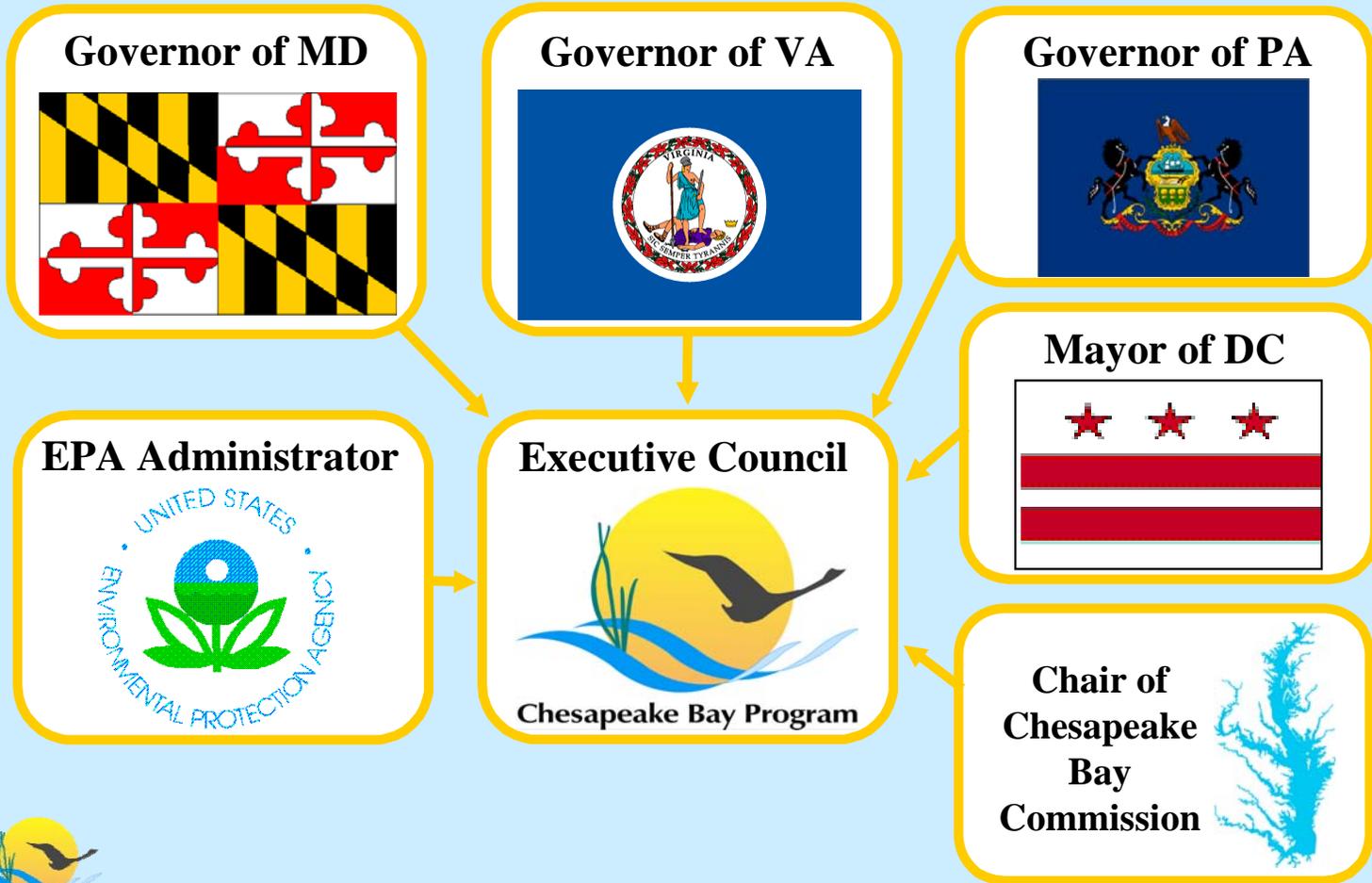
Forests contribute the least amount of pollutants of any land use and do more to reduce non-point source pollutants than other land uses.



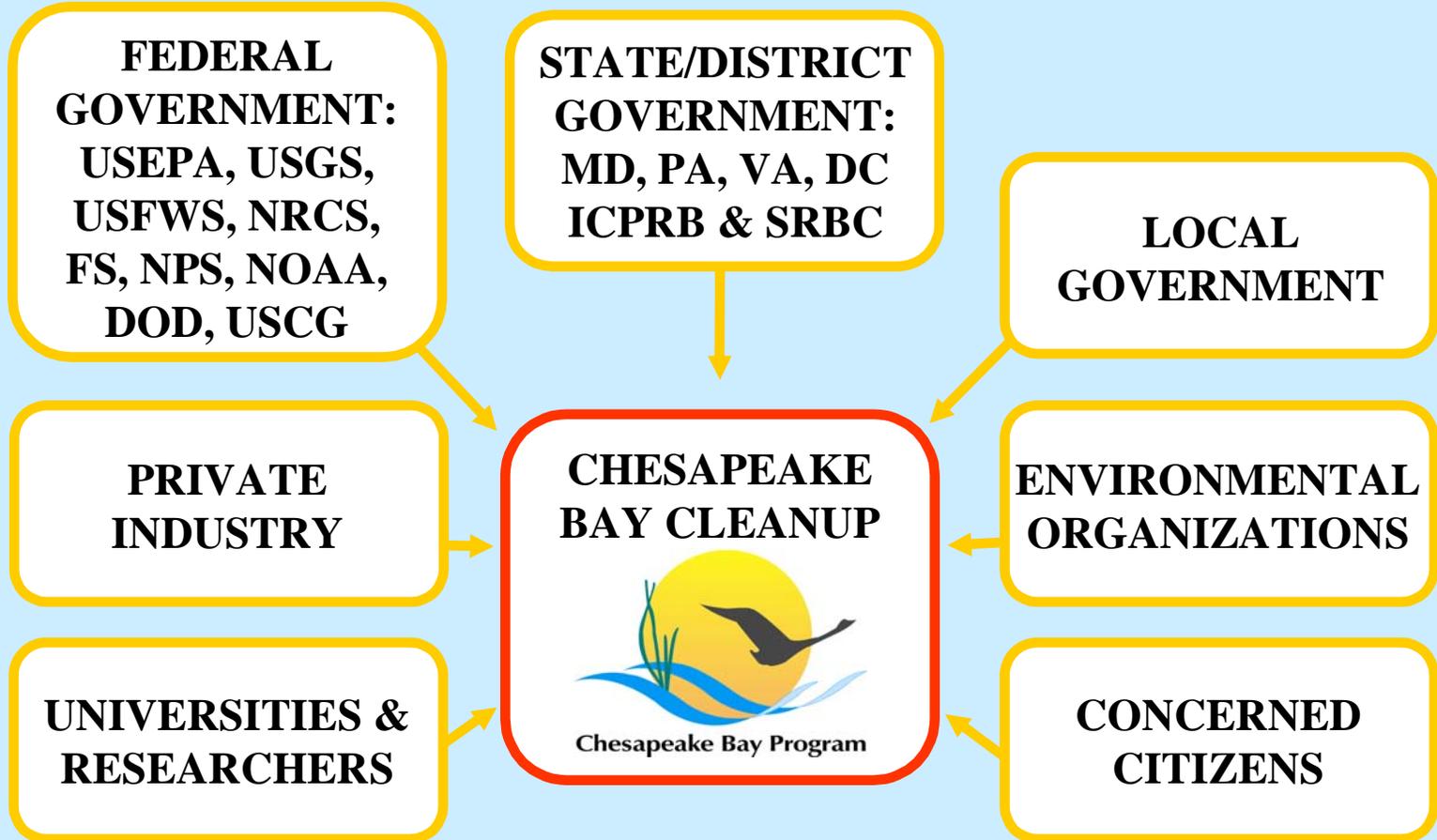
Effects of Pollutants on the Bay



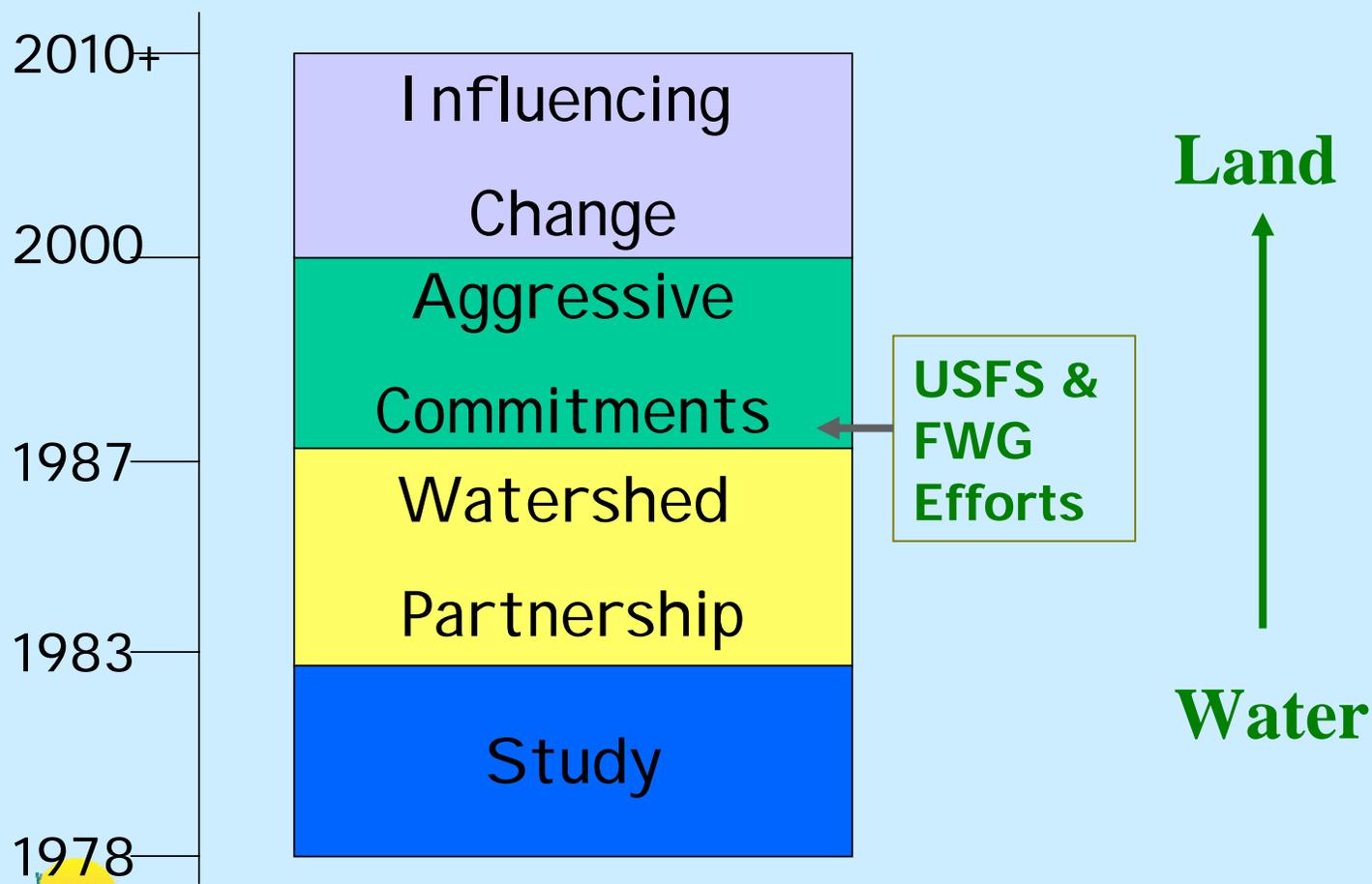
The Chesapeake Bay Program Partnership



The Bay Cleanup Involves Partners at All Levels



The Chesapeake Bay Program Epoch

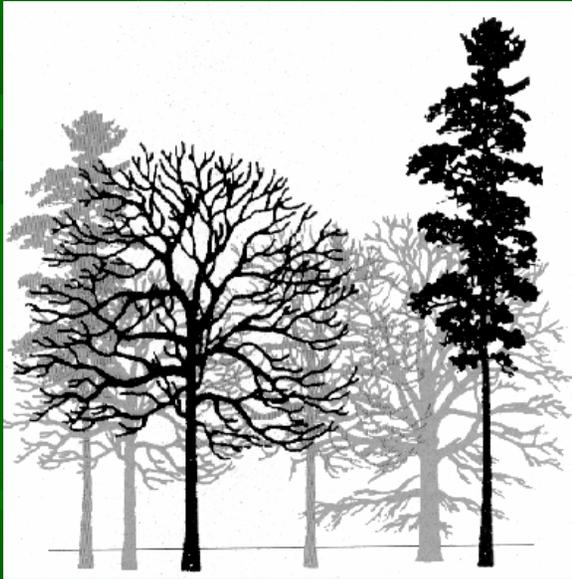


Seeing Forests as Solutions

- Conservation
- Restoration
- Forest Stewardship



Forestry Workgroup, Est. 1989



Members:

- USDA Forest Service
- State Forestry Agencies
- Other State Agencies
- US FWS, NRCS, NOAA
- Alliance for the Chesapeake Bay
- Chesapeake Bay Foundation
- American Forests
- Cooperative Extension
- Local Government



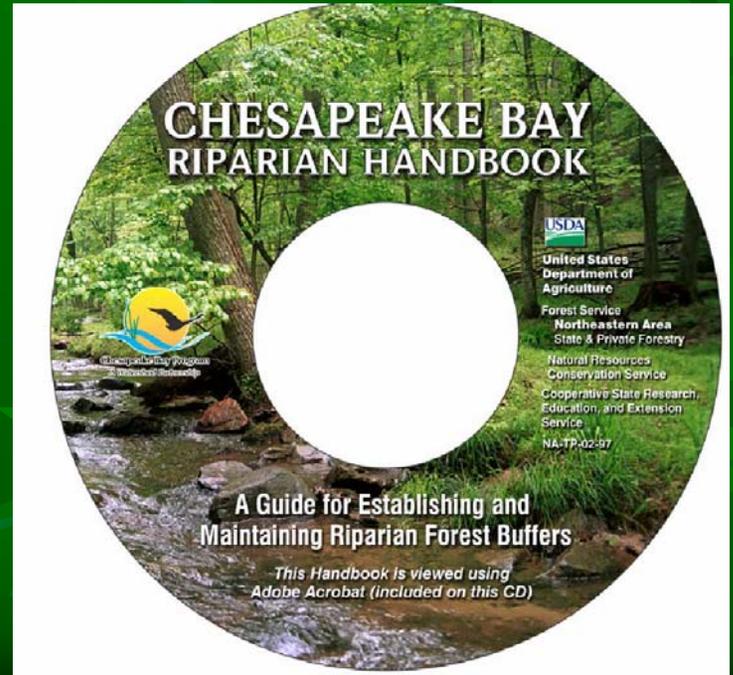
Representing the forestry community...

Where we fit— selected *Chesapeake 2000* goals

- Reduce N, P & sediment inputs and “delist” the Bay by 2010
- Reduce sediment loads
- Watershed Plans for 2/3 of local jurisdictions
- Conserve existing forests along all streams and shorelines and set a new restoration goal
- Reduce rate of sprawl (land consumption) by 30%
- Provide a meaningful watershed educational experience to all students before high school graduation



Fifteen years – Over 170 projects & grants



Measure of Success: Are they listening?



How many times does the word "forest" appear in Chesapeake Bay EC Agreements ?

- 1983 - 0
- 1987 - 0
- 1992 - 1
- 2000 - 10



What has been gained?

- Demonstration and testing of new approaches, yielding direct results
- A focal point for Bay restoration
- A “crucible” for testing watershed forestry projects of national scope (e.g., CREP, Watershed Forestry Assistance Program)
- Continued leadership in the field of watershed forestry and riparian forest buffer restoration



Chesapeake Bay Watershed Forestry Strategic Action Plan 2004-2008



Sustain and Expand Partnerships

- Forestry Work Group
- Potomac Watershed Partnership
- Rappahannock Partnership
- Lower Susquehanna Initiative
- Watershed 263
- National Fish and Wildlife Fdn



Develop and Deliver Forestry Information and Outreach

- Annual Service Foresters Bay Workshop
- NPR Urban Tree Series – *this Fall*
- Watersheds and Weather Broadcasts
- Publications

Future work: Forest Ecosystem Services
Economic Valuation

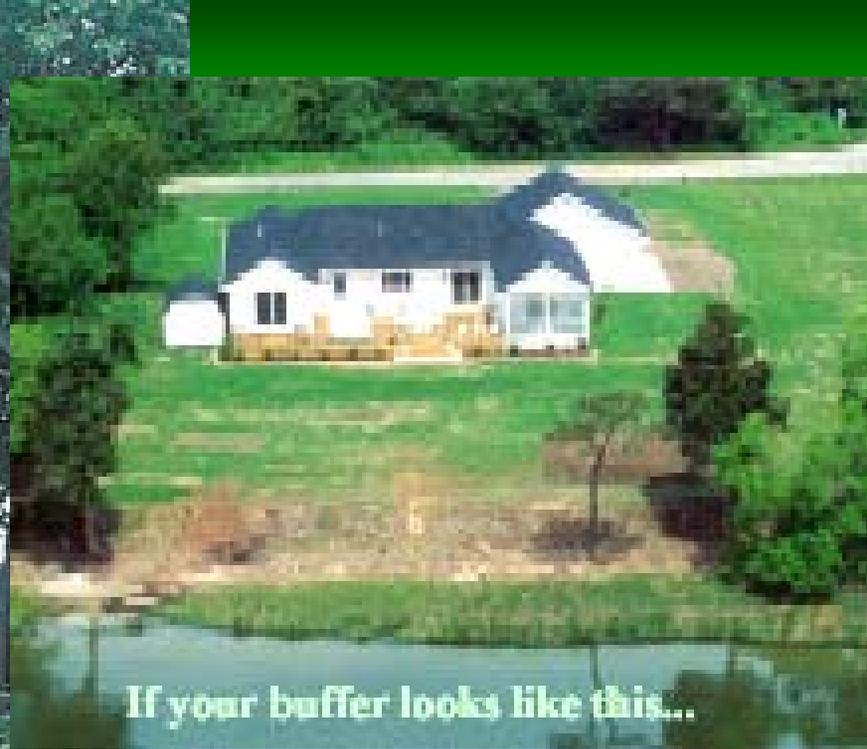


Innovative Outreach...

■ Growing Native

- Links people with trees and water
– “Getting nuts for clean Water”
- growingnative.org
- New this year are self guided - established collection center
- **Results** - Over 10 tons of seed, 10,000 volunteers, 200 collection sites





If your buffer looks like this...

Acknowledgments

This brochure was created with support from the US Forest Service (www.fs.fed.us)



This institution is an equal opportunity provider.

Photo courtesy of Northern Neck POC

Got Buffer?

Overcoming the mind set of waterfront landowners

Promote a Contiguous Healthy Forest Land Base

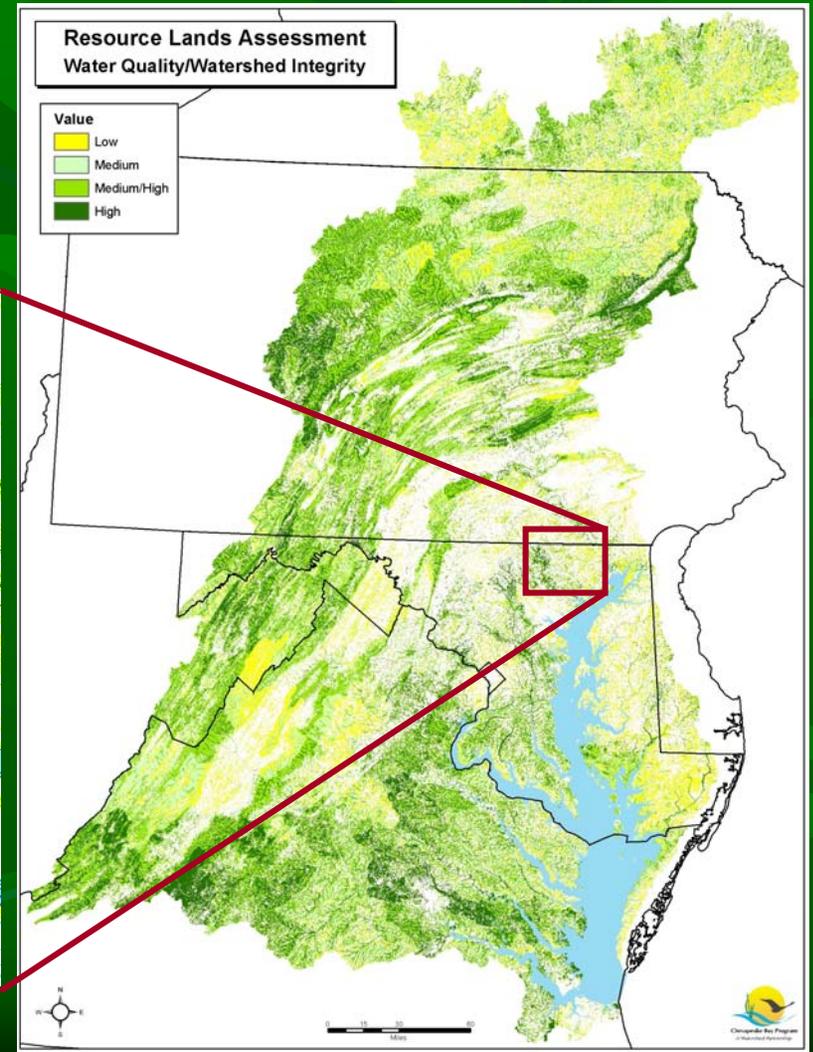
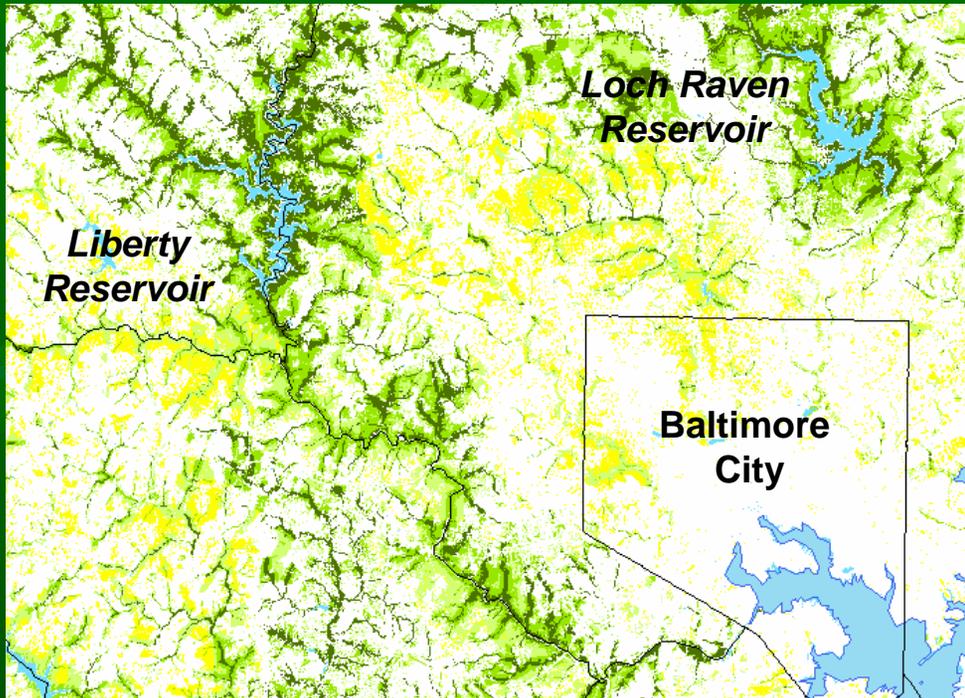
- **Landowner Assistance**
 - *“Forestry for the Bay”*
- **State of the Chesapeake Forests Report**
- **Goods from the Woods**
- **Resource Lands Assessment**



Resource Lands Assessment

Where are the forests, farms, and wetlands that:

- *have the highest values related to water quality, habitat, economy, and culture?*
- *are most vulnerable to loss?*



Protect and Restore Riparian Forests

- 10,000 mile restoration goal (*Tributary Strategies = 50,000 miles of primarily hardwood reforestation*)
- Bay Riparian Buffer Specialist
- Conservation Status
- Riparian Buffer Design Training Program (2006)
- Restoration Techniques Workshop
- Expand Urban Tree Canopies in watershed communities



Thank you for taking the time to report your riparian forest buffer restoration project. **Instructions:** the required fields below are indicated by a *. Other fields are optional. Please share as much information with us about your project as possible. Please contact the [Chesapeake Bay Program's Forestry Workgroup](#) with any questions.

General Information

*Project Name:

*Contact Name: *Contact Phone:

*Completion Date:

Project Location

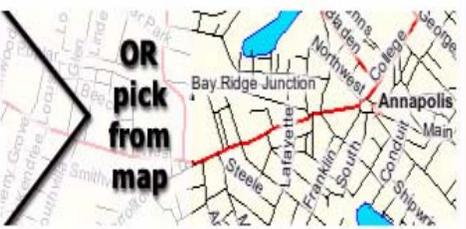
*State:

*County:

*X-Coordinate:

*Y-Coordinate:

*Coordinate Units:



*Ownership: Land Use:

*Location Description:

Land Owner Name/Address:

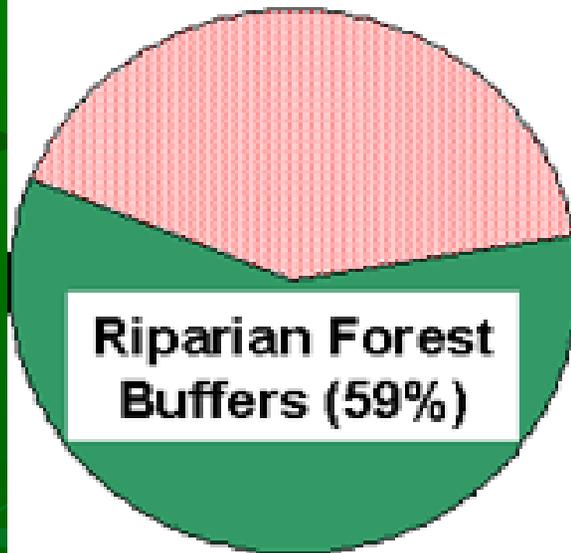
Project Size

*Buffer Length (feet): *Average Width (feet):

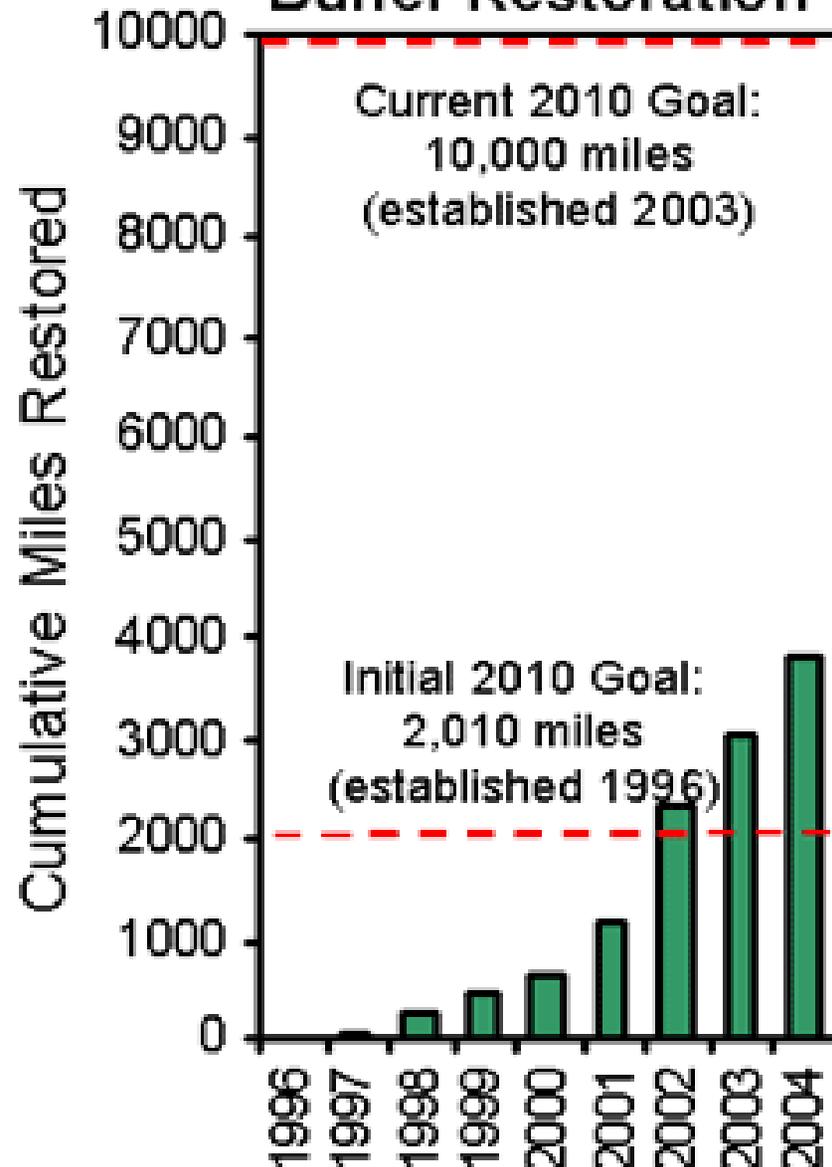
Tracking Progress Online

- Track miles, location, planting info, width and program used
- Online Project Registry

Status of Bay Basin Streambanks and Shorelines: 1990s



Riparian Forest Buffer Restoration



Advance Urban Watershed Health

- **Urban Canopy Enhancement Goal**
 - *Annapolis, Baltimore*
- **Chesapeake Bay Trust Urban Forestry Initiative (MD)**
 - *\$300,000/year*
- **Forest -friendly Development and Workshops (B4B)**
- **Watershed 263 – Schoolyard Greening Program**
- **UFORE-Hydro module testing**
 - *Work with NE Research and EPA on 7 watersheds*
- **Integration of trees in Air Quality and MD/DC SIP**

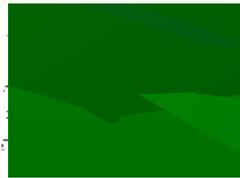


Urban Watershed Forestry Manual

- Part 1: Conserving forested watersheds
 - *planning and assessment*
- Part 2: Integrating trees
 - in stormwater practices
 - *innovative new practices*
- Part 3: Urban Tree Planting Guide

Partnership with NE Research, State Agencies, Center for Watershed Protection, and over 30 local organizations and agencies.





Unique border defines the space and prevents vehicle access for dumping



“It is time that we begin to see the Chesapeake Bay as a whole...an ecosystem whose forests, marshes and oysters are every bit as much a part of pollution control as sewage treatment plants, catalytic converters, and sediment fences.”

- Tom Horton, “Turning the Tide”

