



Webcast sponsored by EPA's Watershed Academy

# **Watershed Financing - Moving Beyond Grants**

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*In collaboration with the  
Environmental Finance Center  
University of Maryland*

# Welcome!

- \* This Webcast features watershed finance approaches – sources, instruments, and institutions -- that can help you and your partners build sustainable watershed organizations and implement watershed plans



## Why are we interested in watershed financing?

- ✳ In 2000, water quality inventories show that approximately 40% of streams, 45% of lakes, and 50% of estuaries assessed in the United States remain too polluted for fishing, swimming, and other uses
- ✳ There are not enough grants to fully fund watershed protection and restoration



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# Today's Webcast

- \* Introduction to Watershed Finance
  - \* Sources, instruments, and institutions
- \* Watershed Financing Process
  - \* Assess sources and institutional capacity; implement strategies
- \* Effective Watershed Financing Strategies
  - \* Key elements
- \* Watershed Finance Case Studies
  - \* Cacapon and Lost River Land Trust, WV
  - \* Montgomery County, MD



## Charge to group

- ✱ Think creatively about finance mechanisms and approaches you may not have previously considered
- ✱ Use these ideas to develop innovative funding strategies



# Introduction to Finance

# What is financing?



- \* Financing is an allocation process comprised of acquiring, investing, and managing fiscal resources
- \* Ultimate goal of financing is to maximize return on investment
- \* Financing helps us determine how we should go about accomplishing a goal. It is the how and the when, not the why

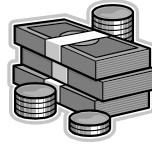
# Why finance?



- \* *Finance provides long-term solutions:*
  - There are not, have never been, and never will be enough grants – public or private – to fully fund watershed protection and restoration
  - Moves us from *funding* to *investing*
  
- \* *Effective financing results in efficiency:*
  - Maximize return on the community's investment



## Why finance? (cont.)



- \* *Finance is a community process:*
  - Multiple stakeholders, institutions, organizations, citizens
  - Requires the community to prioritize
  
- \* *Watershed financing mirrors the resource:*
  - Local problems resulting in local solutions

# Why financing?



**Financing is how  
things get done!**

# Core financing components



\* Revenue *sources*



\* Financing *instruments*



\* Financing *institutions*

## Financing components: revenue sources

*Financing is about MONEY!*

- \* Revenue source: payers of costs
- \* Ultimately, we are sources:
  - \* Taxpayers, ratepayers, consumers, businesses, investors



## Financing components: revenue sources (cont.)

### *Revenue sources are diverse*

- \* Appropriate revenue sources are determined by many factors: efficiency, sufficiency, equity, market behavior, community and political will
- \* Types of sources: taxes, fees, tolls, governments, foundations, organizations, marketplace, private **equity** (ownership) and wealth

## **Financing components: Instruments**

***The tools and programs necessary for  
allocating fiscal resources***

- \* Financing instruments connect sources to costs
- \* Effective financing instruments reduce costs, thereby maximizing return on investment

## **Financing components: Instruments (cont.)**

***Choice of instrument is  
determined by many factors***

- \* Efficiency
- \* Effectiveness
- \* Organizational structure
- \* Scale
- \* Community capacity and priorities



# Financing components: Instruments (cont.)

## *Debt*

- \* An obligation to pay or do something:  
loans, bonds
- \* Allows *leveraging* – annual or consistent  
revenue results in lump sum
- \* Why debt? *Taking action today is  
cheaper than taking action tomorrow*





# Financing components: Instruments (cont.)

## *Grants*

- \* Have served as the foundation for watershed restoration projects
- \* Excellent way to seed programs and projects
- \* Types: government (subsidies), private (foundations, corporations, individuals)
- \* Usually not a long-term solution



## Financing components: Instruments (cont.)

### *Market-based programs*

- \* Trading and offset programs
- \* Fiscal incentives (tax credits)
- \* Purchasing and transferring development rights
- \* Voluntary programs



## Financing components: Institutions

\* The organizations  
needed to implement  
the financing process



\* Critical component of  
community financing  
capacity

NGOs



# Financing components: Institutions

\* Local, state and federal governments



\* Utilities and authorities



\* Non-profits and NGOs



\* For-profit corporations and businesses



\* Private citizens



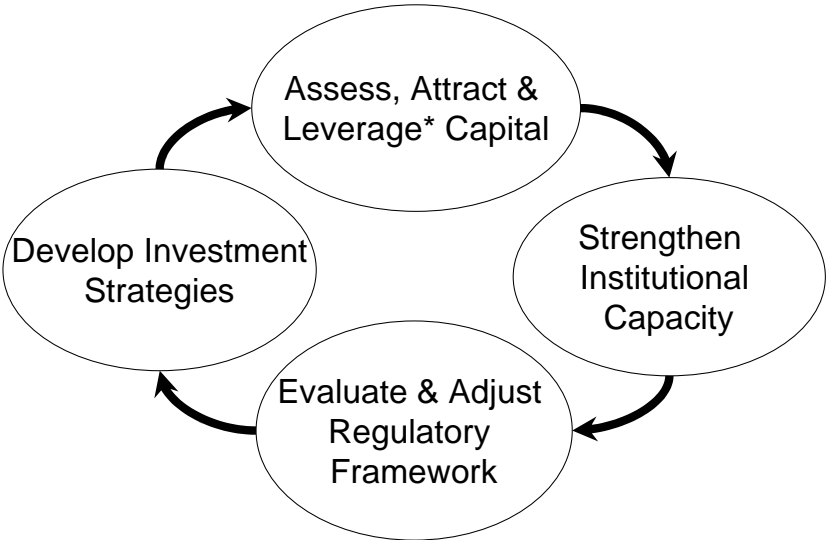
# Questions?



Dan Nees, World Resources Institute

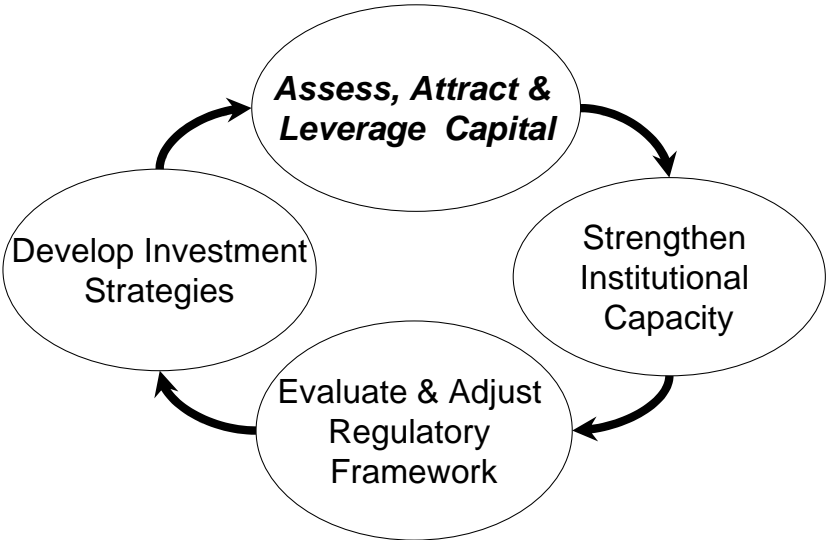
# Process of Financing Watershed Protection

# Watershed Financing Process



\***Leverage** = The degree to which an investor, business, or institution is utilizing borrowed money.

# Watershed Financing Process





## **Assess, attract & leverage capital**

### ***Key points on the process:***

- ✦ Analyze capacity to attract capital, which includes assessing existing revenue streams and sources
- ✦ Evaluate and recommend new revenue sources and capital approaches
- ✦ Consider and involve key players (city, county, state, etc.) in the financing process

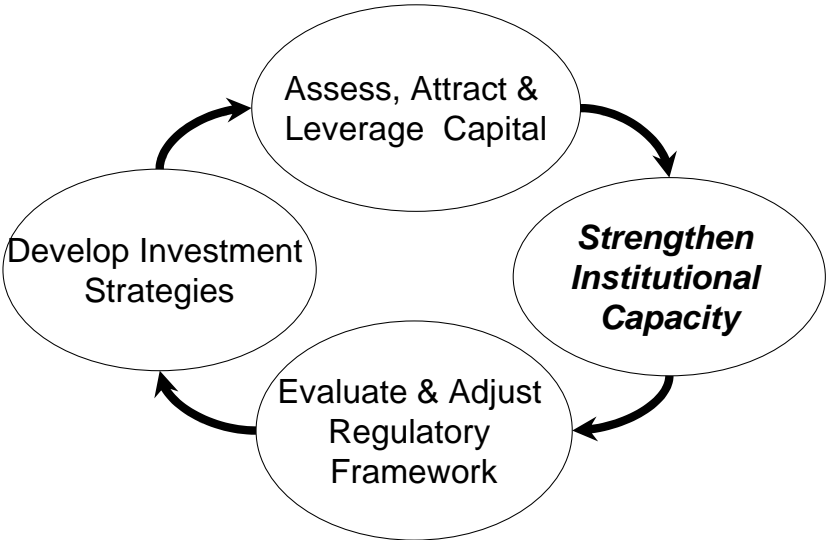
## **Assess, attract & leverage capital (cont.)**

***Key issues to consider:***



- \* Is current revenue capacity sufficient?
- \* What types of revenue sources are most appropriate? Public or private?
- \* What are the associated legal barriers?

# Watershed Financing Process



# Strengthen Institutional Capacity

## *Key points in the process:*

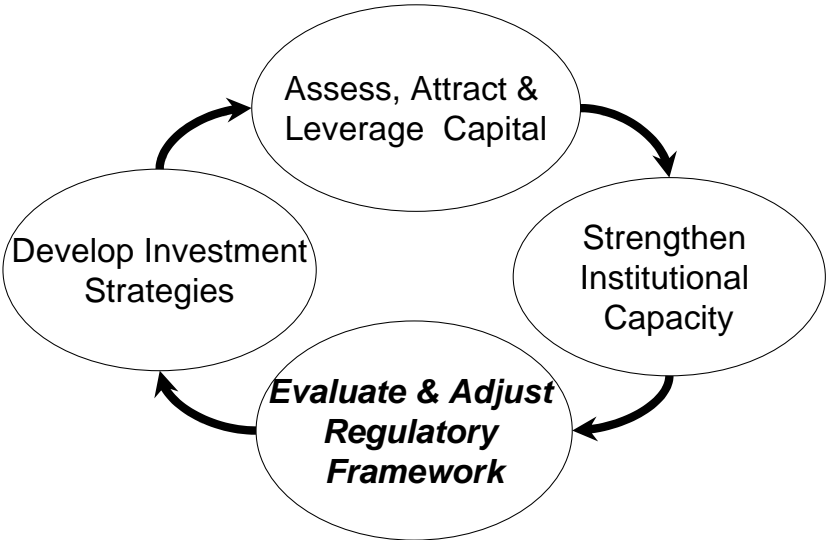
- \* Who has the financing obligation?
  - Public? (federal, state, local government)
  - Private? (businesses, citizens, consumers)
  
- \* Is the capacity in place to leverage and allocate fiscal resources?

## **Strengthen Institutional Capacity (cont.)**

### ***Key points in the process:***

- ✳ If institutional capacity is lacking, where do breakdowns occur?
  
- ✳ How can capacity be strengthened?
  - ✳ Are new institutions required?

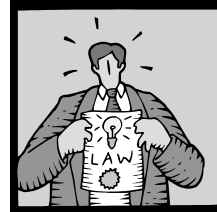
# Watershed Financing Process



# Evaluate & adjust regulatory framework

## *Why law and regulation?*

- \* They correct failures in the marketplace
- \* Reduce costs to the community by fostering innovation and compliance



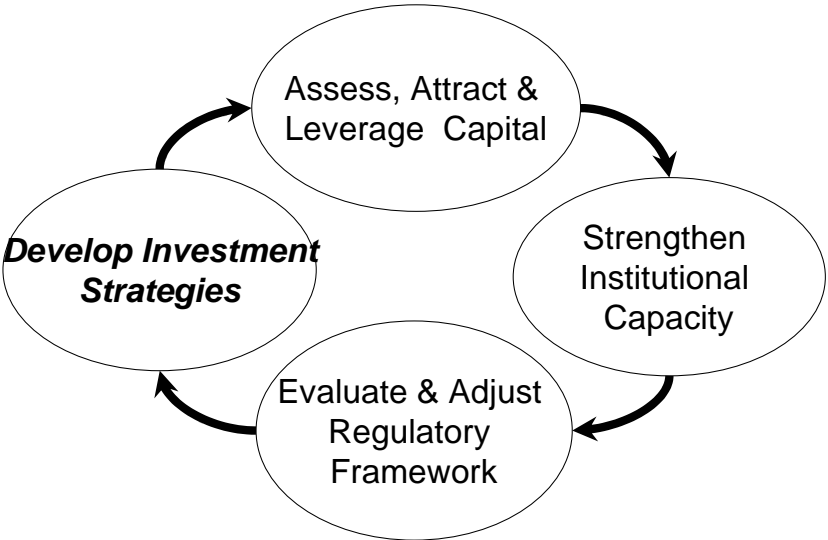
## **Evaluate & adjust regulatory framework (cont.)**

### ***Key issues/questions to consider:***

- \* Are regulations even necessary?
- \* Who has regulatory responsibility?
- \* Will regulations improve efficiency?
- \* Will regulations shift costs, and if so, to whom?



# Watershed Financing Process

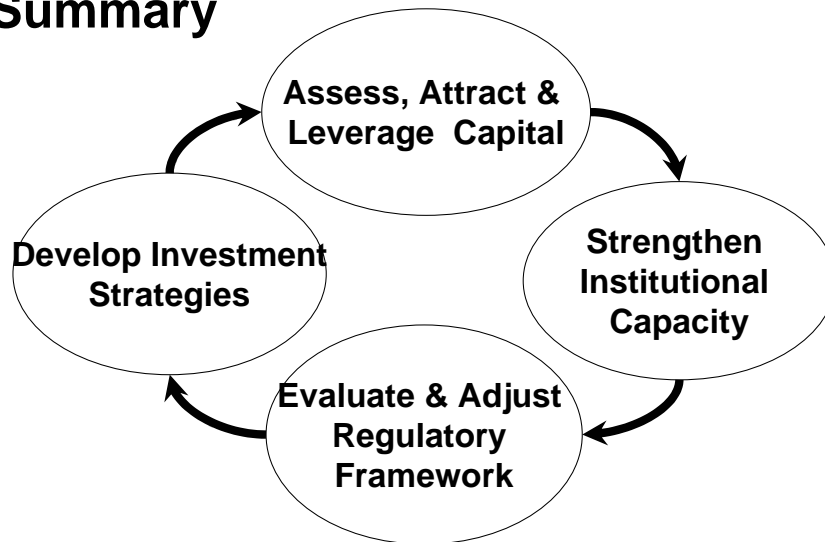


# Develop investment strategies

## *Key issues to consider:*

- \* Focus on performance, not programs
- \* Invest in future success: information, research, monitoring
- \* Invest in incentives
- \* Coordinate with other community programs and priorities

## **Watershed Financing Process: Summary**



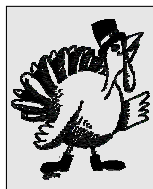
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# Questions?



Dan Nees, World Resources Institute

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November 28<sup>th</sup>, on...



## **Smart Growth**

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# Case Study Examples

## Characteristics of effective financing strategies

- \* Community-based, incorporating multiple stakeholder groups
- \* Integrated, combining a variety of sources, instruments, and institutions
- \* Mirror the watershed, incorporating multiple landowners (public and private), land uses and landscapes



## Two case studies

- \* Cacapon and Lost Rivers Land Trust,  
West Virginia: land protection strategy
- \* Montgomery County, Maryland:  
stormwater management



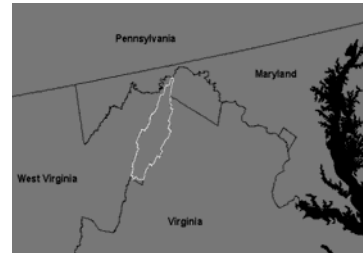
## Two case studies (cont.)

### ***Analysis criteria:***

- \* Developing revenue sources
- \* Establishing institutional capacity
- \* The role of regulations
- \* Key investment strategies

## **Cacapon and Lost Rivers Watershed, WV**

✿ The Cacapon and Lost Rivers are actually one river

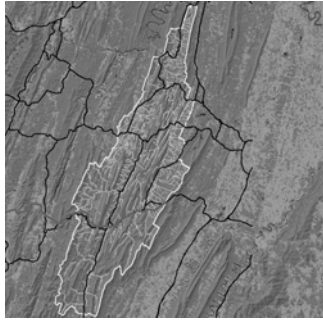


✿ 625 sq mile watershed

✿ Located in Hampshire, Hardy and Morgan counties in West Virginia

## **Cacapon and Lost Rivers Watershed (cont.)**

- \* Cacapon River suffers from fecal coliform contamination



- \* Development pressures from Washington, DC metropolitan area
- \* New highway, Corridor H, bisects the watershed

## Cacapon and Lost Rivers Land Trust: A strategic approach

- \* Established in 1995 to protect the watershed and the area's rural heritage
- \* 2002: Healing Waters event prioritized lands for protection
- \* 2005: Financing Charrette identified a financing strategy for land protection
- \* 2007: Strategic Planning Retreat laid out plan to improve organizational capacity, ensure sustainability, and implement Healing Waters conservation plan – **this costs \$\$\$**



## **Cacapon and Lost Rivers Land Trust: A strategic approach (cont.)**

- ✦ The Trust has set a goal of raising \$200,000 annually by 2010
  
- ✦ The associated financing strategy includes plans to:
  - ✦ Diversify funding sources
  - ✦ Consider cost-reducing measures
  - ✦ Identify sustainable revenue stream
  - ✦ Examine market-based opportunities
  - ✦ Effectively develop institutional relationships



## **Cacapon and Lost Rivers Land Trust: financing strategy (cont.)**

### **\* Diversifying funding sources**

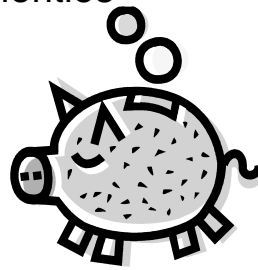
- Avoids quick gains and quick declines
- Organizational stability
- Sustainable income despite changes in government budgets, funders' priorities, or market conditions



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## **Cacapon and Lost Rivers Land Trust: financing strategy (cont.)**

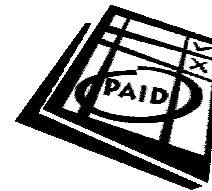
- ✳ Consider cost-reducing measures
  - ✳ Collaboration
  - ✳ Regulation
  - ✳ Leveraging community priorities



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## **Cacapon and Lost Rivers Land Trust: Financing Strategy** (cont.)

- ✳ Identify sustainable revenue streams
  - ☛ Camp tuition surcharges
  - ☛ Management and monitoring fees
  - ☛ Mitigation monies
  - ☛ Major donor campaign
  - ☛ State and federal funds





## **Cacapon and Lost Rivers Land Trust: financing strategy (cont.)**

- ✱ Examine market-based programs
  - ✱ Development rights program
  - ✱ Trade land programs
  - ✱ Tourism



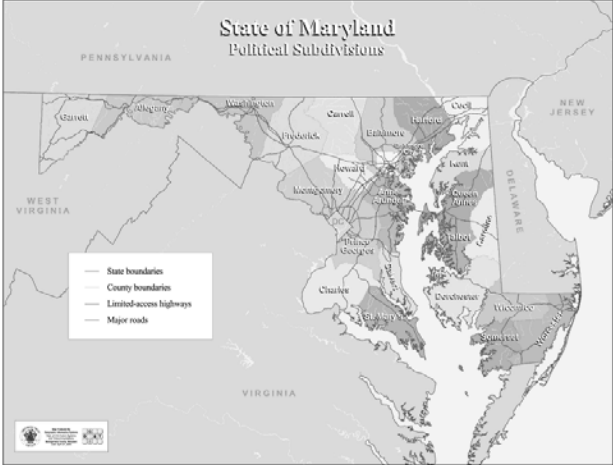
## Cacapon and Lost Rivers Land Trust: financing strategy (cont.)

- \* **Revenue:** diversifying to minimize changes in any one source of funds
- \* **Institutional capacity:** looking to improve internal capacity and develop mutually beneficial partnerships that fill institutional gaps
- \* **Regulatory framework:** working with regulatory agencies to coordinate agendas and establish Trust as go-to for mitigation and enforcement \$\$
- \* **Investment:** parcel-based land preservation that has been strategically prioritized

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# Montgomery County, MD Stormwater Utility

# Montgomery County, MD



## **Montgomery County, MD**

- ✱ Just north of Washington, DC
- ✱ Total population: almost 1 million (growing)
- ✱ Very affluent, very urban
- ✱ Lots of urban stormwater runoff

## **Stormwater utilities**

- ✱ Public enterprises developed to support urban stormwater programs
- ✱ Resulted from increased laws and restrictions: amendments to the Clean Water Act
- ✱ More than 500 stormwater utilities exist across the United States

## **Montgomery County, MD**

### ***Multiple program goals***

- ✱ Support required permit obligations
- ✱ Create efficiencies/reduce redundancies
- ✱ Establish and maintain fiscal capacity

## **Montgomery County, MD (cont.)**

### ***Revenue source***

- ✳ All county citizens and businesses (tax-exempt institutions are NOT exempt from fee)
- ✳ Revenue is collected as part of property tax bills



## Montgomery County, MD (cont.)

### ***Revenue source***

- \* Rate is based on equivalent dwelling unit (EDU)
- \* EDU: one average single family unit
- \* EDU in Montgomery County: 2,400 ft<sup>2</sup>
- \* Rate is established annually
- \* Current rate: \$25 per EDU

## **Montgomery County, MD (cont.)**

### ***Institutional structure***

- \* County established new institution to manage stormwater programs
- \* Created efficiency: reduced redundant County programs
- \* Program focuses on operations and maintenance of the system

## **Montgomery County, MD (cont.)**

### ***Regulatory framework***

- ✦ Stormwater is now regulated: NPDES permitting program
- ✦ Montgomery County is permitted under the Municipally Separate Storm Sewer System (MS4) program
- ✦ Phase 1 community (big)
- ✦ Enforced by the state

## Montgomery County, MD (cont.)

### *Investment strategy*

- \* Program pays for maintenance of stormwater facilities:
  - \* Inspection
  - \* Construction/reconstruction
  - \* Modifications
  
- \* Financing tools: program does NOT support debt financing (pay as you go)

## Montgomery County, MD (cont.)

\* **Revenue:** sustainable, dedicated

\* **Institutional capacity:** improved and expanded

\* **Regulatory framework:** foundation of the entire process

\* **Investment:** focus on maintenance

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## **Conclusions**

- ✱ Finance is the process for success
- ✱ Watershed financing requires the entire community to participate
- ✱ Finance is how things ultimately get done

## **For more information:**

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# Questions?

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