

# Financing Watershed Protection & Restoration

July 17, 2018



ENVIRONMENTAL  
FINANCE CENTER

# PROJECT REFRESHER: BACKGROUND

## **Intent**

- Proposal to NFWF to provide technical assistance to establish an equitable sharing of collaborative PRP costs.
- Explore how to generate revenue to support this effort.

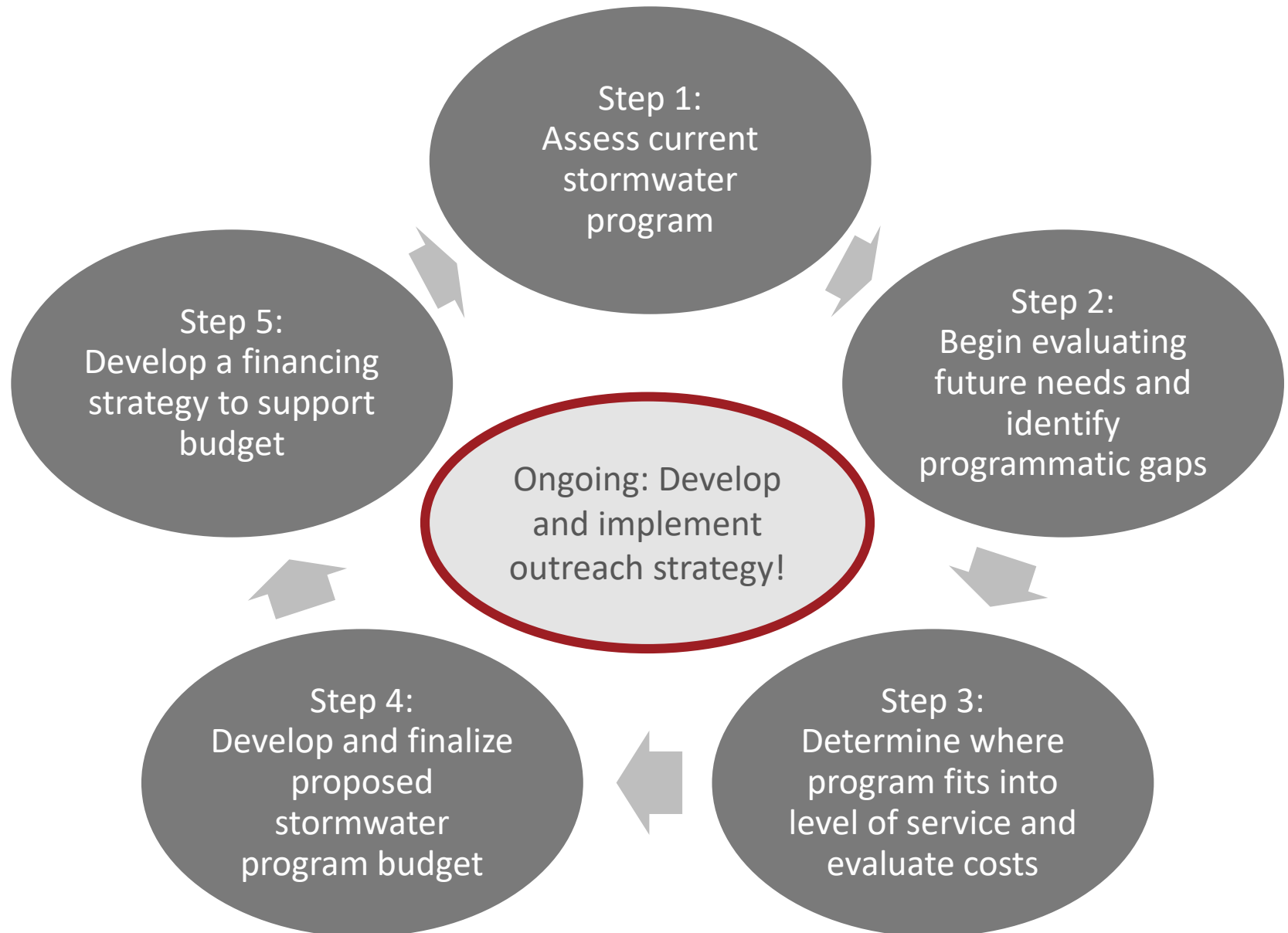
## **Reality**

- Communities pushed forward as NFWF grant review and awarding processes progressed.
- Collective gameplan was established before EFC engagement.

## **Adjustment**

- Revisited where collective needs remain given the progress made.
- Shared decision to pivot to considering how collaborative efforts might translate to shared O&M scenarios.

# STORMWATER PROGRAM FINANCE ANALYSIS AND DEVELOPMENT



# COMPONENTS OF A STORMWATER PROGRAM

- **Capital Improvements**
- **Operations and Maintenance**
- **Public Education and Involvement**
- **Technical Support**
- **Engineering and Planning**
- **Regulation and Enforcement**
- **Administration**
- **Billing and Finance**





# ORGANIZATIONAL & POLITICAL CHALLENGES

- **Responsibilities dispersed across broad group**
- **Large capital costs and evolving legislative & environmental landscape**
- **Science, water quality**
- **Need for better data and tracking**
- **Requires staff capacity and partnerships**
- **Need for stakeholder education & engagement**
- **Long term operations and maintenance**



# DEVELOP A FINANCING STRATEGY TO SUPPORT BUDGET NEEDS

## Identify appropriate funding for budget needs

### GENERAL FUND

- Staff
- Engineering
- Monitoring
- Asset management
- Training and technology

### GRANT

- Demo projects
- Initial SW mngt support

### Partnership

- Education and outreach
- GIS services
- BMP projects

### Fee System

- BMP projects
- Long-term SW mngt support
- O&M



# BMP OPERATIONS AND MAINTENANCE

## Operations

**Administration, management and non-maintenance activities necessary to keep BMP safe and functioning as planned**

- Examples: planning and conducting inspections (regular and after significant weather events); planning and scheduling maintenance; annual reporting; staff training

## Maintenance

**Ensuring that individual components and structures are achieving objectives in terms of safety and function**

- Examples: vegetation management; repair or replacement of failed components



**Use 1 – 7% of project costs to estimate O & M**

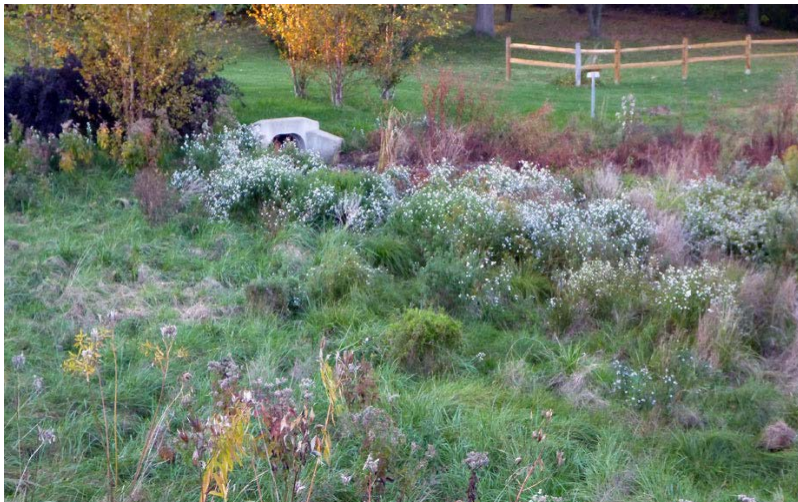
# LEBANON COUNTY PRP

## Stormwater Basin Retrofits

- If basins are mostly on private land, focus will be more on operations – ensuring inspections are completed and annual reporting information shared.

## Streambank Restoration

- Implementation, land ownership and O & M responsibilities maybe be on Consortium or shared with other entities.





# STORMWATER BASIN RETROFIT

**30 projects**

**Estimates range from \$12,000 to \$75,000**

- **Average = \$21,433**
- **Total = \$643,000**

**O & M Budget (1-7%)**

- **Per project (based on average) = \$214 to \$1500**
- **Total = \$6430 to \$45,000**



# STREAMBANK RESTORATION

**12 projects**

**Cost estimates ranging from \$255,000 to \$1,353,000**

- **Average = \$565,000**
- **Total = \$6,780,000**

**O & M Budget (1–7 %)**

- **Per project (based on average) = \$5,650 to \$39,550**
- **Total = \$67,800 to \$474,600**



# SAMPLE APPROACHES FOR BMP O & M ACTIVITIES

- **Project-by-project agreements**
- **Shared services agreement among interested municipalities**
- **Separate collaborative agreement among any interested municipalities**
- **Include O & M activities and costs in existing consortium structure**

# ADDITIONAL CONSIDERATIONS



- **Track current O & M costs – how are the existing BMPs being maintained? How much is it costing you?**
- **Add O & M costs into project estimates and RFPs – if municipality conducts O & M, it could be considered as match for grant applications plus**
- **Consider potential service providers for O & M – watershed organizations, conservation district, land trusts with stewardship programs**