#### SOUTH RIVER SEDIMENT MANAGEMENT AND RESTORATION PROJECT



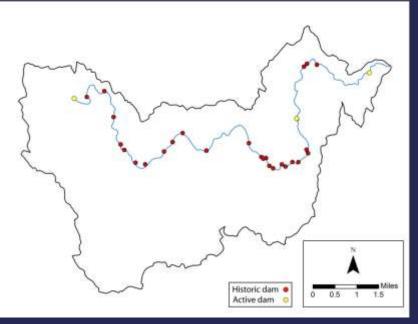






PRESENTATION TO THE FRANKLIN REGIONAL PLANNING BOARD DECEMBER 1, 2016

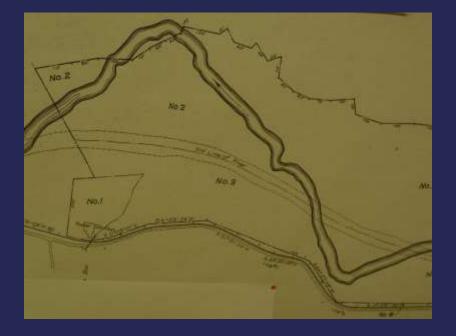
# The Legacy of Dams







# The Legacy of Channel Straightening and Berming





Images courtesy of the Conway Historical Society

# The Legacy of Channel Straightening and Berming

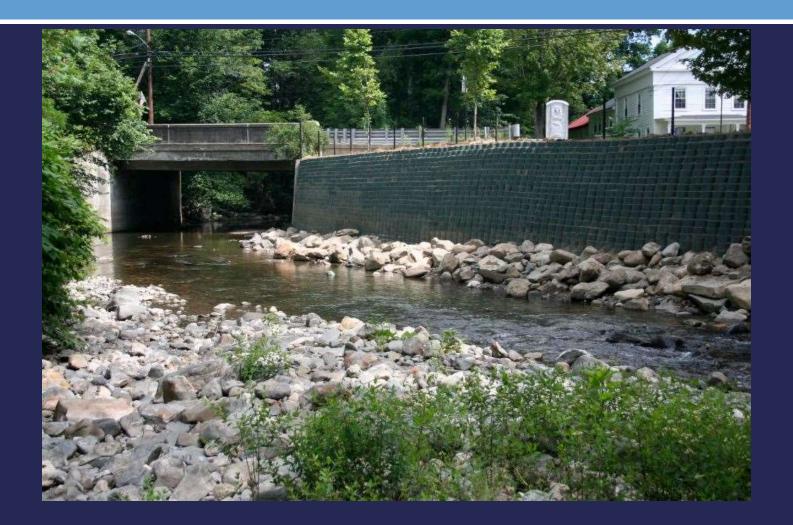


## The Results?





## The Results?



# The Results?





## Project Design



## **Potential Project Benefits**

- Project identified in previous Geomorphic & Habitat Assessment project.
  - Reduced flooding and erosion on Town's property as well as upstream and downstream
  - Reduced downstream sediment loading
  - Habitat improvements
  - Improved aesthetic/recreation resources
  - Leverage limited funding

# Permitting and Final Design Process

- Project funding from US EPA, MassDEP s.319 Nonpoint Pollution Competitive Grant Program and Town of Conway, Community Preservation Act fund.
- Long list of required permits/approvals.
   Natural Heritage & Endangered Species Program
   Conway Conservation Commission
   Landowner buy-in.

## Site Preparation





# Reconnecting the River to its Floodplain

ross section view	New floodplain	→ I	OHW (Bankfull)
V.E. = 1.6x Structure Excavation / New Floodpla	n		olw

# Floodplain Lowering



# Floodplain Lowering



## Floodplain Lowering

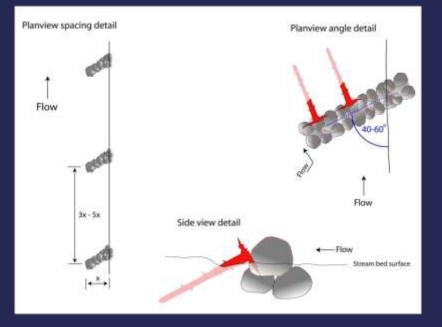




# Bank Stabilization and Habitat Improvement Structures

#### **Boulder Deflectors**

#### **Woody Materials**





## **Boulder Deflectors**





## **Boulder Deflectors**





# Woody Material





# Woody Material





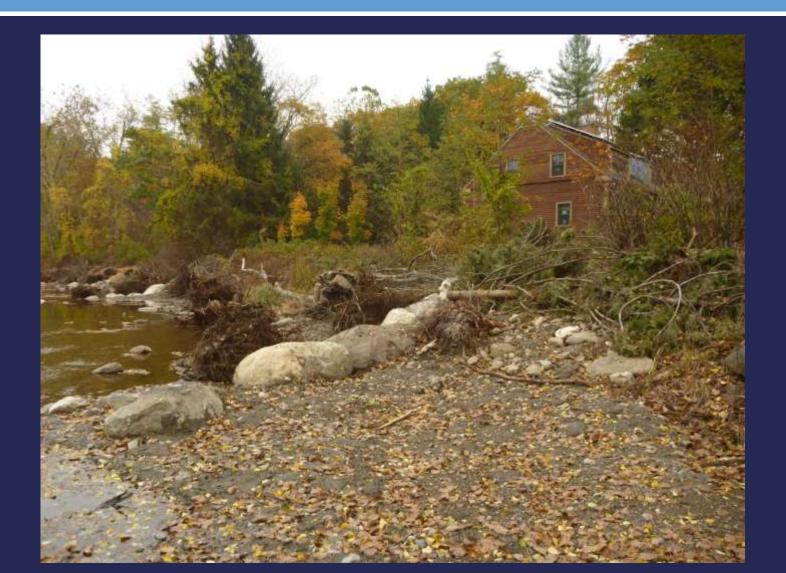
#### **Post-Construction**



#### **Post-Construction**



# Post-Construction Boulder Deflector and Woody Material



# Post-Construction: Boulder Deflectors

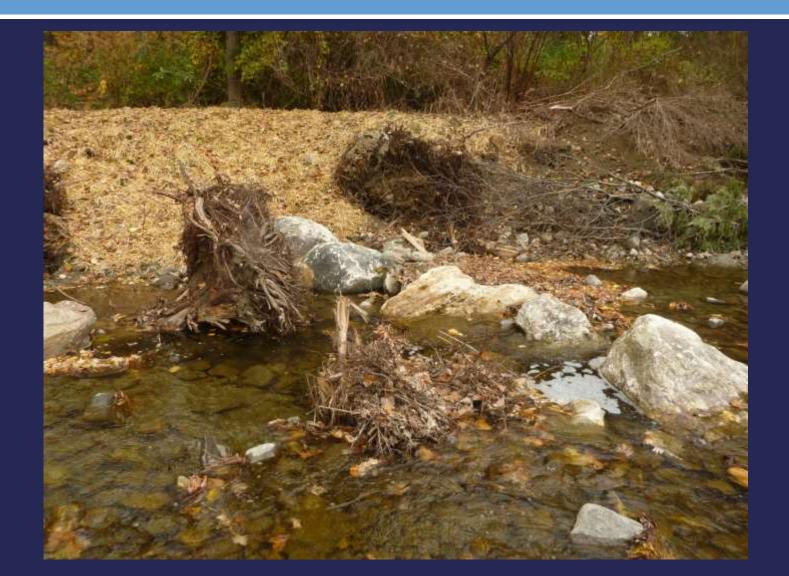
#### **Prior to rain event**

#### After rain event





# Post-Construction: Boulder Deflectors



Questions or Comments?