



New York: Susquehanna Watershed Riparian Buffer Enhancements

The Partners

Partners for this project include: Natural Resources Conservation Service (NRCS), US Forest Service Northeastern Area State and Private Forestry, New York State Department of Environmental Conservation (NYSDEC) Division of Forestry, Farm Service Agency (FSA), Upper Susquehanna Coalition (USC), United States Fish & Wildlife Service (USFWS), Northeast Brook Trout Joint Venture, and Trout Unlimited (TU).



The Project

The Upper Susquehanna and the Chemung rivers are the Chesapeake Bay's northern headwaters. Most of the watershed's excess nutrients and sediments come from agriculture, stream bank erosion, and construction. Installation of forest buffers along watercourses on land adjacent to and within 500 feet of a watercourse within the Chesapeake Bay watershed will directly improve water quality in the Susquehanna River as well as the Chesapeake Bay by reducing the amount of N, P, and sediment that runoff working lands. NY proposes to implement buffers along watercourses and address nutrient and sediment runoff concerns on land adjacent to and within 500 feet of a watercourse within the Chesapeake Bay watershed.



This effort will assist the state of New York in meeting its commitments documented in its Chesapeake Bay Watershed TMDL Watershed Implementation Plan, which identifies a need to install over 10,000 acres of forest buffers by 2025. Practices to benefit fish and wildlife will be incorporated where possible; however, the effort's top priority will be sites that would benefit from riparian forest buffers.



Core practices also include stream bank protection, tree and shrub establishment, early successional habitat development and management, forest stand improvement, stream habitat improvement, and filter strips.

The Benefits of Additional Resources

The Conservation Reserved Enhancement Program (CREP) has been the primary program used to install forest buffers in the Susquehanna Watershed. However, recent trends indicate declining interest in this program. In 2013, only 18 acres of land in the Susquehanna Watershed were enrolled in CREP. This is well below New York's annual goal of 475 acres of riparian forest buffers as documented in their Watershed Implementation Plan. Additional resources – especially in complementary incentive programs – are expected to increase acres of riparian forest buffers voluntarily installed on private lands.



New conservation practices including forested and non-forested riparian buffers will improve watershed health and wildlife habitat. Additional resources will increase acres of implemented conservation practices that increase soil cover, soil health, reduce erosion, stabilize water temperatures, reduce turbidity/improve clarity in streams, restore and enhance degraded riparian habitat, increase invertebrate diversity, improve fish passage, improve migratory bird habitat, stabilize banks, and reduce contributions to the EPA TMDL for NY including sediment in surface water and nutrients in surface and groundwater.

The Measure of Success

Additional miles and acres of new or enhanced riparian buffers in conjunction with other conservation practices designed to decrease nutrient and sediment losses from agricultural lands will lead to improved water quality in the Susquehanna River and its tributaries as well as the Chesapeake Bay. Success will be measured by water quality improvements as well as the ability of NY to meet buffer implementation targets and nutrient and sediment reduction levels established by its Chesapeake Bay Watershed TMDL Watershed Implementation Plan.