

# Sebasticook Lake Watershed Project Phase 1

#2002R-07

Waterbody Name: Sebasticook Lake  
Location: Newport – Penobscot County  
Waterbody Status: Impaired, NPS Priority Watershed  
Project Sponsor: Penobscot County SWCD  
Project Duration: March 2002 – January 2006  
319 Grant Amount: \$21,310  
Local Match: \$15,997



## PROBLEM:

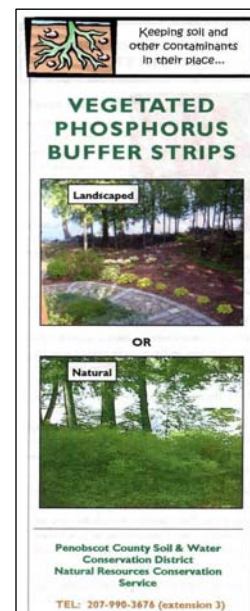
Sebasticook Lake is located 26 miles west of Bangor and lies entirely within the Town of Newport. The watershed encompasses 85 square miles and includes the communities of Corinna, Stetson, Exeter, Dexter, Saint Albans and Palmyra. Human development and agriculture comprise over 40% of watershed land use. The watershed contains nine other named lakes and ponds, two of which are public drinking supplies.

Twenty-seven years of monitoring data show that declining water quality has been an ongoing issue in Sebasticook Lake. Over the past 19 years, the Penobscot County SWCD and Natural Resources Conservation Service (NRCS) implemented several programs to address agricultural runoff. In 1985, the Maine DEP ranked Sebasticook Lake as one of the most seriously impaired lakes in Maine. In 1996 a State of Maine Water Quality Assessment Report classified the lake as Impaired. The TMDL assessment found agriculture and urbanization as the primary sources of phosphorous loading to the lake. A 1998 watershed survey and the 2001 TMDL assessment identified 96 NPS sites in the watershed.

## PROJECT DESCRIPTION:

The project's principal purpose was to install water quality best management practices (BMPs) to reduce soil erosion and polluted runoff at five high and medium impact NPS sites identified in the *Sebasticook Lake Watershed Inventory and BMP Recommendations Report* and the *Sebasticook Lake Watershed Survey*.

The project focused on fixing stream crossings draining directly into Alder Stream and Mulligan Stream, which are both tributaries to Sebasticook Lake. Culverts were installed and buffers stabilized on Hamstead Road. On two state road crossings with Alder Stream (Route 43 and Route 222), 100' berms were installed along with sediment basins and rock-lined outlets. Penobscot County SWCD and the NRCS also provided technical assistance to landowners, and the Penobscot County SWCD kept the community updated with press releases, newsletter articles and other educational materials.



## PROJECT OUTCOMES:

- The project installed BMPs to correct erosion problems at 5 priority sites. Over 300' of berms were installed to address direct entry points of NPS runoff into Sebasticook Lake tributaries.
- The project's total estimated pollutant load reduction was 13.8 tons of sediment per year (USEPA Region 5 Method).
- Outreach materials were created to update and educate area residents, and a table display was constructed for town meetings and the annual meeting of the Sebasticook Lake Association. The brochure, *Vegetated Phosphorus Buffer Strips*, was created in conjunction with the Sebasticook Lake Phase 2 project and mailed to local residents.
- The project was written to allow Phase 1 to be easily completed, encouraging all parties to become involved and active. Upon completion of Phase 1, all three major towns within the watershed were actively seeking to participate in the Phase 2 project.
- In recent years, water quality monitoring shows a decrease in phosphorus levels. In addition, algae blooms that originally occurred as early as the July 4<sup>th</sup>, now first appear in mid August.



## PROJECT PARTNERS:

Sebasticook Lake Association

USDA Natural Resources Conservation Service

Maine Department of Transportation

Town of Newport

Town of Corinna

## CONTACT INFORMATION:

Ken Libby, DEP – (207) 941-4056, [Ken.Libby@maine.gov](mailto:Ken.Libby@maine.gov)

Chris Brewer, Penobscot County SWCD – (207) 990-1782, [chris.brewer@penobscotswcd.org](mailto:chris.brewer@penobscotswcd.org)

Suggested Citation:

Maine Department of Environmental Protection (2007) "Nonpoint Source Management Program 2006 Annual Report," Document# DEPLW0836 2007. Augusta: MDEP.