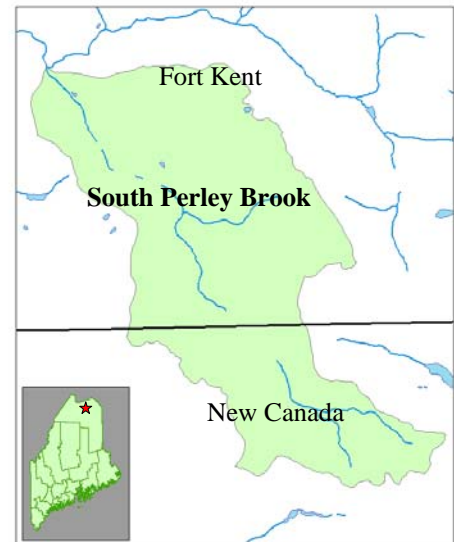


## South Perley Brook Restoration Project: BMP Implementation

#2001R-27A - WIFAP

Waterbody Name: South Perley Brook  
Location: Ft. Kent – Aroostook County  
Waterbody Status: NPS Priority Watershed  
Project Grantee : St. John Valley SWCD  
Project Duration: November 2001 - December 2004  
319 Grant Amount: \$54,000  
Local Match: \$36,000 (ME Dept. Ag.), \$68,463 (local)



### PROBLEM:

Perley Brook's water quality is presently threatened with nutrient loading from several agricultural fields and pastures, primarily due to run-off from both livestock and row crop activities. Approximately 52% of the watershed is estimated to be in agricultural production activities.

A survey of the major NPS sources, including agriculture and associated roads was conducted in the spring & summer of 2001. Five major landowners within the 2000+ acre watershed are producing potatoes with a grain rotation, and beef. The livestock have been allowed access to tributaries and other sensitive areas and there are inadequate manure storage facilities. In addition, the lack of winter cover on the potato ground can result in both soil and nutrient export.

### PROJECT DESCRIPTION:

Working with the Natural Resource Conservation Service, the St. John Valley SWCD contacted and worked with area landowners in designing site-specific erosion and nutrient control BMPs for six sites. As this project developed the District also worked with the Maine Dept. of Agriculture in assisting a landowner with a separate grant application. The District also worked to install additional BMPs as EQIP funds became available, freeing up 319 funds for other BMP work as well as a watershed survey of the remaining section of South Perley Brook.

The following BMPs were constructed: cattle exclusion fencing and alternative water sources, heavy use areas and manure/waste storage pits on two separate farms, dam outlet stabilized, culvert replacement and armoring/rip rap, and winter cover.



*Cattle access to stream*

## PROJECT OUTCOMES:

- Six significant NPS sites were treated with nine different BMPs.
- By tapping into Federal EQIP funding, the value of the project increased by \$22,795.
- A brochure entitled "South Perley Brook Water Quality Project" was produced and distributed.
- Load reduction estimates for four of the BMPs are 97.5 tons of sediment/year, 118.31 lbs/yr of phosphorus, 190 lbs/yr of nitrogen and 1,088 lbs/yr of chemical oxygen demand (COD).
- The project built momentum in the watershed and led to further BMP implementation in 319 project #2004R-23.



*Crop land erosion*



*Winter cover to reduce soil erosion*



*After fencing cattle out of stream, vegetation returned to stabilize the stream banks*

## PROJECT PARTNERS:

Natural Resource Conservation Service, St. John Valley Office.

Maine Department of Agriculture

## CONTACT INFORMATION:

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