



PROJECT PROFILE: INTEGRATED SOURCE WATER MANAGEMENT IN ALBERTA

ADDRESSING KNOWLEDGE GAPS IN FOREST MANAGEMENT

Towards Integrated Source Water Management in Alberta is a large multi-disciplinary project, focused on understanding the headwater processes (erosion, hydrology, ecology, etc.) and how these processes respond to wildfire and forestry.

PROJECT LEAD

University of Alberta

OVERVIEW

This project was part of a series of projects headed by Dr. Uldis Silins at the University of Alberta that makes up the Southern Rockies Watershed Project (SRWP).

The purpose of this project was to address knowledge gaps related to the impacts of forest management through harvesting on water and comparing these impacts to those associated with wildfires.

OUTCOMES

The Southern Rockies Watershed Project began in 2003 to describe the impacts of severe natural disturbance by wildfire on a broad range of headwaters, larger river basin scale, and downstream water resources (Phase I). This watershed research is unique in that trans-disciplinary linkages between hydrology, biogeochemistry, aquatic ecology, downstream river basin processes, implications for human water use, and economic implications are providing broad insights into wildfire effects on water.

Phase 2 focuses on evaluating the effects of several alternative forest harvesting practices on these same water resource 'values'. Collectively, this research is providing comprehensive information on watershed function after forest disturbance in Rocky Mountain watersheds.

THE ESN CONNECTION

This project documents the effects of severe wildfire in Rocky Mountain headwaters regions on a potentially broad range of important watershed functions, including hydrology, water quality, aquatic ecology, and downstream impacts at larger basin scales, including effects on provision of drinking water and drinking water treatment processes.

LEARN MORE

About the project at friresearch.ca.

About the ESN at ecoservicesnetwork.ca and follow us on Twitter, Facebook and LinkedIn