



PRAIRIE WATER

GLOBAL WATER FUTURES

Enhancing resilience of Prairie communities through sustainable water and watershed management

Prairie Water is a interdisciplinary program at the University of Saskatchewan funded by Global Water Futures.

The project includes over 25 natural and social scientists together with stakeholders to address pressing questions surrounding water and the environment in the Prairies. Our research questions are driven by the need for making more informed decisions about water.



Unprecedented environmental change

The Canadian Prairie is an intensively managed landscape, leading to competing demand for water (e.g., economic production, environment, society).

A need from stakeholders and rightsholders to better understand water resources in context of a changing climate and land management.

Strategic management requires approaches informed by natural and social sciences and guided by needs of water managers and users.



Finding solutions through 4 research themes:



HYDROLOGY

Develop an understanding of typified prairie watersheds to investigate impacts of climate and land use change.

Connect virtual models to those of water quality and biodiversity.



GROUNDWATER

Understand the interaction among surface water and shallow and deep groundwater.

Evaluate the vulnerability of deep reserves to increased demand.



WETLANDS

What wetlands must we keep to ensure provision of ecosystem service?

Evaluate how to optimize benefits provided by wetlands in agricultural landscapes while balancing costs to producers.



GOVERNANCE

Investigate how scientific information and personal / organizational values contributes to decision-making.

Understand how the academic and practical literature differ.

Co-develop ways of building governance frameworks.



PRAIRIE WATER

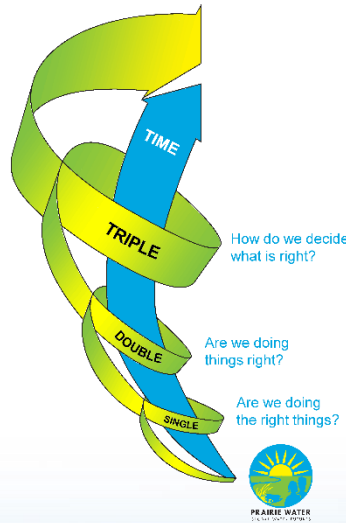
GLOBAL WATER FUTURES



Co-generating usable knowledge to create evidence-based tools for decision support

The Prairie Water project aims to develop:

- 1) Improve understanding and prediction of water processes, linkages, and regimes;
- 2) Connect wetland functions to ecological goods and services, from chemistry to policy;
- 3) Determine roles different segments of society play in policy processes; and
- 4) Co-develop knowledge & tools with partners to inform decisions and mobilize science.



Stakeholder focus

Our team is engaged in a continuous triple-loop learning process to co-produce **information and tools** with our user community for sustainable water management decisions. These tools are **solutions-oriented** to address current issues of water security.

We currently work with over 20 communities and organizations, representing agricultural sectors, watershed stewardship organizations, government, industry, and Indigenous communities.

Interested in getting involved? Connect with us to learn more about current open positions and collaboration opportunities.

Contact:

Jared Wolfe
Program Manager

Email: jared.wolfe@usask.ca
Phone: (306) 966-8639

Twitter: @Prairie_Water
www.gwf.usask.ca/prairiewater

