



More Info

Land Guardians from Tataskweyak Cree Nation are trained in sample collection and play a key role in environmental monitoring.

The first sampling took place in August 2024 at 10 sites across Split Lake, including rivers, bays, and lakes impacted by industrial activity.

Researchers collected water, sediment, and fish tissue to evaluate contaminants and ecosystem health.

The monitoring program will help identify changes over time and inform decisions to protect the land, water, and community health.



What Are We Doing?

The Tataskweyak Environmental Monitoring Agency (TEMA) is a community driven environmental monitoring initiative in the Split Lake region.

Guided by the knowledge of Tataskweyak Cree Nation, this work involves collecting samples (water, sediment, and fish) to assess the health of the environment following the harmful impacts of hydroelectric and mining operations, other industries and the effects climate change.

Researchers from the University of Manitoba are providing technical and logistical support to assist TEMA and Land Guardians in designing and carrying out this important work.

- For More Information on Our Work
- Visit the Tataskweyak Cree Nation website
- Contact the Environmental Conservation Lab at the University of Manitoba

Contact Information

eclinfo@umanitoba.ca (204)-474-9316



pitos poko ta-isi-
kanawāpahtamēk
"Looking outside the cup"



Sampling at TCN

Why Are We Doing it?

Environmental Factors

- Water temperature, flow, and quality are changing across Split Lake and surrounding rivers.
- Shifts in fish health and aquatic ecosystems can show broader ecological changes.

Human Causes

- Hydroelectric dams and mining operations have significantly altered natural water systems.
- Wastewater discharge and industrial activity continue to impact the lake's health.



Who We Are

Tataskweyak Environmental Monitoring Agency (TEMA) is a community-led organization committed to protecting the lands and waters of Tataskweyak Cree Nation.

Rooted in local knowledge and leadership, TEMA monitors environmental change, documents concerns raised by community members, and advocates for accountability from industry and government.

The University of Manitoba supports TEMA's work through research collaboration and technical assistance, helping to ensure that community priorities remain central to all scientific and monitoring efforts.

Climate Change Impacts

- Changing ice conditions are making winter travel more dangerous and unpredictable.
- Warmer temperatures are altering fish spawning cycles and migration routes.
- Shifts in seasonal weather patterns are impacting traditional harvesting schedules.
- Increased frequency of extreme weather events is affecting infrastructure and safety.
- Seasonal weather patterns are becoming more unpredictable, making it harder to plan land-based activities.



What We Have Done

During the first joint sampling trip in August 2024, Tataskweyak Cree Nation's Land Guardians led environmental data collection at locations around Split Lake.

In collaboration with University of Manitoba researchers, the team gathered water, sediment, and fish samples to assess current conditions. Sites included rivers, bays, and lake areas impacted by hydroelectric and mining activities.

These samples were sent to the University of Manitoba for heavy metal testing, including lead, nickel, selenium, cadmium, mercury, and arsenic.

This marked the start of a long-term effort to track environmental health and document industry impacts. Lessons from the first trip are now informing improved monitoring this year.