Arctic Salmon
Baffin Island Fieldwork Update Fall 2024

This year for the Arctic Salmon project we focused our Baffin Island fieldwork in Qikiqtarjuaq, supporting the DFO-led Baseline Program (Chris Lewis) from September 9-22nd, 2024. We assisted with their fieldwork, and with their support we were able to test new methods for monitoring salmon on Baffin Island.

Fieldwork Highlights:

- Temperature Loggers: We installed two temperature loggers in rivers that salmon could potentially travel upstream to spawn. The temperature loggers can stay in the river for up to 5 years, recording the temperature every hour. After a year has passed we hope to download the data off the loggers and see if the temperature is warm enough for salmon eggs to survive. This will give us a good idea of whether salmon could successfully spawn.
- Environmental DNA: We tested out a new method to collect fish DNA from the water, using small filters that stay in the water for up to 24 hours, collecting DNA from fish that could be floating in the water. These filters are collected and sent to a lab to analyze what species may be found. This is the first time we tried it in the ocean, they are usually used in rivers, but we will have results from Qik hopefully by next year.

We want to develop this as a tool to detect salmon in Nunavut rivers or coastlines in the future. We tried one filter for a few hours in the Sylvia Grinnell to see if the DNA pod would detect char. We plan to focus more at sites near Iqaluit next year using what we learned from this field program.

Installing a temperature logger in a river near Qik (left) and eDNA pods attached to a buoy (right)

ᖁᑭᖅᑖᓗᒻᒥ ᓯᓚᒥ ᐱᓕᕆᐊᖑᔪᒥᑦ ᑐᓴᖅᑎᑦᑎᓂᕐᒥᑦ ᐅᑭᐊᔅᓵᖓᓂ 2024

ᑕᒪᑐᒪᓂ ᐊᕐᕌᒍᒥᑦ ᐅᑭᐅᑕᖅᑐᒥᑦ ᓅᒥᓐᒧᑦ ᐱᓕᕆᐊᖑᔪᒥᑦ ᑐᕌᕐᓂᕐᑲᓚᐅᖅᑐᒍᑦ ᖁᑭᖅᑖᓗᒻᒥᑦ ᓯᓚᒥ ᐱᓕᕆᐊᖑᔪᒥᑦ ᖁᑭᖅᑕᕐᔪᐊᕐᒥᑦ, ᐃᑲᔪᖅᓯᐃᓂᕐᒥᑦ ᐃᒪᒻᒥᐅᑕᓕᕆᔨᒃᑯᓐᓄᑦ-ᐊᐅᓚᑕᐅᔪᒥᑦ ᑐᙵᕕᐅᔪᒥᑦ ᖃᐅᔨᓴᕐᓂᕐᒧᑦ ᐱᓕᕆᐊᔅᓴᒥᑦ (ᑯᕆᔅ ᔫᐃᔅ) ᓯᑎᐱᕆ 9-ᒥᑦ 22-ᒧᑦ, 2024-ᒥᑦ. ᐃᑲᔪᓚᐅᖅᑐᒍᑦ ᓯᓚᒥᑦ ᐱᓕᕆᐊᕆᔭᖏᓐᓂᒃ, ᐊᒻᒪᓗ ᐃᑲᔪᖅᓱᖅᑐᑎᒃ ᖃᐅᔨᓴᕈᓐᓇᓚᐅᖅᑐᒍᑦ ᓄᑖᓂᒃ ᐱᓕᕆᔾᔪᓯᕐᓂᒃ ᖃᐅᔨᓴᕐᓂᕐᒥᑦ ᓅᒥᓐᓂᒃ ᖁᑭᖅᑖᓗᒻᒥᑦ.

ᓯᓚᒥ ᐱᓕᕆᐊᖑᔪᓄᑦ ᑐᓴᕈᒥᓇᖅᑐᑦ:

- ᐆᓇᕐᓂᖓᓄᑦ ᓇᑐᓇᐃᓯᐃᓲᑦ: ᐋᖅᑭᑦᑎᓚᐅᖅᑐᒍᑦ ᒪᕐᕿᓐᓂᒃ ᐆᓇᕐᓂᖓᓄᑦ ᓇᑐᓇᐃᓯᐃᔾᔪᑎᓂᒃ ᑰᓐᓂᒃ ᓵᒥᓐ ᒪᔪᐊᖅᑲᑦᑕᖅᑲᔭᕐᓂᖏᓐᓂᒃ ᓯᕙᐃᔭᐃᓇᐊᖅᑐᕐᓗᑎᒃ. ᐆᓇᕐᓂᖓᓄᑦ ᓇᑐᓇᐃᓯᐃᓲᑦ ᑰᓐᓃᖅᑲᑦᑕᕈᓇᖅᑐᑦ ᐊᕐᕌᒍᓄᑦ ᑕᓪᓕᒪᓄᑦ, ᓂᐱᓕᐅᕐᓗᑎᒃ ᐆᓇᕐᓂᖓ ᐃᑲᕐᕋᒫᑦ. ᐊᕐᕌᒍᓕᒫᖅ ᐊᓂᒍᖅᓯᒪᓕᖅᑲᑦ ᒥᓇᕈᒪᔭᕗᑦ ᖃᐅᔨᓴᖅᑕᐅᔾᔪᑎᒥᓃᑦ ᓇᑐᓇᐃᓯᐃᔨᓂᑦ ᑕᑯᓗᑕᓗ ᐆᓇᕐᓂᖓ ᓈᒻᒪᒃᑲᓗᐊᕐᒪᖔᖅ ᓵᒥᓐ ᓯᕗᖏᑦ ᐆᒪᐃᓐᓇᕈᓐᓇᕐᒪᖔᑦ. ᑕᒪᓐᓇ ᓇᑐᓇᐃᑦᑎᐊᕐᔭᕐᖔᑦ ᐅᕙᑦᑎᓐᓄᑦ ᓵᒥᓐ ᓯᕙᐃᔭᐃᑦᑎᐊᕈᓐᓇᕐᒪᖔᑦ.
- ᐊᕙᑎᓕᕆᓂᕐᒧᑦ ᑭᓲᔾᔪᑎᖏᑦ: ᖃᐅᔨᓴᓚᐅᖅᑐᒍᑦ ᓄᑖᒥᑦ ᐱᓕᕆᔾᔪᓯᕐᒥᑦ ᓄᐊᑦᑎᓂᕐᒧᑦ ᐃᖅᑲᓗᐃᑦ ᑭᓲᔾᔪᑎᖏᓐᓂᒃ ᐃᒫᓂ, ᐊᑐᖅᑐᑕ ᒥᑭᔪᓂᑦ ᓄᐊᑦᑎᔾᔪᑎᓂᒃ ᐃᒫᓃᓰᓂᑦ 24-ᓄᑦ ᐃᑲᕐᕋᓄᑦ, ᓄᐊᑦᑎᓪᓗᑎᒃ ᑭᓲᔾᔪᑎᖏᓐᓂᒃ ᐃᖅᑲᓗᓐᓂᑦ ᐸᑦᑕᓖᖅᑐᓂᑦ ᐃᒫᓂ. ᑳᒃᑯᐊ ᓄᐊᑦᑎᔾᔪᑏᑦ ᓄᐊᑕᐅᓲᑦ ᐊᒻᒪᓗ ᑐᔫᑕᐅᓲᑦ ᖃᐅᔨᓴᕐᕕᒻᒧᑦ ᖃᐅᔨᓴᖅᑕᐅᑦᑎᐊᕐᓂᐊᕐᒪᑕ ᖃᓄᐃᑦᑐᓂᑦ ᐆᒪᔪᓂᑦ ᓇᓂᓯᒐᔭᕐᒪᖏᑦ. ᑕᒪᓐᓇ ᓯᕗᓪᓕᖅᐹᕆᔪᖅ ᑕᕆᐅᕐᒥᑦ ᐆᑦᑐᕐᓂᕆᔪᖅ, ᐊᑐᖅᑕᐅᒐᔪᓲᑦ ᑰᓐᓂᑦ, ᑭᓯᐊᓂ ᖃᐅᔨᓴᖅᑕᐅᔾᔪᑎᒥᓂᕐᓂᒃ ᖁᑭᖅᑕᕐᔪᐊᕐᒥᑦ ᐱᓯᒪᑦᑎᓖᖅᑐᒍᑦ ᐊᕐᕌᒎᓖᖅᑐᒥᑦ.

ᑕᒪᓐᓇ ᐱᕙᓪᓕᐊᓂᕆᒍᒪᔭᕗᑦ ᐃᑲᔫᑎᔅᓴᐅᓗᓂ ᖃᐅᔨᓴᕐᓂᕐᒥᑦ ᓄᓇᕗᑦ ᑰᖏᓐᓂᒃ ᐅᕝᕙᓘᓐᓃᑦ ᓯᔾᔭᖏᓐᓂᒃ ᓯᕗᓂᔅᓴᒥᑦ. ᓄᐊᑦᑎᔾᔪᑎᒥᑦ ᐊᑐᓚᐅᖅᑐᒍᑦ ᐊᒥᓲᖏᑦᑐᓄᑦ ᐃᑲᕐᕋᓄᑦ ᐃᖅᑲᓗᐃᑦ ᑰᖓᓂ ᖃᐅᔨᒐᓱᐊᖅᑐᑕ ᑭᓲᔾᔪᑎᖏᑦ ᓇᓗᓇᐃᕐᓯᔭᕐᒪᖔᑕ ᐃᖅᑲᓗᐃᑦ. ᐸᕐᓇᓯᒪᔪᒍᑦ ᑐᕌᕐᓂᖅᓴᐅᒍᒪᓪᓗᑕ ᐊᒥᓲᓂᖅᓴᓂᑦ ᐃᓂᐅᔪᓂᑦ ᐃᖅᑲᓗᐃᑦ ᖃᓂᒋᔭᖓᓂ ᐃᓕᓯᒪᔭᑦᑎᓐᓂᒃ ᐊᑐᕐᓗᑕ ᑖᔅᓯᒥᖓ ᐱᓕᕆᐊᕆᔭᑦᑎᓐᓂᒃ.

ᐃᓕᓯᓂᕐᒥᑦ ᐆᓇᕐᓂᖓᓄᑦ ᓇᑐᓇᐃᓯᐅᑎᓂᑦ ᑰᒻᒥᑦ ᖁᑭᖅᑕᕐᔪᐊᖅ ᖃᓂᒋᔭᖓᓂ (ᓴᐅᒥᖓᓂ) ᐊᒻᒪᓗ ᐊᕙᑎᓕᕆᓂᕐᒧᑦ ᑭᓲᔾᔪᑎᖏᓐᓂᒃ ᐊᑕᔪᑦ ᐸᑦᑕᓖᕈᑎᒧᑦ (ᑕᓕᖅᐱᖓᓂ)