

Robin Rigby Trust Mid-term Report
Project: Reimagining Catch Monitoring Methods for the Kitsoo Xai'xais Multi-Species
Community Based Fishery

Summary:

Practices of Nation led fisheries management persisted in what is now known as Canada until colonial governments criminalized Indigenous stewardship practices. In recognizing past wrongs and harm done to Indigenous peoples through federal fisheries policies, Canada recently committed itself to the Fisheries Resources Reconciliation Agreement. The agreement, signed by Canada and eight Nations in northern British Columbia, supports the establishment of novel community-based fisheries in each of the signatory Nations' territories and commits the parties to co-management of priority species. With the implementation of the novel community-based fishery in Kitsoo Xai'xais territory, a multi-species commercial catch monitoring program is needed to assess fishing pressure in relation to population abundance of priority species. With funding support from the Robin Rigby trust, we are designing and piloting the Kitsoo Xai'xais multi-species catch monitoring program, using landing and species composition surveys, to gather relevant harvest data to inform the Kitsoo Xai'xais Nation's fisheries management decisions. At this stage in the Master's timeline, we have developed the catch monitoring program and completed all field work. I am currently analyzing the remainder of the data and is drafting thesis chapter two. Over the next several months, I will continue analysis and writing, with an aim to defend by fall 2024.

Project background and objectives overview:

The Kitsoo Xai'xais (kit-AH-soo hay-hays) Nation has practiced stewardship over its land and waters since time immemorial. Longstanding principles of stewardship form the foundation of the Nation's legal tradition and continue to guide marine resource management decisions within their territory in the Central Coast of British Columbia. The Nation recently signed a historical agreement with the Government of Canada called the Fisheries Resources Reconciliation Agreement (FRRA), which supports the establishment of novel community-based fisheries and commits both parties to co-management of commercially fished species. The community-based fisheries established under the FRRA are a new distinct commercial fishery that are characterized by a unique set of flexibilities not available in conventional commercial fisheries within Canada.

As signatory to the FRRA, the Kitsoo Xai'xais Nation is looking to implement a community-based fishery that balances long-term resiliency of the marine environment with economic viability in a manner that embodies their principles of stewardship. With the implementation of the novel community-based fishery in Kitsoo Xai'xais territory, the Nation is interested in developing a rigorous monitoring program to assess commercial fishing pressure of targeted species and bycatch in relation to population abundance. No such Nation led monitoring program currently exists in the Central Coast for a commercial fishery, and with the implementation of the FRRA, the necessity of developing such a program is increasingly relevant.

The Kitsoo Xai'xais Nation invited the University of Victoria to partner with them to explore different catch monitoring models for their community-based fishery. The first objective

of this research is to understand past and present Kitasoo Xai'xais fisheries management and monitoring practices. With the knowledge gathered through objective one, the second research objective is to design and pilot the Kitasoo Xai'xais multi-species catch monitoring program.

Project mid-term progress to date:

The Master's project research methodology was co-developed by researchers at the University of Victoria and Kitasoo Xai'xais Nation staff and community members. We held meetings to identify Kitasoo Xai'xais priorities that would guide the work. We collectively decided on a research model that incorporated two sets of qualitative interview questions, complemented by the pilot of a mixed methods dockside catch monitoring survey. We collaboratively developed both sets of interview questions and dockside survey with Kitasoo Xai'xais Stewardship Authority staff, community members, and Nation leadership.

We carried out the first set of qualitative interviews in spring 2022 with local harvesters and Nation stewardship staff to understand past and present Kitasoo Xai'xais fisheries management practices. Themes that emerged from these interviews were used to develop the Nation's multi-species dockside interview methodology and mixed methods survey. The dockside catch monitoring program was piloted in the Nation's food, social, and ceremonial fishery during the summers of 2022 and 2023. Catch per unit effort information and qualitative fishing observations were gathered from local harvesters. The mixed methods catch monitoring surveys were complemented by the biological sampling of both groundfish and salmon. Season results and project updates were regularly communicated to harvesters and Nation staff members. The second set of qualitative interviews was carried out with local harvesters and fisheries managers in fall 2023. These interviews were aimed at understanding what went well and what could be improved in the multi-species monitoring program and findings were used to develop a community vision for scaling up the program to the community-based fishery level.

I am currently analyzing catch per unit effort harvesting data in R and Arc GIS. Both sets of qualitative interviews have been transcribed and were subsequently analyzed in NVIVO. I am currently summarizing interview findings in chapter two of the thesis.

Upcoming work:

Over the next month, I will continue to analyze the catch per unit effort data in R and Arc GIS using a kernel density estimation. I will continue drafting the thesis over the next several months, with an aim to defend by fall 2024. The thesis will be presented first to Kitasoo Xai'xais community members followed by the defense at the University of Victoria.

Policy work related to community-based fisheries monitoring is also ongoing at the government-to-government tables established through the FRRA. The findings from the Kitasoo Xai'xais multi-species monitoring program and community interviews will feed directly into the development of a regional monitoring framework that outlines how the community-based fisheries will be collaboratively monitored by the signatory Nations and Canada. The results of the Master's project are already supporting more effective and accessible fisheries monitoring practices at the

local and regional scales and I'm looking forward to finalizing the thesis to share the results more broadly.