

Elk River Watershed
Qukin ?amak?is
Collaborative Monitoring Program
Progress Report



Prepared by the Elk River Alliance
May 31, 2022



Table of Contents

<i>Introduction</i>	1
<i>Engaging Potential Partners</i>	2
<i>Hosting the Inaugural Forum</i>	2
<i>Establishing Governance and Monitoring Working Groups</i>	3
<i>Financial Resources</i>	4

Introduction

The Elk River Watershed Monitoring Collaborative (‘The Collaborative’) was launched by the Elk River Alliance on July 29, 2021 ([Press Release #1](#)) as an independent, long-term coordinated monitoring program for the Elk River watershed.

A month later, on September 5, 2021, Teck announced in a joint press release ([Press Release #2](#)) its support for the Elk River Alliance’s proposal to establish this Collaborative and join as the first contributing Partner. The Canadian Wildlife Federation followed Teck’s footsteps later that month, becoming the Collaborative’s second contributing Partner. On December 3, 2021, Collaborative Partners and interested parties across the Elk Valley assembled for the Collaborative’s Inaugural Forum and expressed their interest in working *collaboratively* to deliver the Elk River Watershed Collaborative Monitoring Program (‘The Program’).

Further discussions among Partners and watershed interests defined the *main goal* for the Program: to put in place *independent* and *credible* water monitoring activities that build a comprehensive understanding of the health of the Elk River system. In their own words, the Program is to ‘*feel for the pulse*’ of the Elk River mainstem and its tributaries, and to determine whether the Elk River system ‘*is in balance*’ and if ‘*things are getting better or worse*’.

Program objectives are:

Objective #1: Undertake monitoring activities to track both *short* and *long-term* changes in the Elk river system, in the *mainstem* and *tributaries*, from *source* to *mouth*.

Objective # 2: Assemble, manage and communicate existing and newly available monitoring data and monitoring information from multiple sources to make them easily available, accessible and usable by all watershed interests.

Engaging Potential Partners

Five *confirmed partners* joined the Collaborative over the last year: Teck Coal Limited, the Canadian Wildlife Federation, Living Lakes Canada, BC's Ministry of Environment and Climate Change Strategy and North Coal, along with the Elk River Alliance.

The Elk River Alliance reached out to a range of *potential partners* from First Nations, municipalities, not-for-profit organizations, other industry groups in the Elk Valley, and individual water and monitoring experts to determine their interest in joining the Collaborative. These outreach activities to *potential partners* involved email correspondences and one-on-one meetings with spokespersons to review benefits and obligations for Collaborative partners, including partner's participation in fundraising, informing strategic governance and monitoring design decisions, data sharing, knowledge sharing, and in implementing monitoring activities in the Elk Valley.

Hosting the Inaugural Forum

The Elk River Alliance assembled twenty-four individuals representing confirmed partners, potential partners and other interested parties for the Collaborative Inaugural Forum hosted on December 3, 2021. Participants expressed their interest in working with an *open heart* to ensure that the Program is built on the understanding that the Elk River watershed is *shared* with the Tobacco Plains Band and the Ktunaxa peoples.

The Inaugural Forum was covered by the Free Press ([Press Release #3](#)). Inaugural Forum participants engaged in roundtable discussions to highlight the broad environmental monitoring priorities for the Elk Valley ([Participants brainstorm](#)), their expectations for data sharing, data management and governance structure.



Establishing Governance and Monitoring Working Groups

Participants decided to form *two* working groups to develop the Collaborative structure and develop the monitoring program.

The first working group is led by George Greene, Chair of Elk River Alliance. The 'Interim Governance Working Group' will establish the on-going governance function and structure for the Collaborative, including its composition and decision-making approach. At its first meeting this group provided Partner and Valley interests' expectations on governance and provided input for the drafting of a proposed *Governance Model, Program Charter* and a terms of reference for a *Steering Committee*.

The second working group is led by Stella Swanson, Director of the Elk River Alliance. The 'Interim Monitoring Working Group' will advance the design of the Elk Valley monitoring program. A monitoring brainstorm session

provided feedback on a proposed step-by-step *Adaptive Management Framework* for monitoring to ensure that the developed monitoring program informs management decisions of decision-makers in the Elk Valley; and on a proposed step-by-step *Adaptive Monitoring Framework* to ensure that the developed monitoring program can adapt to evolving monitoring priorities, and the evolving needs for environmental monitoring in the Elk Valley. The Working Group will continue work in 2022 to prioritize monitoring questions and develop a monitoring program design that answers the *priority monitoring questions* with sufficient confidence over appropriate spatial and temporal scales.

Interim Governance Working Group

George Greene - Elk River Alliance
 Kyle Shottanana - Tobacco Plains
 Kyle Prince - Living Lakes Canada
 Ange Qualizza - City of Fernie
 Lana Miller/Patrick Williston - ENV
 Patty Vadnais - North Coal
 Joe Tress - Fernie Rod and Gun Club
 Paul Samyca - Elk River Guiding Company
 Summit Wannamaker - Youth Counselor
 Ian Sharpe - POLIS Water Sustainability Project

Interim Monitoring Working Group

Stella Swanson - Elk River Alliance
 Jason Gravelle - Tobacco Plains
 Cait Good - Teck Coal
 Paige Thurston - Living Lakes Canada
 Nick Lapointe - Canadian Wildlife Federation
 Dustin Haeusler - City of Fernie
 Jesse Huisman - District of Elkford
 Dwayne Minton - ENV
 Scott Hopkins-- Kootenay Fly Shop
 Ryan MacDonald - MacHydro
 Jon Bisset - Bisset & Associates
 Kelly Munkittrick - University of Calgary

Financial Resources

The financial resources for the Elk River Watershed Monitoring Collaborative are shown on page 10 of this report. Fundraising efforts are ongoing to help finance this Program over the next two to three (3) years, at a minimum, knowing that, ultimately, funds will need to be raised to run the program over ten (10) years. The funds being raised at the moment sum up to \$730,000. This includes *confirmed* contributions of \$230,000 coming in from Living Lakes Canada (\$30,000), the Canadian Wildlife Federation (\$35,000), and Teck Coal Limited (\$165,000). Fundraising efforts are *ongoing* at Living Lakes Canada and Elk River Alliance to secure an additional \$500,000 for long-term hydrological monitoring.

| Inaugural Forum |

December 3, 2021 from 9:00 - 15:00

Technical Advisors

Kelly Munkittrick, Research Chair in Ecosystem Health, **Uni of Calgary**
Mia Otto, Senior Aquatic Ecologist, **Lotic Environmental**
Mindi Sheer-Naylor, Consultant, **Sheer Ecology**
Ryan MacDonald, Consultant, **MacHydro**

Conservation NGOs

Kyle Prince, Program Manager, **Living Lakes Canada**
Santiago Botero, Applied Innovation & Technology Manager, **Living Lakes Canada**
Nick Lapointe, Senior Conservation Ecologist, **Canadian Wildlife Federation**
Richard Klafki, Rocky Mountains Program Director, **Nature Conservancy of Canada**

First Nations

Heidi Gravelle, Nasukin - chief, **Yaq̓it ʔa-knuq̓h̓ 'it** -Tobacco Plains
Kyle Shottanana, Councillor, **Yaq̓it ʔa-knuq̓h̓ 'it**, Tobacco Plains

Government

Dwayne Minton, Impact Assessment Biologist, **ENV**
Jeremy Krogh, Data Scientist, **ENV**
Jeremy Johnston, Director of Planning & Development Services, **District of Elkford**
Steve Fairbain, Councillor, **District of Elkford**
Kara Zandbergen, Flood Mitigation & Water Resources, **Regional District of East Kootenay**

Mining Industry

Carla Fraser, Regional Manager on Water Quality Monitoring, **Teck**
Katherine Gizikoff, General Manager on Environment & Social Responsibility, **Teck**
Patty Vadnais, Manager Social Responsibility & External Relations, **North Coal**
Dave Baines, Manager Environment and Engagement, **NWP Coal**

Fly Fishing Outfitters

Andres Gonzales, **Andres Fly Fishing**
Paul Samycia, **Elk River Guiding Company**
Joe Tress, Fisheries Director, **Fernie Rod and Gun Club**
Scott Hopkins, Owner, **Kootenay Fly Shop**
John Clarkson, **Elk River Outfitters Coalition**

| Year Two Work Plan |

February 1, 2022 - January 31, 2023

1. Program Management

- Establish the Program's budget and detailed work plan, and track progress towards meeting milestones and towards spending the available funds.
- Report on Program results.
- Coordinate Program activities with all implementation partners.
- Provide secretariat support to Partners, the Interim Monitoring Working Group and the Interim Governance Working Group.

2. Public Communications and Outreach

- Ensure the Elk Valley community is informed on the monitoring priorities, the monitoring questions proposed, the monitoring program design, and the proposed roll-out to implement these monitoring activities, so that the community, including First Nations, is able to give its input and feedback to design and on-going implementation of the Monitoring Program.
- Draft the Collaborative communications plan.
- Host Annual Forum of watershed interest and interested parties.

3. Building the Partnerships for the Collaborative

- Engage in one-to-one dialogues with prospective partners, including Tobacco Plains Band, municipalities and river user groups to develop further agreements (i.e. Letters of Understanding or Agreements) for Partners to enter the Program.
- Secure financial and in-kind resources for the Program from Partners and other interested parties.

4. Building Resources for the Program

Develop and implement a fund-raising plan for the Collaborative Monitoring Program to diversify funding sources and put in place a

| Year Two Work Plan |

February 1, 2022 - January 31, 2023

sustainable resource base for program implementation. Elements of the plan include:

- Financial resources directly raised for allocation to Collaborative activities and monitoring implementation by Partners. Potential new sources of funding include private foundations, provincial and federal government programs, and companies in other industry sectors
- Financial, human and/or technical resources made available by Partners for the to undertake monitoring and data sharing activities.

5. Interim Governance Working Group

- Develop a Charter to direct the work of the Elk Valley Water Collaborative Monitoring Program, including the principles for governance and program implementation;
- Develop Terms of Reference for an ‘ongoing governance body’ including its composition, its decision-making approach and the nature of decisions submitted to this body.
- Launch formal Steering Committee with composition from a balanced set of interests.

6. Interim Monitoring Working Group to Design the *Cumulative Effects Monitoring Program*

- Establish an overarching ‘*adaptive management framework*’ to ensure that the monitoring data collected by the Program informs the decision-making of communities and organizations, and an ‘*adaptive monitoring framework*’ to ensure the Program evolves iteratively as new information emerges and monitoring questions change.
- Draft Terms of reference for an interest-based and expert-based ‘ongoing monitoring working group’, including membership, objectives, and scope of work, and the nature of decisions to be taken by such a group.
- Shortlist and phrase powerful monitoring questions to address

| Year Two Work Plan |

February 1, 2022 - January 31, 2023

monitoring priorities that can be developed into a comprehensive and successful monitoring program.

- Provide advice and assign responsibilities for data management & data assessment of existing historical data to partly start answering the monitoring question developed above.
- Develop design for a comprehensive monitoring program that will answer the priority monitoring questions with sufficient confidence over appropriate spatial and temporal scales
- Scope the additional monitoring work required in the watershed to answer the monitoring questions developed above, including cost estimates

7. **Partnership with Living Lakes Canada to develop the *Columbia Basin Water Hub* as the *Primary Data Repository* for the Program**

- Establish the Terms of References in partnership with Living Lakes Canada for using the Columbia Basin Water Hub as the 'primary data repository' for the Elk River Watershed Monitoring Collaborative.
- Encourage Partners' willingness to upload data to this Hub.
- Develop a Data Management Plan and Data Assessment Plan for the Program.

| Year Two Work Plan |

February 1, 2022 - January 31, 2023

8. Partnership with Living Lakes Canada to Develop the *Elk Valley Hydrological Pilot Monitoring Program*

- Carry out Living Lakes' 8 step-by-step designing approach to drafting the Elk Valley hydrological monitoring program according to Living Lakes' Columbia Basin Water Monitoring Collaborative Framework (Carver & Utzig, 2021). This methodology was designed in consultation with senior hydrologists, and is intended to guide setting monitoring priorities within a scientific framework while also addressing community needs and concerns.
- Determine responsibilities and cost estimates for each organization acting as an implementation partner.
- Ensure implementation partners start installing and start operating monitoring stations for the hydrological monitoring network.

| Building the Program's Financial Resources |

Funding Source	Building Collaborative (Year 1 - 2021)	Designing Monitoring Programs (Year 2 - 2022)	Implementing Pilot Monitoring Programs (Year 2 - 2022) (Year 3 - 2023)	Sum Funds
Teck Coal	\$55,000	\$55,000	\$55,000	\$165,000
Living Lakes Canada		\$30,000	\$500,000 <i>(to be confirmed)</i> ¹	\$530,000
BC ENV		<i>(to be confirmed)</i> ²		
Canadian Wildlife Federation			\$35,000	\$35,000
Sum funds	\$55,000	\$85,000	\$590,000	\$730,000

¹ Living Lakes Canada is still doing fundraising to collect the \$500,000 to help finance the Elk Valley long-term hydrological monitoring program. This program is led by Living Lakes Canada for the Elk River Watershed Monitoring Collaborative, with Living Lakes Canada acting as the *main implementation partner*, and the Elk River Alliance acting as a *secondary implementation partner*.

² Funding from BC Ministry of Environment and Climate Change Strategy to be discussed.