

*Communication Plan for the
Nechako White Sturgeon Recovery Initiative
2010/11 to 2014/15*



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EXECUTIVE SUMMARY

This Communication Plan has been driven by desired outcomes (changes) that need to occur in order to move forward towards the successful recovery of the Nechako white sturgeon population. It provides the Nechako White Sturgeon Recovery Initiative (NWSRI) not only a list of communication projects, but also a step by step process or 'recipe book' that members of NWSRI can use on their own to successfully plan and facilitate incremental change. It has been designed to ensure effort and funding are purposeful and are focused in the right place at the right time.

Interested members of the Community Working Group (CWG) and Technical Working Group (TWG) participated in 2 workshops to collaboratively develop this plan. Using a logic model framework, the CWG built a map (or plan) that captures all the desired long term environmental outcomes necessary for sturgeon recovery. The logic model (plan), prioritized behavior changes (identified by the CWG) and various other information/criteria, were all used to generate the Communication Project list.

Projects were assigned a numerical score and were then assessed for priority, relative to each other. The resultant prioritized list provides shelf-ready projects that can be rationalized, mobilized and implemented as funding becomes available. In addition, suggested 'key messaging' for the various target audiences has been included.

Some of the priority projects to be implemented as soon as possible include:

- Completion of NWSRI Annual Report and Annual Newsletter
- Development of annual 'schedule of opportunities' for CWG and/or TWG members to attend to deliver sturgeon information, updates and targeted messaging
- Development of a 'start of season' and 'end of season' update paragraph/article for submission to local community newsletters and newspapers
- Establishment of a NWSRI Facebook site
- Inform target audiences of habitat restoration project (placement of gravel) in Nechako River
- Establish a NWSRI Compensation Program for damaged gill nets
- Development of various versions of 'Sturgeon Quick Facts' (Audiences: First Nations, general, government)
- Design and delivery of a 'Riverside Session/Assembly' for First Nation fisher families and community leaders
- Development of various tools and prompts to provide to First Nation fisher families to help increase their knowledge and skills and to remove barriers associated with the live release of sturgeon bycatch in gill nets (e.g. video of 'How to release a sturgeon from a gill net', Sturgeon Boat Kit, and various 'reminder' prompts so that they are 'ready to release a sturgeon')
- Collaboratively designing a community event (e.g. River and Fish Festival) to be held in each First Nation community

There will undoubtedly be new communication projects identified annually due to TWG research findings and/or restoration projects, or funding & partnership opportunities. As such, it is very important that the chairs of the TWG and CWG communicate frequently and in a timely manner to ensure that any new communication/outreach projects are identified as soon as possible. The CWG can then evaluate the current priorities in the Communication Plan and make an informed decision regarding the incorporation and prioritization of new communication projects/activities/products. The format of this plan is flexible, in that a new row can be inserted into Table 1 (Recommended Communication Projects for NWSRI) and the rationale, background, and desired outcomes can be captured and the priority of a new project can be incorporated.

This document does not provide the details of how to implement each project. To assist with the planning, design and implementation of a communication project, a template has been prepared (Outline for Communication Project Design and Evaluation). ***To ensure the success of each project, CWG members and/or consultants must ensure diligence in using this template to guide the details of project design (e.g. purpose, outcomes, audience, scope, research, budget and evaluation).***

The logic model framework complete by the CWG to guide sturgeon recovery can be used as a visual representation to potential partners or funding sources to rationalize why a project is integral to the short and long term success of the NWSRI. The linear layout style helps to show why one project should occur before another and also shows how priority projects are purposeful building blocks and will eventually lead to desired behaviour changes and desired environmental conditions.

In the upcoming years, as NWSRI focuses efforts to purposefully facilitate change and achieve desired outcomes, the NWSRI will see incremental changes that move the NWSRI closer towards the successful recovery of the Nechako white sturgeon population.

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The following members of the Nechako White Sturgeon Recovery Initiative were integral in the development of the communication plan. Everyone willingly shared their knowledge and experiences, asked the hard questions, shared perspectives and provided pertinent background information. Many conversations took place regarding what has been done, where things are at and where the NWSRI needs to go. The high level of participation in the two workshops designed to gather input and provide guidance to this communication plan, and the thoughtful comments and contributions to drafts of the plan are evidence of the passion and commitment that persons involved in this project have around the recovery of the Nechako White Sturgeon population. *Together we will succeed.*

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CONTENTS

Executive Summary	2
Acknowledgements	4
1.0 Introduction	7
1.1 Brief Background – Nechako White Sturgeon Recovery Initiative	7
1.2 Background to development of Communication Plan	7
1.2.1 - Goals	7
1.2.2 - Workshops: Gathering input from CWG & TWG	8
1.2.3 - Design Principles.....	8
1.2.4 - Summary.....	10
2.0 Recommended ‘key messaging’ for current target audiences	11
3.0 Recommended communication projects for NWSRI	13
3.1 – Incorporation of New Projects:.....	13
3.2 – Table 1: List of Recommended Communication Projects for NWSRI.....	13
4.0 Project design, evaluation planning, implementation, and end of project evaluation	33
5.0 Annual Review of communication/outreach projects and Update of communication plan	34
5.1 Review of Summary and Evaluation of each Communication Project.....	34
5.2 Review and update of Logic Model (Appendix 3) and Key Messaging (Section 2.0)	34
5.3 Review of what is ‘new’ for upcoming fiscal year	34
5.4 Review and update of Recommended Communication Projects	35
6.0 Looking ahead – Applying for upcoming fiscal funding	35
7.0 References	36
Appendix 1 - Mandate of CWG.....	37
Appendix 2 – Flow Chart of White Sturgeon Life Cycle and Priority Areas for Activity	38
Appendix 3 – NWSRI Logic Model (January 2009: Community Working Group).....	39
TABLE 2 - Summary of ‘Desired Environmental Conditions’ and ‘Desired Behaviour Changes’ Identified by CWG	42
Assessment Exercise.....	44

Table 3 - Prioritization of Behaviour Changes & Issues Important to CWG.....	46
Appendix 4 – Information Used to guide the identification and assessment of priority of communication projects	47
1 - Federal Recovery Plan for White Sturgeon (Table 4)	47
2 - Provincial Recovery Plan for Nechako White Sturgeon	48
3 - Priority Behaviour Changes as Identified by the Community Working Group (Table 5)	49
4 - Current TWG Priorities	50
5 - Carrier Sekani Tribal Council - Harm reduction projects	50
6 - Concepts of community-based social marketing and Audience research.....	51
7 - Existing activity/product, existing partnerships, potential for new partnerships, and opportunities.....	52
Appendix 5 – Outline for Communication Project Design and Evaluation	53
Appendix 6 – Rationale for Assignment of ‘Score’ to projects (Table 6)	57
Appendix 7 - Understanding your Audience (Social Science Research)	65
Appendix 8 – Tools of Behaviour Change	67
Knowledge Tools:.....	67
Social Tools:	69
Appendix 9 – List of Suggested Communication Principles (Table 7)	71

1.0 INTRODUCTION

1.1 BRIEF BACKGROUND – NECHAKO WHITE STURGEON RECOVERY INITIATIVE

An intensive five year study completed in 1999 of white sturgeon in the Nechako River concluded the population was in a critical state of decline. In 2006, the population of white sturgeon in the Nechako watershed was officially designated as Endangered under the federal Species at Risk Act (SARA).

The Nechako White Sturgeon Recovery Initiative (NWSRI) was formed in 2000 and is comprised of a diverse, dedicated group that has been working as a team on recovery planning efforts for the Nechako white sturgeon population. For the past nine years, the NWSRI has successfully facilitated the coordination and collaboration of stakeholders and First Nations in recovery efforts. The Technical Working Group (TWG)¹ and the Community Working Group (CWG)² strive to ensure that efforts and projects are balanced with not only technical soundness, but also timely, meaningful engagement/involvement/participation of First Nations, the public, and stakeholders.

Please see the NWSRI website for the most up-to-date list of active participants, information on the recovery initiative and accomplishments to date.

<http://www.nechakowhitesturgeon.org/sturgeon/>

1.2 BACKGROUND TO DEVELOPMENT OF COMMUNICATION PLAN

1.2.1 - GOALS

It is imperative that the effort and funds of the CWG related to communication and outreach activities and products are put towards the right project at the right time. This is an ongoing, dynamic process that requires proactive and purposeful planning from members of the NWSRI. In addition, the timing and implementation of these activities should complement the short, medium and long term efforts and activities of the TWG.

As such, the goals of the Communication Plan are to:

- Ensure target audiences are knowledgeable and updated on the health and status of the Nechako white sturgeon population,
- Provide a purposeful list of communication/outreach projects that will help the CWG lead different groups (audiences) through targeted behaviour changes that must be achieved in order to move towards recovery of Nechako White Sturgeon population,
- Prioritizes the order that projects should be completed,
- Provide members of the NWSRI team with the necessary knowledge, tools and templates to design, implement and evaluate (themselves or through contract) projects that are effective and set up for success, and
- Enable the NWSRI team to annually update the Communication Plan

¹ Formerly referred to as the Recovery Team (RT) in the provincial Recovery Plan for Nechako White Sturgeon.

² Formerly referred to as the Action Planning Group (APG) in the provincial Recovery Plan for Nechako White Sturgeon.

1.2.2 - WORKSHOPS: GATHERING INPUT FROM CWG & TWG

Prior to creating a list of communication projects, the CWG group took time to step back and identify as a group, where it is going, how it is going to get there, and what the most important things are to focus on first. This was accomplished through two 1 day, collaborative, inclusive workshops held in Vanderhoof on November 17, 2009 and January 12, 2010.

During the first workshop, the mandate of the CWG was reviewed (Appendix 1). The participants were then introduced to a proposed strategic approach involving the use of a logic model framework, community-based social marketing (CBSM) principles and concepts, and various tools of behavior change. They were shown how they could use these tools to:

- capture desired outcomes,
- identify target audiences,
- link activities to outcomes, and
- build in an evaluation component into project design.

There was agreement to use this strategic approach to guide the development of the communication plan.

These two workshops also provided an opportunity for the TWG to update the CWG on the sturgeon life cycle, what the research projects are revealing and what the current priorities of the TWG are. This was captured during the meeting as a flowchart and was later transformed into a digital chart (Appendix 2).

1.2.3 - DESIGN PRINCIPLES

The following five principles were used in the development and design of the Communication Plan.

1 - Building a Strategic Plan:

Using a logic model framework (Appendix 3), the CWG built a map (or plan) that captures all the desired long term environmental conditions necessary for sturgeon recovery. These include:

- A - Increase in sturgeon population numbers,
- B - Increase in watershed productivity (food) through increase/improvement of salmon populations,
- D - Improvement of critical habitat for sturgeon,
- E - Increase in state of riparian health of Nechako watershed,
- F - Improvement of Nechako River flow conditions (quantity and timing) to support sturgeon, and
- H - Improvement of water quality to support sturgeon.

(Note: By the end of the second workshop, 'C' conditions were merged into 'B' conditions, and 'G' conditions were moved under various other environmental conditions)

2 - Establishing Focus:

The CWG identified 36 desired medium term behaviour changes that linked to the various environmental conditions. As tackling a list of 36 behaviour changes is overwhelming, the CWG identified the following five 'priority desired behaviour changes' to focus its effort on over the short term (next 5 years):

- 1. Increase in use of selective fisheries methods by First Nations (FN)**
- 2. Decrease in number of incidental mortality (bi-catch in FN gill nets and/or set lines)**
- 3. Decrease in number of intentional mortalities**
- 4. Increase in research on sturgeon by University of Northern British Columbia (UNBC) and Vancouver Island University (formally known as Malaspina University), and**
- 5. Increase in occurrence of use of land stewardship practices**

In doing this, the CWG is confident that its efforts around communication and outreach over the next 3-5 years are focused, collaborative, coordinated and on track.

3 – Using Pertinent Background Information and/or Policy:

To ensure alignment and consistency with past work and policy, the following documents, criteria, concepts, tool and information was used to guide and rationalize the choice of the recommended communication projects and to guide the subsequent assignment of priority.

- Federal Recovery Plan for White Sturgeon
- Provincial Recovery Plan for Nechako White Sturgeon
- Strategic Plan for the Nechako White Sturgeon Recovery Facility and Interpretive Centre
- Priority behaviour changes as identified in the logic model developed collaboratively by the CWG (fall/winter 2009/10),
- Priorities of the TWG (fall/winter 2009/10)
- Recommendations from the Carrier Sekani Tribal Council's (CSTC) harm reduction projects
- Existing partnerships
- Potential for new partnerships
- Opportunities
- Existing audience research

Details on the specific components used from this information have been summarized in Appendix 4.

4 – Providing an Outline to Guide the Planning and Design of Communication Projects:

Key recommendations while planning the implementation details of each of these projects include:

- ensuring/keeping the link of the project to the desired priority behaviour change
- acquiring and/or using target audience research to guide specific details,
- incorporating key messaging for target audiences, and
- planning for evaluation of project success during the design phase to assess, after the project is complete, whether or not desired outcomes of the project were achieved.

To ensure this occurs, a template has been prepared for use Outline for Communication Project Design and Evaluation (Appendix 5).

5 – Establishing a Repeatable Approach:

The communication plan provides a repeatable approach through the use of a logic model framework and the concepts/principles of community-based social marketing. It is designed to enable members of NWSRI team by providing the necessary knowledge, tools and templates such that during upcoming years, they can efficiently, effectively and successfully:

- build on learning from past and current work to ensure new projects are set up for success
- design and implement (themselves or through contract), communication/outreach projects, and
- update the communication plan annually.

1.2.4 - SUMMARY

Through the prioritization of behaviour changes and the structured approach to communication project design provided by this plan, the CWG will be well positioned to:

- encourage collaborative efforts and information sharing among the interested public and stakeholders,
- foster and facilitate the development of partnerships that incorporate a wide range of ecological and social values,
- develop effective communications and extension materials,
- facilitate desired behaviour changes in target audiences, and
- obtain feedback and community-based knowledge regarding the sturgeon population (e.g. observations, incidental catches).

2.0 RECOMMENDED 'KEY MESSAGING' FOR CURRENT TARGET AUDIENCES

The following are initial thoughts and guidance for key messaging for target audiences that have been identified through this document. These should be reviewed and updated annually.

General messaging to all target audiences both within and outside of Nechako watershed:

- This population is at high risk to become extinct, thus we have a provincial responsibility and global responsibility to take immediate action.
- Penetrate/reach emotions/core values/passion (healthy environment, sustainability, longevity of species/history).
- Importance of sturgeon to ecological balance of river/lake systems.
- Emphasize that conservation hatchery facility is key to recovery of population and that we only have a short timeframe to get it established. Every year that passes without it in place results in the population becoming at higher risk to loss of a genetically viable population.
- Seek involvement, do not just inform. Ask participants how they will get involved.
- Make sure messaging is real (e.g. is within participants 'current frame of reference'). Do some research prior to doing a presentation to a group to find out what the current issues in the community are, what the current attitude is, etc.
- Tug on emotions of participants (e.g. uniqueness and age ('dinosaur fish') of sturgeon).
- Ensure message is clear, concise and positive.
- Emphasize need to for a collective effort.
- Repeat message variety of ways (will lead to eventual internalization).

General messaging, to all target audiences within Nechako watershed:

- Begin conversation with 'sturgeon in this watershed' rather than Nechako white sturgeon, as starting off with reference to Nechako may immediately alienate individuals or communities as they may associate Nechako with only the Nechako River and surrounding areas. Later in discussion/presentation can share that population is referred to as 'Nechako' white sturgeon population and that their community is located in what the NWSRI has defined as the Nechako watershed.
- Ensure messaging is regional in terms of effort and responsibility, but at the same time, community based, such that people realize that not only are they part of a larger area, but that they are also personally responsible to do things that help sturgeon recovery.

First Nation Communities (general):

- Be knowledgeable on who and when other representatives from NWSRI have been in the community.
- Be knowledgeable on who within the community is currently or has been involved in the past with the NWSRI.
- Keep mostly visual through use of pictures.
- Use plain, clear language.
- Acknowledge communities work with NWSRI to date.
- Create atmosphere and conversation that allows participants to create their own link of sturgeon to their culture.
- Foster and nurture emotional & spiritual connection that FN have with sturgeon.
- Historically, capture of sturgeon celebrated and shared through entire community thus sturgeon can be seen as a species that brings the community together.
- Ensure acknowledge the cultural and societal importance of white sturgeon and the historic utilization of the species (e.g., intrinsic values, significance in food, sport and commercial fishery).
- Encourage and empower community to decide themselves what they will do to help sturgeon.

- Try to engage them start to think about how they can actively get involved, as individuals, council, and/or as a community.
- Emphasize that you are there to listen, share stories and learn about their perspective on sturgeon and its relationship with their culture.
- Give the community feedback on how any past/current effort has helped.

Community of Vanderhoof:

- Be careful not to imply or suggest that sturgeon compete with geese.
- Emphasize that this is a species that they can actually help recover.
- Emphasize economic benefit and diversification of having a conservation hatchery in community (would be one of two in Canada).

Community of Fort St. James:

- Emphasize the links between the surrounding FN communities/Fort St. James Historic Park/ community.
- Suggest opportunities to market this unique species and make linkages to watershed health and role sturgeon have play in the community (past and present).

Community of Fraser Lake:

- *At this point, nothing community specific.*

Community of Prince George:

- Emphasize/educate that areas of Prince George are part of the Nechako Watershed (perhaps show on a map if communication media allows).
- Sturgeon have been found locally in waters adjacent to the city of Prince George.

3.0 RECOMMENDED COMMUNICATION PROJECTS FOR NWSRI

3.1 – INCORPORATION OF NEW PROJECTS:

There will undoubtedly be new communication projects identified annually due to TWG research finding, restoration projects, upcoming funding opportunities, and/or new or strengthened collaboration & partnerships. The format of this plan is flexible, in that a new project can first be discussed, assessed and captured in Table 6 (Appendix 6) and then assigned a priority and incorporated into Table 1 (Recommended Communication Projects for NWSRI).

The NWSRI Coordinator and the chairs of the TWG and CWG must bring new communication projects to the attention of the CWG in a timely manner. The CWG can then evaluate its current communication plan priorities and make an informed decision regarding the incorporation and prioritization of new communication projects/activities/products. Steps to follow include, but are not limited to:

1. Document rationale, background, & desired outcomes (behavior change and related environmental condition the project will contribute/link to,
2. Decide if new project has merit and should be added to the list,
3. Add to Table 6 (Appendix 6) and assigned a score, and
4. Decide on an appropriate priority in relation to all the existing communication projects and insert into Table 1.

3.2 – TABLE 1: LIST OF RECOMMENDED COMMUNICATION PROJECTS FOR NWSRI

The following projects, activities and products listed in Table 1 are recommended for implementation by NWSRI. The rationale for the assignment of the 'score' can be found in Table 6 (Appendix 6).

TABLE 1 – Recommended Communication Projects for NWSRI

Priority	Project, Activity or Product	Communication Project Number	Target Audience	Suggested Timing (month) and/or Year to Implement	Lead (to coordinate, not necessarily 'to do')	Outcome, Rationale, Comments & Score	Estimated of TIME for NWSRI member	Estimated of TIME for external partner or contractor	Estimate of Cost
1a	Upkeep of NWSRI Website	1	All	Ongoing	NWSRI Coord.	<p>Outcomes: Increase sharing of information and status of NWSRI.</p> <p>Rationale: Imperative to maintain an up-to-date, consistent, web-based information source for people to access</p> <p>Comments: Need to update map to reflect Trembleur and Takla Lake as 'confirmed', rather than 'suspected' range of sturgeon. This is especially important as NWSRI continues with activities to develop relationship and partnership with Tl'azt'en and Takla Lake First Nations (FNs).</p> <p>Score: n/a</p>			
1b	Production of NWSRI Annual Report	2	All	Annually Spring / Summer	NWSRI coord.	<p>Outcomes: Increase in knowledge and awareness of activities completed in each fiscal year.</p> <p>Rationale: Important to have formal reporting out of activities. Provides feedback to funders and supporter on achievements and provides an overall picture of all components of work completed in each fiscal year,</p> <p>Comments:</p> <p>Score: n/a</p>			
1c	Production of NWSRI Annual Newsletter	3	All	Annually Spring / Summer	NWSRI coord.	<p>Outcomes: Increase in knowledge and awareness of activities completed each fiscal year and what the focus for the upcoming year will be.</p> <p>Rationale: Important to have informal reporting out of activities.</p> <p>Comments: Provides feedback to communities and supporter on achievements and provides an overall picture of all components of work completed in each fiscal year, successes, challenges, and what is planned for the upcoming year.</p> <p>Score: n/a</p>			

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1d	Develop an annual 'Schedule of Opportunities' to attend and piggy back onto with sturgeon messaging	4	Various	Annually in May. Ongoing update through each fiscal year.	CWG member or NWSRI Coord.	<p>Outcomes: Increase in knowledge and awareness of sturgeon biology and status and efforts of NWSRI.</p> <p>Rationale: Take advantage of opportunities where large crowds will be gathering and NWSRI effort to 'get people out' is minimized.</p> <p>Comments: Do for both within Nechako watershed, and outside of Nechako watershed. Examples of opportunities outside include appropriate conferences, Union of BC Municipalities AGM, and FN provincial meetings. Examples of opportunities within the Nechako watershed include FN Annual General Meetings, community events, and fishing derbies. Display and materials (model, brochures, etc) can be set up and booth/table manned. Presentation could be made. Prioritize opportunities and divvy between CWG and TWG members who could attend/present.</p> <p>Score: n/a</p>			
1e	Develop and upkeep list of all suitable applicable funding sources and develop schedule for application submission	6	n/a	Ongoing	NWSRI Coord.	<p>Outcomes: Increase in funding</p> <p>Rationale: To ensure thorough, exhaustive search for funds.</p> <p>Comments: Develop schedule for application writing, submit by respective deadline.</p> <p>Score: n/a</p>			
1f	Start of season 'update' paragraph /article (e.g. 'Spring Sturgeon Watch')	12	-FN communities - regional communities - partners - stakeholder groups, - etc.	Annually in June	CWG Chair or member	<p>Outcomes: Increase in knowledge associated with proposed spring/summer/fall season activities for each year.</p> <p>Rationale: Recommended by audiences during fall/winter 2009/10 information sessions. Ongoing, regular feedback and communication to target audiences to keep NWSRI high profile, provide update on achievements of initiative, and praise/reinforce that everyone's efforts to change behaviour are making a difference.</p> <p>Comments: For inclusion in community newsletters, websites, and newspapers. Include research projects, events, and community activities.</p> <p>Score: n/a</p>			

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Priority	Project, Activity or Product	Communication Project Number	Target Audience	Suggested Timing (month) and/or Year to Implement	Lead (to coordinate, not necessarily 'to do')	Outcome, Rationale, Comments & Score	Estimated of TIME for NWSRI member	Estimated of TIME for external partner or contractor	Estimate of Cost
1g	End of season annual 'report out' paragraph (e.g. 'Fall Sturgeon Watch')	13	-FN communities - regional communities - partners - stakeholder groups, - etc.	Annually in Nov	CWG Chair or member	<p>Outcomes: Increase in knowledge associated with activities completed</p> <p>Rationale: Recommended by audiences during fall/winter 2009/10 information sessions. Ongoing, regular feedback and communication to target audiences to keep NWSRI high profile, provide update on achievements of initiative, and praise/reinforce that everyone's effort to change behaviour are making a difference.</p> <p>Comments: For inclusion in community newsletters, websites, and newspapers. Include research projects, events, and community activities.</p> <p>Score: n/a</p>			
2	Inform target audiences of habitat restoration project in Nechako River (placement of gravel)	17	-Vanderhoof - all FN communities - recreational users of Nechako River, - FSJames	Spring/ Summer 2011	CWG member with help from NWSRI Coord.	<p>Outcomes: Increase in knowledge and acceptance of proposed spring/summer/fall season activities associate with restoration project</p> <p>Rationale: To ensure knowledge and buy in from communities and user groups and to minimize negative interactions/correspondence related to project once work starts up.</p> <p>Comments:</p> <p>Score: 8.0</p>			
3	Establish a NWSRI Compensation Program for Damaged Gill Nets	43	First Nation fisher families	Annually during salmon fishing season	NWSRI coord.	<p>Outcomes: To promote the release of sturgeon bycatch and immediately decrease the direct mortality to Nechako white sturgeon bycatch during the salmon fishery.</p> <p>Rationale: Sturgeon tend to roll when caught in a net and releasing them alive often results in significant damage to the gill net rendering it unusable.</p> <p>Comments: Purchasing of nets as compensation to First Nation fisher-families does not mean that the NWSRI supports the use of gill nets for this fishery; however, our First Nations Outreach and field sampling personal have identified sturgeon bycatch to be a factor they believe largely responsible for higher mortality levels of Nechako white sturgeon, particularly the mature breeding stock. At this time, work within the current fisheries methods and provide compensation in the form of a net (or parts).</p> <p>Score: 6.0</p>			

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4	Explore opportunities and partnership with Spruce City Wildlife Hatchery group	44	Spruce City Wildlife Group	Fall/ Winter 2010 /11		<p>Outcomes: Determine if there may be an alternate option for getting a Conservation Hatchery up and running.</p> <p>Rationale: This group is in the process in deciding if they are going to rebuild or not! We have a very real opportunity to engage with this group on our interests.</p> <p>Comments: Perhaps a joint facility or agreement could be struck to culture juvenile sturgeon. Location would be the big issue, but they may be receptive to something in Vanderhoof. If not, could a fish culture program work in PG using Nechako water?</p> <p>Score: 5.0</p>			
5	Set up a Facebook site for NWSRI	14	All	Spring 2010, then ongoing mainten.	NWSRI Coord.	<p>Outcomes: Increase in number of people who are exposed to NWSRI and</p> <p>Rationale: This is a social media tool that NWSRI currently does not use. Has potential to expose large number of previously inaccessible person to NWSRI. Advantage of media is that users recommend visiting site/learning about NWSRI to other users (e.g. their 'Facebook friends'). People tend to act on recommendation of a friend more often than on the recommendation of a stranger, poster or brochure.</p> <p>Comments: Consider having it designed by a youth 13-18. Home page would have to be design to maximize impact of first visit such that interest is grabbed and facebook user decides to share with friends and/or become involved in NWSRI.</p> <p>Score: 4.5</p>			

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6a	Develop a campaign to update government on status of recovery initiative and current risks.	8	Provincial gov't Executive & Ministers office	Spring 2010	TWG Chair & CWG Chair	<p>Outcomes: Increase in knowledge associated with proposed spring/summer/fall season activities. Increase in knowledge on current lack of funding for Recovery Facility/Conservation hatchery and risks and consequences. Increase in knowledge that immediate action is required. Facilitate a slight shift of government priorities that results in increased work and positive decisions that contribute towards finding a funding solution.</p> <p>Rationale: Funding is decrease annually. This will lead to the extinction of the Nechako white sturgeon population.</p> <p>Comments: Emphasize yearly decline in adult pop'n without permanent conservation fish culture program in place.</p> <p>Score: 8.0</p>			
6b	Develop a campaign to solicit grad students from UNBC and Vancouver Island University to do research on sturgeon	9	Grad students and professors	Fall 2010	TWG Chair	<p>Outcomes: Increase in amount of research on habitat identification and to continue work to determine causes of decline. To facilitate an increase in the number of projects/activities associated with recruitment & restoration.</p> <p>Rationale: This is source for research projects and funding that is currently under-utilized.</p> <p>Comments:</p> <p>Score: 8.0</p>			
6c	Develop and deliver a campaign to explore beneficial partnerships with high profile Non Government Organization (NGO) groups	7	High profile NGO groups	Summer 2010	NWSRI Coord.	<p>Outcomes: Increase knowledge/awareness. Increased funding.</p> <p>Rationale: This is an audience and funding source not yet explored by NWSRI. May be a source to get funding for conservation hatchery and ongoing research.</p> <p>Comments: May result in increased lobbying by NGO/s to government to financially support critical needs of NWSRI. Prior to embarking on this, NWSRI CWG & TWG should define what a beneficial partnership would be.</p> <p>Score: 9.5</p>			

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7a	Sturgeon Quick Facts - FN	5a	First Nations	Spring 2011	NWSRI Coord.	<p>Objective: Increase knowledge / awareness. Rationale: Currently lacking this product. Received feedback from fall/winter 2009/10 FN community meetings that this would be useful take-home product. Need something like this to include with questionnaire. Supports Comm. Proj. No.'s 11, 16, 22, 23, 24, 41 and 42. Comments: 1-2 pages. Have a section where info specific to community can be included. Also produce one in the Carrier language. Include NWSRI contact and the seasonal Catch Monitor (CM) contact information for that fishing season. Ensure have capability to update in-house. Score: 12.5</p>			
7b	Sturgeon Quick Facts - General	5c	-General Public, -Municipal Gov't, -Front line division of Gov't, - NGO's	Spring 2011	NWSRI Coord.	<p>Outcomes: Increase knowledge/awareness Rationale: Currently lacking this product. Received feedback from fall 2009 meetings that this would be useful. Supports Comm. Proj. No.'s 7, 14, 10, 25, 26, 27 & 35. Comments: Need something like this to include with questionnaire. Ideas: Work with Chamber of Commerce (FSJames/Fraser Lk) to include with fishing derby information. Have available at provincial parks and tourism recreation sites, Chamber of Commerce and Fort St. James Historic Site. Score: 8.5</p>			
7c	Sturgeon Quick Facts – Gov't	5b	Provincial gov't Executive & Ministers office	Spring 2011	NWSRI Coord.	<p>Outcomes: Increase knowledge. Increase funding. Rationale: Currently lacking this product. Need a version that speaks language of ministers/executive and can be adjusted to ensure messaging language takes advantage of current political climate and uses best levers at right time. Supports Comm. Proj. No. 8. Comments: 1-2 pages. Capability to update in-house. Score: 4.0</p>			

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8	Collaboratively design and deliver a 'Riverside Session/Assembly' for FN community (fisher families, community members and community leaders)	16	First Nation Fisher families and Chief and Council	Spring 2011	NWSRI Coord. CSTC sturgn liaison Local CM for each FN comm	<p>Outcomes: Increase in knowledge/awareness, tools and skills of FN fisher families. Decrease in number of incidental mortality. Increase in reporting of sturgeon encounters.</p> <p>Rationale: Idea that was generated at fall/winter 2009/10 FN community mtgs. Need a hands on approach with fisher families. Will help to continue to build relationships between Catch Monitor (CM), NWSRI biologists and fisher families. Will help to remove barriers to the successful live release of sturgeon from gill nets.</p> <p>Comments: Host the majority of session outside on the river. Develop in partnership with CSTC and each FN. Involve in design of session fisher persons who are on side. Provide incentive/s for participation (e.g. get small boat operator certificate). Invite council members. Areas of focus should include: What to do if catch a sturgeon {safety of fisher person and sturgeon}, equipment to have on board, who to contact, etc. Tools for NWSRI to develop to use at this tools – Gill net video, 'Sturgeon Kit' for boat. Build on and use handouts developed through CSTC harm reduction work (05/06, 06/07 & 07/08) as guidance. Allow communities to determine who sturgeon sightings/captures are reported to. Budget for funds to cover food, venue (if needed) and any incentives that may be offered.</p> <p>Score: 19.0</p>			
9	Create video 'How to release a live sturgeon from a gill net'	18	FN fisher families and members of FN communities	Summer / Fall 2010	TWG Chair	<p>Outcomes: Increase in knowledge and skills. Increase in occurrence of successful release of live sturgeon from gill net. Decrease in adult sturgeon mortality.</p> <p>Rationale: This is currently an education tool that is missing. Need effective method to show fisher families firsthand how to release a sturgeon. Could show during project that involves session/assembly developed for fisher families and community leaders. Supports Comm. Proj. No's 16, 22, 23, 24, 41 & 42.</p> <p>Comments: Logistics of making this film may be low tech and simple. Involve CSTC Sturgeon Liaison staff by having a small video camera available and hanging out for a few days within a supportive community during time when high likelihood of sturgeon being caught in net. Consider having copies available for CM to hand out, at band office, to sign out at library. Also post on website. If possible, have laptops or DVD viewing device in CM trucks so that the video can be watched right beside or on the river.</p> <p>Score: 13.0</p>			

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10	Develop a Sturgeon Boat Kit	19	FN fisher families	2010/11		<p>Outcomes: Increase in occurrence that fisher families have necessary tools in their fishing boat and that live sturgeon are successfully released from a gill net.</p> <p>Rationale: Decrease barriers associated with being able to safely release a live sturgeon. Give away kits or provide list of what should be in a kit. Use as tool during project that involves session/assembly developed for fisher families and community leaders. Supports Comm. Proj. No's 16, 22, 23, 24, 41 & 42.</p> <p>Comments: Ahead of time, talk to supportive fisher families to figure out best way to package kit so that it is practical and fishers will keep in boat and will use it.</p> <p>Score: 13.0</p>			
11	Create effective 'prompts' for FN fisher families	33	FN fisher families	2011	TWG Chair CSTC sturng liaison	<p>Outcomes: Increase in occurrence that fishers have necessary tools in their boat to safely and successfully release a live sturgeon. Increase in number of live sturgeon being released. Decrease in number of incidental adult mortalities.</p> <p>Rationale: Prompt/s need to be located close to boat and/or pickup and visible when fishers head out fishing such that it reminds them to 'be ready to release a sturgeon'. Supports Comm. Proj. No's 16, 22, 23, 24, 41 & 42.</p> <p>Comments: Do after Comm. Proj. No. 16- (Riverside Session/Assembly) so that you can research and find out what would be effective prompt/s for fishers (e.g. foam sturgeon on boat key chain, decal to put somewhere on boat). Find out <u>when and where</u> they need to be reminded to have everything in their boat they need to release a sturgeon.</p> <p>Score: 8.5</p>			

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12	Collaboratively designed with each FN community a 'community event' (e.g. River and Fish Festival) to be held in each FN community	24	Each FN community	Spring/early summer 2011	NWSRI Coord. CSTC sturgn liaison Local CM for each FN	<p>Outcomes: Increase in knowledge, awareness, positive attitude and support of status and biology of white sturgeon and efforts of NWSRI.</p> <p>Rationale: Idea that was generated at FN community mtgs. Knowledgeable, supportive community members will help NWSRI in bringing accountability to involvement of FN in NWSRI and to individual actions. If possible, design in as much hands on learning as possible. Will help to continue to build relationships between CM, NWSRI team, community members, chief and council.</p> <p>Comments: Would need to partner on design and funding of event. Incorporate sturgeon awareness and messaging into a holistic event that celebrates rivers/lakes/culture/community/salmon/sturgeon and provide opportunities for the community to gather, learn, share, and tell stories. Inspire communities to rediscover sturgeon and collectively define what they represent within the culture of the community.</p> <p>Score: 18.5</p>			
13	Continue to bring to members of FN communities the knowledge and awareness of the status of Nechako white sturgeon	23	Members of FN communities	Annual	NWSRI Coord. CSTC sturgn liaison Local CM for each FN comm	<p>Outcomes: Increase in knowledge, awareness, positive attitude and support of status and biology of white sturgeon and efforts of NWSRI.</p> <p>Rationale: continue to reach out to community members, not just Chief and council and fisher families. Knowledgeable, supportive community members will help NWSRI in bringing accountability to involvement of FN in NWSRI and to individual actions.</p> <p>Comments: Prioritize communities based on previous years work, successes and challenges. Target communities where least amount of work has been completed or where it has been challenging to arrange an event.</p> <p>Score: 18.5</p>			

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14	Continue to work with and support CSTC on planning and implementation of selective fishery event (beach seine) at Nadleh	22		Annual event in fall	TWG Chair	<p>Outcomes: Increase in occurrence of use of mechanisms and fishing methods that reduce risk of harm to sturgeon. Decrease in adult mortality.</p> <p>Rationale: To facilitate transition from gillnet to selective fishery. Include emphasis on importance of DFO facilitating sufficient annual escapement of sockeye into CSTC Food, Social and Ceremonial (FSC) fishery areas.</p> <p>Comments: Build on successes of selective fishery events of past years.</p> <p>Score: 19.0</p>			
15	Develop and deliver a campaign to bring together Chief and Council's of all First Nations in the Nechako watershed.	11	Chief and Council of each FN community in Nechako watershed	2011 - 12		<p>Outcomes: Increase awareness between communities on what each community is doing to support NWSRI. Increase in occurrence of regional collaboration and coordination of effort of all FN to support and participate in NWSRI.</p> <p>Rationale: To empower communities to speak as a group, on behalf of sturgeon, and to lobby and or apply for funding for activities required for successful recovery of Nechako white sturgeon.</p> <p>Comments: Need to ID an influential person within each community (preferably on council) who would act as champion of NWSRI. Budget for funds to cover cost of venue rental and snacks/lunch.</p> <p>Score: 20.5</p>			
16	Develop and deliver a campaign to bring together local governments (municipalities and regional districts) in the Nechako watershed.	10	<ul style="list-style-type: none"> - Mayor & Council of each community, - Regional District reps 	Spring / Summer 2010	CWG Chair	<p>Outcomes: Bring together all municipalities in Nechako watershed to increase support to NWSRI, collaborate and speak on behalf of region regarding importance of sturgeon, and increase funding contributions from local government.</p> <p>Rationale: Currently, District of Vanderhoof is only municipality that lobbies for sturgeon. This lobby would be more powerful if it included all communities located within the Nechako watershed.</p> <p>Comments: e.g. Lobby for support/funding at events like Union of BC Municipalities.</p> <p>Score: 5.0</p>			

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17	Save Our Sturgeon Festival (juvenile release)	31a	<ul style="list-style-type: none"> -FN communities (all ages) -Local gov't -stakeholder grps -NGOs -residents from regional communities -executive member of gov't 	Fall 2011		<p>Outcomes: Increase in knowledge & awareness of target audiences on sturgeon biology, status, NWSRI, and what other target audience are doing to contribute to NWSRI. Increase in collaboration and establishment of new partnership opportunities. Increase in support and funding (in-kind and financial). Increase in number of reports of sturgeon encounters. Increase in the number of live sturgeon being released.</p> <p>Rationale: This is a fantastic, hands-on, event that results in a human to sturgeon connection and results in participants gaining a lasting awareness of sturgeon. Has history of being a very successful event.</p> <p>Comments: Shift target audience for juvenile release from school kids to FN Communities (elders, council, members, kids), mayor and council of all regional communities, members of stakeholder groups, members of NGO groups, and interested residents from regional communities. Research intended audience to find out what would make the day worthwhile. Redesign event to meet desired outcomes. Develop and promote as "the event to attend in 2011!" Hold on Friday/Sat to promote participation on Saturday by those who cannot attend during weekdays due to work commitments.</p> <p>Score: 22.0</p>			
18	Save Our Sturgeon Festival (juvenile release)	31b	<ul style="list-style-type: none"> -Assess annually. -Decide if same as previous year, or can add, remove, etc. 	2012		<p>Outcomes: Increase in knowledge & awareness of target audiences on sturgeon biology, status, NWSRI, and what other target audience are doing to contribute to NWSRI. Increase in collaboration and establishment of new partnership opportunities. Increase in support and funding (in-kind and financial). Increase in number of reports of sturgeon encounters. Increase in the number of live sturgeon being released</p> <p>Rationale: As above, (Comm.Proj. No. 31a).</p> <p>Comments: Assess target audiences annually. As above in Comm. Proj. 31a, shift primary target audience to FN Communities (elders, council, members, and kids), mayor and council of all regional communities, members of stakeholder groups, members of NGO groups, and interested residents from regional communities. See comments for 31a.</p> <p>Score: 22.0</p>			

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19	Develop and implement a web-based 'Adopt a Sturgeon' program	28	All	2010/11, -then ongoing mainten.	NWSRI coord.	<p>Outcomes: Increase opportunities for supporters to provide financial support to NWSRI efforts to build and operate a permanent conservation fish culture program.</p> <p>Rationale: To allow easy access (24/7) for interested people/groups to financially support fund raising for a conservation hatchery.</p> <p>Comments: Ensure minimum donation is affordable for a child. Perhaps figure out approximately the cost from start to finish of a sturgeons life in the hatchery and base minimum donation on an amount per fish, with an option to adopt as many fish as desired.</p> <p>Score: 6.0</p>			
20	Develop a form (paper and web-based) for individual or groups to make 'written commitments' of some nature to the NWSRI	39	All	2011		<p>Outcomes: Increase in number of public written commitments posted on web-site. Increase in perception/occurrence that support of NSWRI is a societal norm.</p> <p>Rationale: Voluntarily and publically committing to an action or form of support will increase the likelihood of a person or group to follow through on their commitment.</p> <p>Comments: Create a commitment page on the website and cumulatively post all written commitments.</p> <p>Score: 16.0</p>			

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21	Seek permission to join in during a FN Elder mtg	41	FN Elders	2011/12		<p>Outcomes: Increase in knowledge and awareness of elders on status and biology of white sturgeon and efforts of NWSRI. Increase involvement of elders in activities related to sturgeon. Increase buy/in support from elders. Increase in community ownership and accountability to ensure activities and individual actions support NWSRI efforts.</p> <p>Rationale: To date, have not implemented any sort of formal process to engage elders. Elders are a group (secondary audience) that could influence Chief and Council, fisher families, etc.</p> <p>Comments: May also be an opportunity to find out who is interested in sharing knowledge on sturgeon and lead into Comm. Proj 42. Provide some sort of gift of thanks, pay for lunch, share pictures, look at pictures they have, listen to/record stories, have large map available (perhaps a Landsat image) where they can show where the stories happened or show locations where they have seen certain behaviours. Ensure funds to cover cost of venue and snacks/lunch and any incentives that may be offered.</p> <p>Score: 14.5</p>			
22	Develop within each FN community a process to capture elder knowledge about sturgeon	42	FN Chief and council & Elders	2011/12	CWG Chair	<p>Outcomes: Increase in knowledge and awareness of elders on status and biology of white sturgeon and efforts of NWSRI. Increase involvement of elders in activities related to sturgeon. Increase buy/in support from elders. Increase in community ownership and accountability to ensure activities and individual actions support NWSRI.</p> <p>Rationale: To date, have not implemented any sort of formal process to engage elders. Elders are a group (secondary audience) that could influence Chief and Council, fisher families, etc.</p> <p>Comments: Prepare questions and 'test' the questions with a small group ahead of time. Offer incentive to participate (e.g. honorarium). Prior to interview, review past information to ensure not re-asking same questions and already have the answers. Find out if elder has already done interview for other people and for other reasons. Ensure funds to cover cost of venue and snacks/lunch and any incentives that may be offered.</p> <p>Score: 15.5</p>			

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23	Partner with each First Nation community to have local artists create art/song/dance that tells the story of sturgeon & their culture	34	First Nation communities	Spring Summer 2011	NWSRI coord.	<p>Outcomes: Increase in profile of sturgeon and its place in their culture. Increase in sharing of culture and history through visual and oral methods. Increase involvement of elders in activities related to sturgeon. Increase in community ownership of sturgeon as integral component of ecosystem and culture. Increase in accountability to ensure activities of community support NWSRI.</p> <p>Rationale: Currently a gap in documentation of sturgeon history and how they fit into FN culture.</p> <p>Comments: Idea generated from 2009 FN information mtgs. Empower, enable and assist in creating the space and time for FN to decide what sturgeon mean to them and how they would like to communicate it to current and future generations, both within and outside of their community.</p> <p>Score: 17.0</p>			
24	Support work of CSTC to find ways to compensation FN fishers for net damage sustained when releasing live sturgeon from gillnet.	20		Ongoing		<p>Outcomes: Increase in occurrence of successful release of live sturgeon from gill net. Decrease in adult mortality.</p> <p>Rationale: Resultant damage to gill nets is a barrier to releasing live sturgeon. Providing some sort of compensation is a way to decrease the impact damaged nets can have on fisher family incomes.</p> <p>Comments:</p> <p>Score: 9.0</p>			
25	Teach FN people on how to mend a damaged gill net	21	fisher families and members of the community			<p>Outcomes: Increase in occurrence that gill nets are successfully repaired. Increase in occurrence of successful release of live sturgeon from gill net. Decrease in adult mortality.</p> <p>Rationale: This is a current barrier for some fisher families to do what is necessary to keep a sturgeon alive and successfully remove it from a gill net</p> <p>Comments: Work with CSTC. See if can figure out incentives to fix nets. Explore if there would be members of the community willing to repair gill nets damaged during release of sturgeon.</p> <p>Score: 7.5</p>			

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26	Formally engage Fraser Lake Mayor and Council and community	27	- Fraser Lake Mayor and Council -community of Fraser Lake	Summer 2011	CWG Member from Fraser Lake	<p>Outcomes: Increase in knowledge & awareness of residents of Fraser Lake.</p> <p>Rationale: To date, there has not been any information/knowledge session delivered in Fraser Lake.</p> <p>Comments: Present first to Mayor and Council. Solicit representative from community to be part of CWG. Try to find champion in community who can help represent NWSRI. Tag any communication effort/activities onto a larger community event.</p> <p>Score: 7.0</p>			
27	TWG host a ½ day Update Session	15	-CWG members -public -stakeholders	Winter 2010/11	TWG Chair	<p>Outcomes: Increase knowledge of CWG, interested stakeholders and the public on what the TWG has learned over the past 10 years, successes it has had, and what the TWG is focusing on right now.</p> <p>Rationale: This type of session had not occurred in a number of years and it is time to formally share learning's from research that has been completed and what future research will be targeted.</p> <p>Comments: This could be used as the 'kick off' to the campaign to solicit grad students from UNBC and Vancouver Island University to do research on sturgeon.</p> <p>Score: 4.5</p>			
28	Continue to put up NWSRI signs at strategic locations within the Nechako watershed	38	-Fishers (FN and non-FN) - recreational user of rivers in Nechako watershed	Ongoing	TWG & CWG member	<p>Outcomes: Increase in knowledge and awareness of fishermen (FN and non-FN) and recreationalists.</p> <p>Rationale: It is important to have information to inform and/or remind fishers or recreationalist that they are sharing the water with an endangered species and that their choice of activities may have a negative impact on sturgeon.</p> <p>Comments: Document where all signs currently are and create list of where signs still need to be put up.</p> <p>Score: 13.0</p>			

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29	Design and develop prompts to remind people about sturgeon	37	-Fisher families -FN communities -Regional communities	Spring 2012		<p>Outcomes: Increase in occurrence that people will assess their day to day activities, link their actions to the impacts on sturgeon, and consider doing a desired behaviour. Increase in occurrence that people will share their knowledge about Nechako white sturgeon and the recovery initiative.</p> <p>Rationale: Recommended at fall/winter 2009/10 FN community information sessions. Supports Comm. Proj. No.'s 4, 10, 11, 16, 23, 24, 25, 26, 27, 31 & 35.</p> <p>Comments: Examples - fridge magnet (actual photo, not sketch), waterproof sticker for tackle box, pin for fishing vest, foam sturgeon on boat key chain, decal to put somewhere on boat.</p> <p>Score: 3.5</p>			
30	Design and construction of smaller stand-alone NWSRI display	32	All	Spring 2012	NWSRI Coord.	<p>Outcomes: Increase in awareness of upcoming sturgeon event/session in addition to facts about sturgeon biology, status and NWSRI. Increased attendance to events/sessions.</p> <p>Rationale: Existing standalone display is awkward to set up, expensive to ship and tricky to set up without previous experience. Supports Comm. Proj. No.'s 4, 10, 11, 16, 23, 24, 25, 26, 27, 31 & 35.</p> <p>Comments: Recommended at fall/winter 2009/10 FN community information sessions. Commission the design of a display that is light weight, compact, small footprint when set up, shippable & easy to set up. Have pockets/holders designed in so handouts/questionnaires/reporting forms are part of display and are available to take. Have area designed into display to deposit questionnaires/reporting forms. Send to communities/venues one week prior to a NWSRI event/session and have volunteer in community put up in strategic, high traffic location.</p> <p>Score: 6.5</p>			

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31	Support ongoing projects with agricultural sector and stakeholder groups in Vanderhoof	25	Farmers in the Nechako watershed	Ongoing	CWG member Wayne Salewski	<p>Outcomes: Increase in knowledge, awareness, positive attitude and support of status and biology of white sturgeon and efforts of NWSRI. Increase in occurrence of use of land stewardship practices.</p> <p>Rationale: The cumulative impact of agricultural activities may be having a negative impact on sturgeon health in Nechako watershed, especially if impacts are impacting a specific habitat location.</p> <p>Comments: Wayne Salewski has been leading this effort over the past years. Recommend the complete a Communication Project Outline (Appendix 5) to capture intent and ensure that efforts are linked to desired behavior changes and environmental outcomes. Also, build in and complete evaluation component to ensure desired outcomes are being achieved.</p> <p>Score: 9.0</p>			
32	Work with Parks Canada (Fort St. James National Historic Site) to incorporate sturgeon information at site.	26	Parks Canada	Ongoing	CWG Member	<p>Outcomes: Increase in knowledge, awareness, positive attitude and support of status and biology of white sturgeon and efforts of NWSRI. Decrease in accidental adult mortality.</p> <p>Rationale: Previous to spring of 2010, the Fort St. James Historic Site was a partner that NWSRI has not yet engaged in recovery efforts. There is interest and capacity from a recently hired, new staff member (Product Development Officer - Kevin Gelding) to incorporate sturgeon information (biology, history & conservation messaging) into the displays and interpretive program at site.</p> <p>Comments: Continue to liaise with Product Development Officer at Historic Park to further develop this partnership.</p> <p>Score: 9.0</p>			

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33	Develop a form (paper and web-base) to allow 24/7 reporting of sturgeon sightings and encounters	29	All	Spring 2011	TWG Chair	<p>Outcomes: Increase in reporting of sturgeon encounters.</p> <p>Rationale: Decrease barriers to reporting by making it available 24/7 via the webpage. Supports Comm. Proj. No.'s 4, 10, 11, 16, 23, 24, 25, 26, 227, 31 & 35.</p> <p>Comments: Also create one in Carrier language. Ensure it is easy to find 'reporting forms' from website (<i>e.g.</i> have a direct link to the forms from the homepage).</p> <p>Score: 5.5</p>			
34	Develop a form (paper and web-based) to capture / document stories about sturgeon.	36	All	Spring 2011		<p>Outcomes: Increase in occurrence of accurate documentation of historical and anecdotal stories about sturgeon</p> <p>Rationale: Difficult to capture all details of stories shared by people. Thus having a short form to give them to immediately fill in would ensure accurate, thorough documentation of the information. Supports Comm. Proj. No.'s 4, 10, 11, 16, 23, 24, 25, 26, 227, 31 & 35.</p> <p>Comments: Also create one in Carrier language. Ensure it is easy to find 'reporting forms' from website (<i>e.g.</i> have a direct link to the forms from the homepage).</p> <p>Score: 4.0</p>			
35	Paint sturgeon on street drains	30	Regional Communities	Summer 2011	CWG member in each area	<p>Outcomes: Increase occurrence that toxic liquids/materials are properly disposed of.</p> <p>Rationale: This prompt would act as an ongoing reminder to people to not dump toxic chemicals down street drains or household drains</p> <p>Comments: <i>e.g.</i> Like salmon that are painted on street drains in other communities.</p> <p>Score: 3.5</p>			

TABLE 1 – Recommended Communication Projects for NWSRI

Priority	Project, Activity or Product	Communication Project Number	Target Audience	Suggested Timing (month) and/or Year to Implement	Lead (to coordinate, not necessarily 'to do')	Outcome, Rationale, Comments & Score	Estimated of TIME for NWSRI member	Estimated of TIME for external partner or contractor	Estimate of Cost
36	Sturgeon Quick Facts – Youth 10 to 18	5e	Youth between 10-18 yrs old			<p>Objective: Increase knowledge / awareness status and biology of white sturgeon and efforts of NWSRI.</p> <p>Rationale: Currently lacking this product. Would be useful take-home product after a school presentation or from a display booth at a community event.</p> <p>Comments: 1-2 pages. Have youth involved in design. Use appropriate message style for youth. Include NWSRI contact information. Ensure have capability to update in-house.</p> <p>Score: 1.5</p>			
37	Sturgeon Quick Facts - Youth under 10	5d	Youth 10 years of age and younger			<p>Objective: Increase knowledge / awareness on status and biology of white sturgeon and efforts of NWSRI.</p> <p>Rationale: Currently lacking this product. Would be useful take-home product after a school presentation or from a display booth at a community event.</p> <p>Comments: 1-2 pages. Use appropriate message style for young kids. Include NWSRI contact information. Ensure have capability to update in-house.</p> <p>Score: 1.5</p>			
38	Develop school program were youth (Grade 9-12) teach younger kids (grades grades 2-6)	40	FN and Non-FN youth (Grades 9-12)		CWG member (? Chris M.)	<p>Outcomes: Increase in knowledge and awareness of youth on status and biology of white sturgeon and efforts of NWSRI.</p> <p>Rationale: Change up the messenger. Empower youth to teach the younger kids about sturgeon.</p> <p>Comments: Use existing school curriculum program. See if can incorporate as some sort of credit to a course.</p> <p>Score: 6.5</p>			
39	Engage city of Prince George	35	Need to ID target audiences with community of PG		CWG member/s from PG	<p>Outcomes: Increase knowledge / awareness status and biology of white sturgeon and efforts of NWSRI.</p> <p>Rationale: Participation in Rivers Day has been the only event at which effort has been put to engage the community of PG.</p> <p>Comments: If presentations have not yet been made to Mayor and Council, consider this.</p> <p>Score: 1.5</p>			

4.0 PROJECT DESIGN, EVALUATION PLANNING, IMPLEMENTATION, AND END OF PROJECT EVALUATION

Communication Project Design and Evaluation Planning

Prior to pursuing funding for a project, it is critical that the lead of each project complete the Outline for Communication Project Design and Evaluation (Appendix 5) to ensure that informed, thorough and thoughtful planning goes into not only the design of the project, but also its evaluation.

Budget and Funding

A budget to estimate the cost of delivery of the entire project (including evaluation) should be prepared and funding pursued.

Implementation

For each successfully funding project, the lead of the project can proceed with implementation as per the Communication Project Outline.

End of Project Evaluation

Of equal importance is the review of the effectiveness of each project. The NWSRI Logic Model in Appendix 3 can be used to guide the CWG and TWG members around how they can measure *efficiency* (Outputs = pink boxes) vs *effectiveness* (Outcomes = blue, green and maroon boxes) for each communication/outreach project.

As noted above, the methodology for evaluation must be completed proactively, during the project design.

5.0 ANNUAL REVIEW OF COMMUNICATION/OUTREACH PROJECTS AND UPDATE OF COMMUNICATION PLAN

5.1 REVIEW OF SUMMARY AND EVALUATION OF EACH COMMUNICATION PROJECT

At the appropriate time in each fiscal year, (e.g. May) it is recommended that as a group, the NWSRI review the summary and evaluation of project completed to assess how effective each project was in achieving the desired outcomes as identified in the project outline.

5.2 REVIEW AND UPDATE OF LOGIC MODEL (APPENDIX 3) AND KEY MESSAGING (SECTION 2.0)

Logic Model:

The successful achievement of desired outcomes should be reflected through a change/update of the logic model outcomes for each of the target audiences.

If projects were not effective in meeting the desired outcomes as identified in communication project outline, it is recommended that the lead follow up with the target audience to find out why. Necessary adjustments should then be made to the communication project outline so that these mistakes are not repeated in a subsequent year. The revised project should be repeated as soon as possible. However, an adequate level of audience research *prior* to initiating the design of a project will in most cases, avoid the development of an ineffective project.

Examples of reasons why desired outcomes may not be achieved include, but are not limited to:

- Campaign/product focused on knowledge, when it should have focused on providing skills to target audience
- Audience was too broad
- Lack of relationship and trust developed with target audience through implementation of project
- focused on removal of incorrect barrier,
- did not provide effective incentive,
- wrong timing for delivery of project,
- wrong messaging, or
- delivery of message by wrong person

Key Messaging:

Upon the completion of each project evaluation, the project lead and NWSRI Coordinator should review the recommended key messaging lists and update them based on any learning. This can then benefit future projects.

5.3 REVIEW OF WHAT IS 'NEW' FOR UPCOMING FISCAL YEAR

There will undoubtedly be new communication projects identified annually due to TWG research findings and/or restoration projects, or funding & partnership opportunities. As such, it is very important that the chairs of the TWG and CWG communicate frequently and in a timely manner to ensure that any new communication/outreach projects are identified as soon as possible.

5.4 REVIEW AND UPDATE OF RECOMMENDED COMMUNICATION PROJECTS

The Recommended Communication Projects (Table 1) must be reviewed and updated as required so that it remains a current, active list that reflects not only the projects that have been completed, but also the projects to come.

1. Remove projects that have been successfully completed and were effective in achieving desired outcomes (behavior changes/environmental conditions).
2. Adjust/update any projects that are ongoing, or need to be repeated because the desired outcomes were not achieved (use the evaluations of completed work to guide improvements to project design).
3. Add any new projects/activities/products into Table 6 (Appendix 6).
4. Review logic model to ensure CWG and TWG are in agreement on what outcomes (behavior changes/environmental conditions) are the priority for the upcoming year and should drive where the CWG focuses its communication efforts.
5. Evaluate the projects in relation to each other and prioritize projects for the upcoming fiscal year.
6. Update Table 1 to reflect priorities.

Note: The format of this plan is flexible, in that new rows can be inserted into both Table 6 (Appendix 6) and Table 1 (Recommended Communication Projects for NWSRI). The rationale, background, and desired outcomes can be captured and the priority of a new project can be incorporated within existing projects.

6.0 LOOKING AHEAD – APPLYING FOR UPCOMING FISCAL FUNDING

Table 1 will provide direction and rationale to the NSWRI Coordinator regarding which projects should be the focus of funding applications.

7.0 REFERENCES

- Carrier Sekani Tribal Council. 2006. Working towards harm reducing and selective fishing methodologies for Carrier First Nations within the Nechako River watershed. Prepared for Habitat Stewardship Program. Prince George, BC. 46pp.
- _____. 2007. Working towards harm reducing and selective fishing methodologies for Carrier First Nations within the Nechako River watershed. Prepared for Habitat Stewardship Program. Prince George, BC. 20pp.
- _____. 2008. White sturgeon harm reduction and selective fishing methodologies for First Nations within the Nechako River watershed - 207HSP4493. Prepared for Habitat Stewardship Program. Prince George, BC. 20pp.
- Hubert, E., M. Haines and S. Sulyma. 2009. Fostering Stewardship Behaviour: Outreach Project Planning Workbook. Prepared for Ministry of Environment, Province of British Columbia. 43pp.
- McKenzie-Mohr, D., and W. Smith. 1999. Fostering sustainable behaviour - an introduction to community-based social marketing. New Society Publishers, Gabriola Island, BC.
- National Recovery Team for White Sturgeon. 2009. Recovery strategy for white sturgeon (*Acipenser transmontanus*) in Canada. Fisheries and Oceans Canada. In Species at Risk Act Recovery Strategy Series. Ottawa, ON. 247pp.
- Nechako White Sturgeon Recovery Initiative. 2004. Recovery plan for Nechako white sturgeon. Golder Associates Ltd. Prince George, BC. 82pp.
- _____. 2007. Strategic plan for the Nechako white sturgeon recovery facility and interpretive centre. Prepared by Compass Resource Management Ltd. Prince George, BC. 41pp.
- Sulyma, S. 2010. Summary of white sturgeon outreach and information sessions delivered in First Nation and regional communities in the Nechako and Stuart watersheds *d.b.a.* Resource Interface and Nechako White Sturgeon Recovery Initiative. Report No. BCL-748. Fort St. James, BC. 68pp.
- Toth, B., and B. Shepert. 2007. An evaluation of project effectiveness 2004-2006: Working toward harm reducing and selective fishing methodologies for Carrier/Sekani First Nations within the Nechako River watershed. Carrier Sekani Tribal Council. Prince George, BC. 18pp.

APPENDIX 1 - MANDATE OF CWG

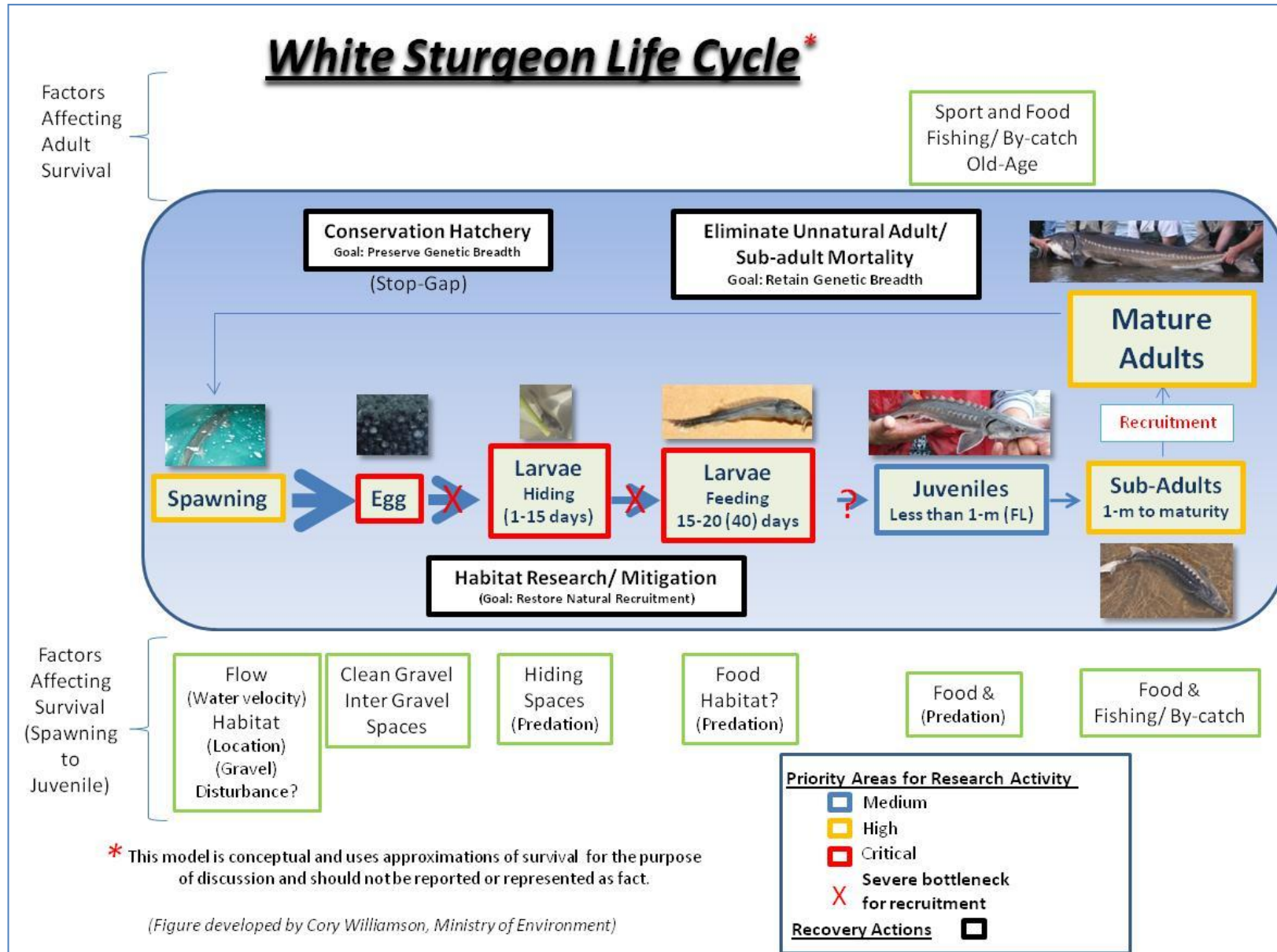
Discussion with CWG on the mandate of Community Working Group revealed that originally it was quite broad, thus the CWG narrowed it down to:

1. Communication to the public to increase knowledge and increase support
Some of the activities and products that have been pursued and funded from various sources include:
 - Display products
 - Website
 - Brochures
 - Large wood sturgeon models
 - Passing on info learned from TWG to public
 - Clay sturgeons
 - T-Shirts
 - Fall Release event/educational event
 - Participating in Rivers Day
2. Socio-economic impacts and presentation of options (on hold)
3. Support of any TWG tasks

Note: The exact words from the Recovery Plan for Nechako White Sturgeon – March 2004 (page 5) are:

“The primary task of the Action Planning Group is to develop a common vision for sturgeon recovery in the Nechako and to assist the Recovery Team by acting as a public advocate, which promotes support and implementation of the recovery plan. This will involve providing feedback to the RT regarding socio-economic and environmental impacts of the proposed recovery plan component, and educating and communicating with the broader community.”

APPENDIX 2 – FLOW CHART OF WHITE STURGEON LIFE CYCLE AND PRIORITY AREAS FOR ACTIVITY



APPENDIX 3 – NWSRI LOGIC MODEL (JANUARY 2009: COMMUNITY WORKING GROUP)

Please see Figure 1 & 2 for the NWSRI Logic Model (Jan 12, 2010). Note that the file has been split into Part 1 (left half of Logic Model) and Part 2 (right half of logic model) to allow for the best incorporation into this report. A .pdf and .ppt version that has the entire logic model in one file can be obtained upon request from NWSRI coordinator.

Notes on NWSRI Logic Model: Solid lines depict work/mapping that the participants of CWG/TWG have completed to date. Dashed lines depict work yet to come. For example, the activities in the dashed pink boxes are suggested outputs and they were captured during the workshop. They were not linked to a specific behaviour change or agreed upon as priority communication projects.

Note that there is not an Environmental Condition with a **C** label as it was merged with **B** during the second workshop. There is also not an Environmental Condition with a **G** label, as the behaviour changes were moved under the other various environmental conditions.

Remember to think of the arrows forming an IF/THEN statement. For example:

IF we 'work with First Nations to increase knowledge and support of mechanisms and methods that reduce harm to sturgeon' THEN we will see an 'increase in the use of selective fishery methods' (A-4).

IF we see an 'increase in the use of selective fishery methods' THEN we will see a 'decrease in the number of incidental adult mortalities' (A-5) and an 'increase in the sturgeon population numbers' (A).

IF we see an 'increase in the sturgeon population numbers' (A) THEN we will be successfully and effectively moving towards our ultimate goal to have a 'self-sustaining Nechako white sturgeon population in a healthy and productive ecosystem'.

Self Sustaining Nechako White Sturgeon

NWSRI:
Ultimate
Goal

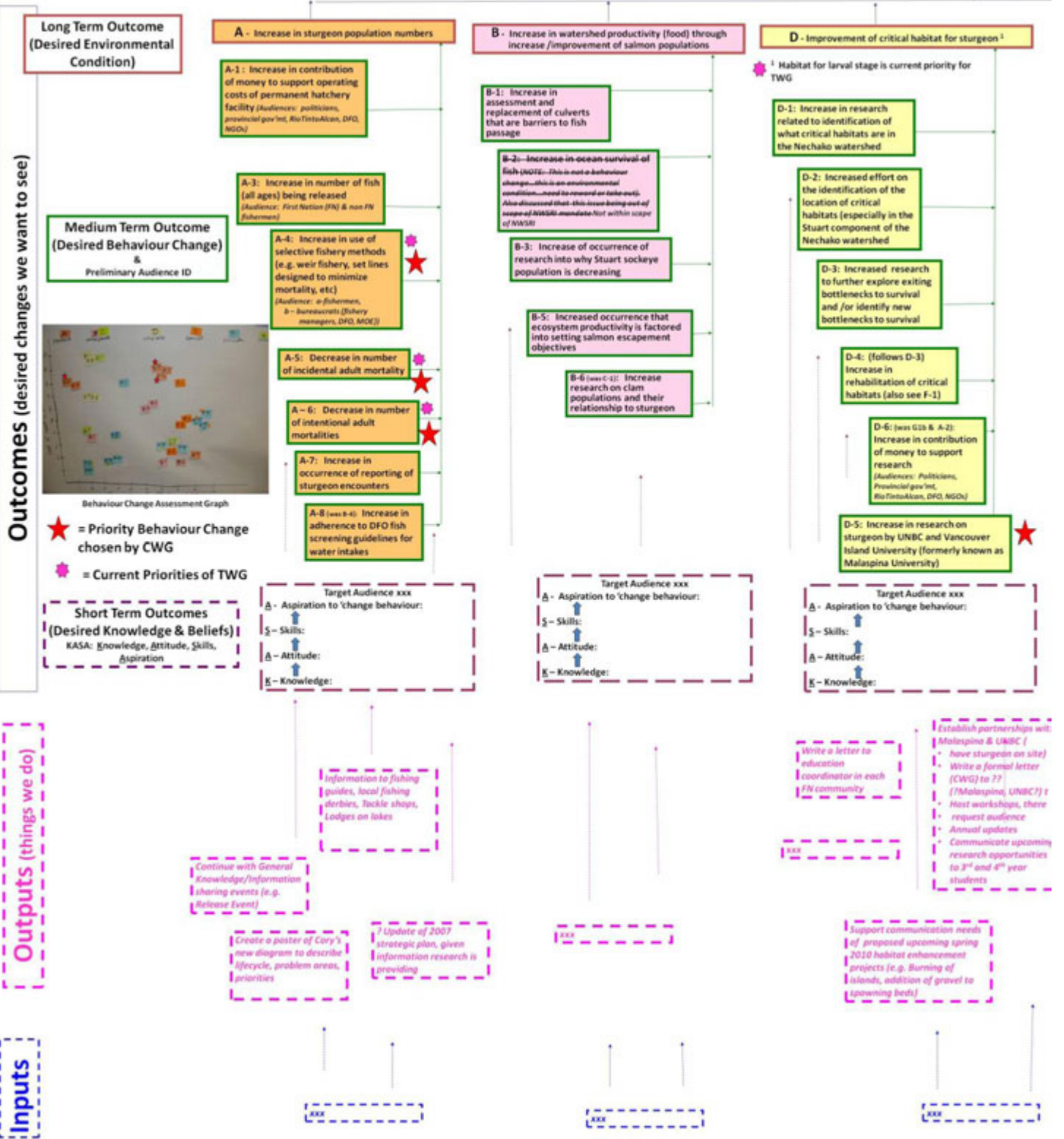


Figure 1: Part 1 (left half) of NWSRI Logic Model (January 12, 2010)

Population in a Productive & Healthy Ecosystem

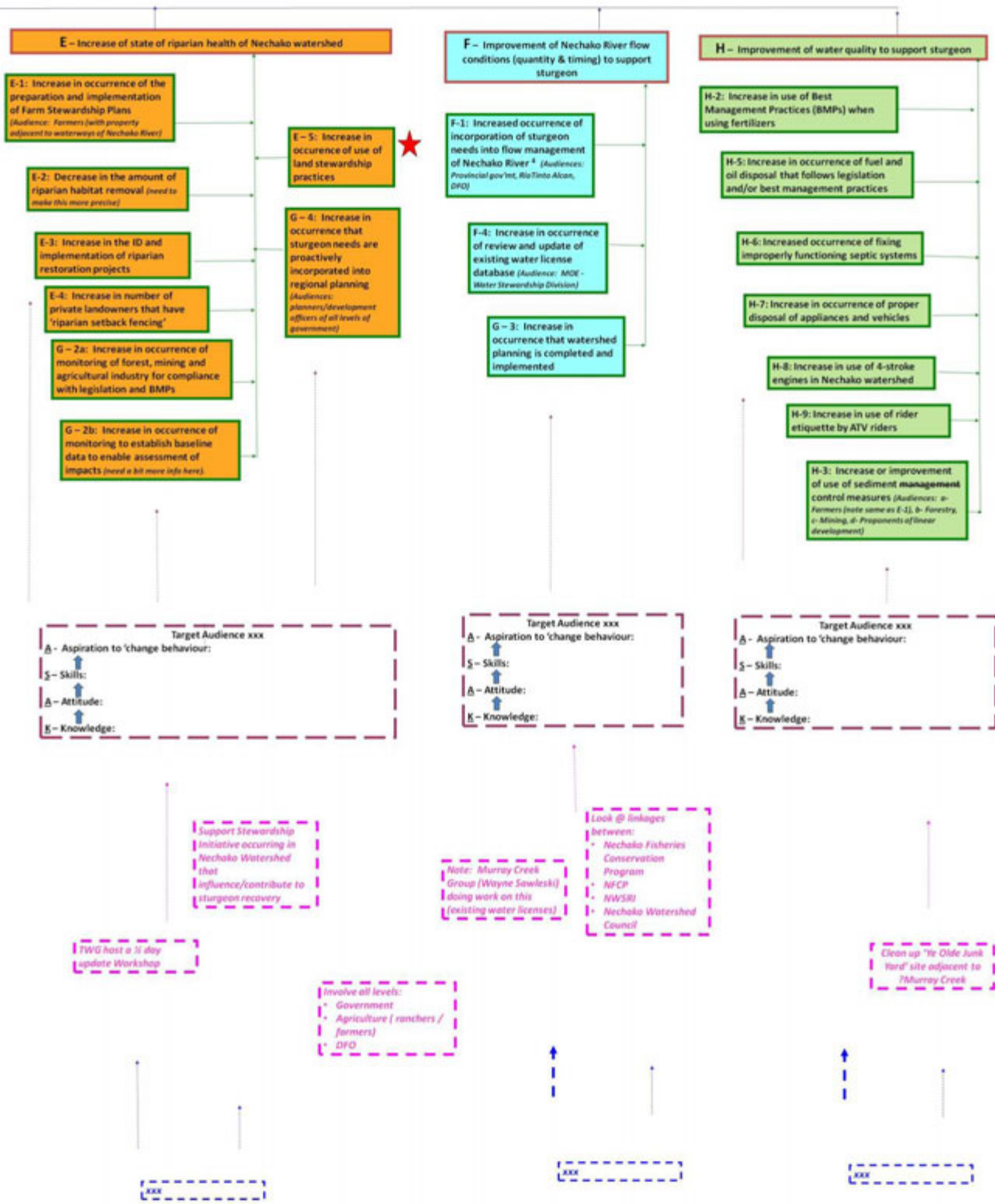


Figure 2: Part 2 (right half) of NWSRI Logic Model (January 12, 2010)

TABLE 2 - SUMMARY OF 'DESIRED ENVIRONMENTAL CONDITIONS' AND 'DESIRED BEHAVIOUR CHANGES' IDENTIFIED BY CWG

TABLE 2	
Summary of 'Desired Environmental Conditions' and 'Desired Behaviour Changes' Identified by CWG	
Desired Environmental Condition (Long Term Outcome)	Desired Behaviour Change (Medium Term Outcome)
A - Increase in sturgeon population numbers	A-1 : Increase in contribution of money to support operating costs of permanent hatchery facility (Audiences: politicians, provincial government, RioTintoAlcan, DFO, NGOs)
	A-2: now D-6
	A-3: Increase in numbers of fish (all ages) being released (Audiences: First Nation (FN) and Non-FN fishers)
	A-4: Increase in use of selective fishery methods (e.g. weir fishery, set lines designed to minimize mortality, etc.) (Audiences: Fishermen, fishery managers {DFO, MOE})
	A-5: Decrease in number of incidental adult mortalities
	A-6: Decrease in number of intentional adult mortalities
	A-7: Increase in occurrence of reporting of sturgeon encounters
	A-8 (was B-4): Increase in adherence to DFO fish screening guidelines for water intakes
B – Increase in watershed productivity (food) through increase/improvement of salmon populations	B-1: Increase in assessment and replacement of culverts that are a barrier to fish passage
	B-2: omitted
	B-3: Increase of occurrence of research into why Stuart sockeye population is declining
	B-4: now A-8
	B-5: Increased occurrence that ecosystem productivity is factored into setting salmon escapement objectives
	B-6 (was C-1): Increase research on clam populations and their relationship to sturgeon
C – (merged with B)	
D – Improvement of critical habitat for sturgeon	D-1: Increase in research related to identification of what critical habitat are in the Nechako watershed
	D-2: Increased effort on the identification of the location of critical habitats (especially in the Stuart component of the Nechako watershed)
	D-3: Increased research to further explore existing bottlenecks to survival and/or identify new bottlenecks to survival
	D-4 (follows D-3): Increase in rehabilitation of critical habitats (also see F-1)
	D-5: Increase in research on sturgeon by UNBC and Vancouver Island University (formerly known as Malaspina University)
	D-6 (was A-2): Increase in contribution of money to support research (Audiences: politicians, provincial government, RioTintoAlcan, DFO, NGOs)

TABLE 2
Summary of ‘Desired Environmental Conditions’ and ‘Desired Behaviour Changes’ Identified by CWG

Desired Environmental Condition (Long Term Outcome)	Desired Behaviour Change (Medium Term Outcome)
E – Increase of state of riparian health of Nechako watershed	E-1: Increase in occurrence of the preparation and implementation of Farm Stewardship Plans (Audience: farmers with property adjacent to waterways of Nechako watershed)
	E-2: Decrease in the amount of riparian habitat removal
	E-3: Increase in the ID and implementation of riparian restoration projects
	E-4: Increase in number of private land owners that have ‘riparian set back ‘ fencing
	E-5: Increase in lands stewardship practices
	G-2a (moved under E): Increase in occurrence of monitoring of forest, mining and agricultural industry for compliance with legislation and Best Management Practices (BMPs)
	G-2b (moved under E): Increase in occurrence of monitoring to establish baseline data to enable assessment of impacts
	G-4 (moved under E): Increase in occurrence that sturgeon needs are proactively incorporated into regional planning (Audiences: planners, development officers at all levels of government)
	F – Improvement of Nechako River flow conditions (quantity and timing) to support sturgeon
F-2: Increase in occurrence of review and update of existing water license database (Audience: MOE-Water Stewardship Division)	
G-3 (moved under F): Increase occurrence that watershed-based planning is completed and implemented	
G – (merged with various other Env. Conditions)	n/a
H – Improvement of water quality to support sturgeon	No H-1
	H-2: Increase in use of Best Management Practices (BMPs when using fertilizers
	H-3 Increase or improvement of use of sediment control measures (Audiences: farmers, forestry, mining, proponents of linear development)
	No H-4
	H-5: Increase in occurrence of fuel and oil disposal that follows legislation and/or BMPs
	H-6: Increase in occurrence of fixing improperly functioning septic systems
	H-7: Increase in occurrence of proper disposal of old appliances and vehicles
	H-8: Increase in use of 4-stroke engines in watershed
	H-9: Increase in use of rider etiquette by ATV riders.

ASSESSMENT EXERCISE

After the Ultimate Goal, Long Term Environmental Condition and Medium Term Desired Behaviour Changes were identified, the group assessed the desired behavior changes. The group used its collective knowledge to decide where on the Behaviour Change Assessment Graph (Figure 3) each behaviour change should be placed, relative to each other.

The top-right quadrant of the graph highlights the behaviour changes that could result in the 'biggest bang for buck'. These may be the ones a group decides to focus on. However, if a group feels it needs an easy win, it may want to choose a behaviour change that will have high participation, but not necessarily the greatest impact on achieving the long term outcomes (Desired Environmental Condition).

The resultant graph completed by the CWG is shown in Figure 4.

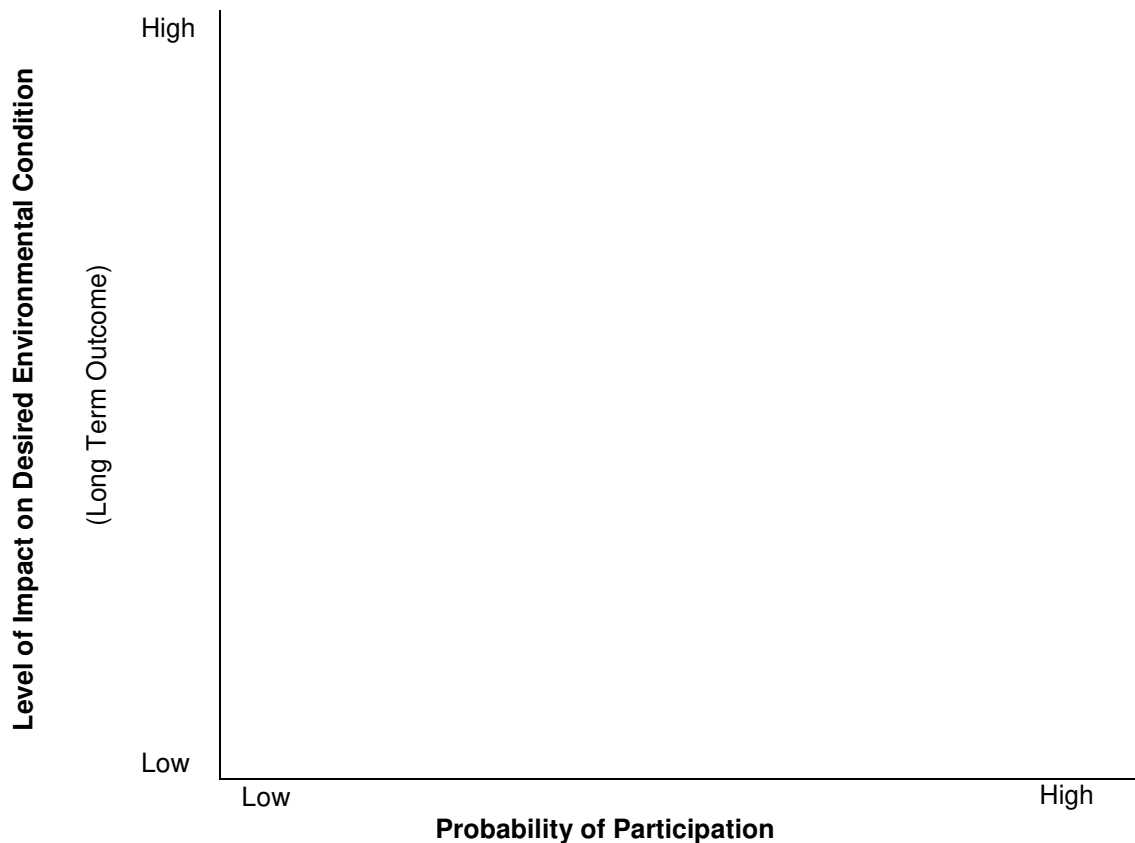


Figure 3 – Behaviour Change Assessment Graph

Figure 4 - Photo of Behaviour Change Assessment Graph completed by CWG

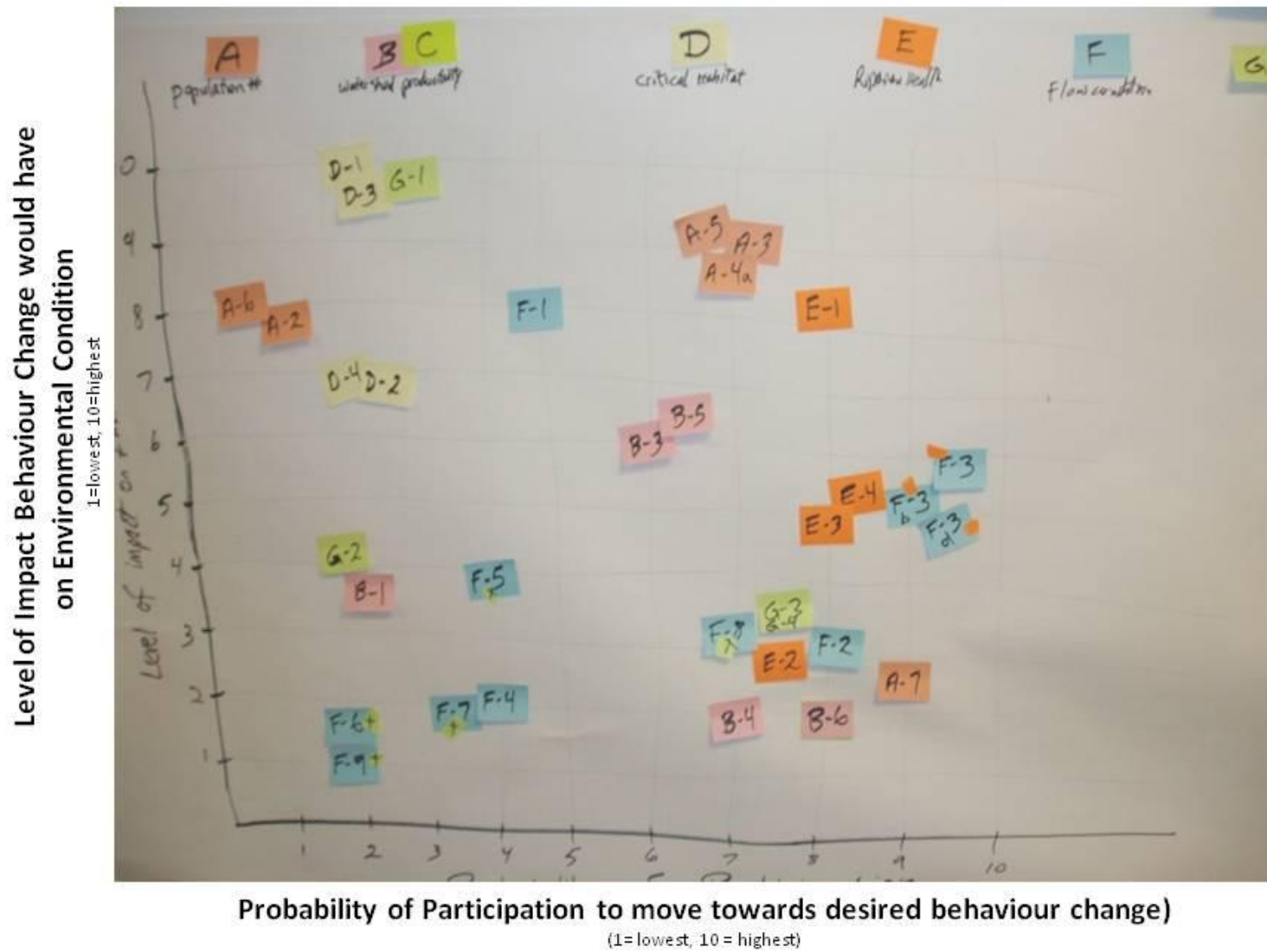


TABLE 3 - PRIORITIZATION OF BEHAVIOUR CHANGES & ISSUES IMPORTANT TO CWG

The following is the list of priority behaviour changes as identified by the CWG:

TABLE 3	
Prioritization of Behaviour Changes and Issues Important to CWG	
Desired Environmental Condition (Long Term Outcome)	Desired Behaviour Change (Medium Term Outcome)
A - Increase in sturgeon population numbers	A-4 Increase in use of selective fisheries methods
	A-5 Decrease in numbers of incidental mortality (bi-catch in FN gill nets and/or set lines)
	A-6 Decrease in number of intentional mortalities
D - Improvement of critical habitat for sturgeon <i>(Note: Habitat for larval stage is current priority for TWG)</i>	D-5 ³ Increase in research on sturgeon by University of Northern British Columbia (UNBC) and Vancouver Island University (formally known as Malaspina University)
E - Increase state of riparian health of Nechako watershed	E-5 ⁵ Increase in land stewardship practices

³ Desired Behaviour Changes D-5 and E-5 were added to the logic model after the assessment graph was completed and were not part of the assessment exercise. Thus, they do not appear on the graph in Figure 4.

APPENDIX 4 – INFORMATION USED TO GUIDE THE IDENTIFICATION AND ASSESSMENT OF PRIORITY OF COMMUNICATION PROJECTS

The following documents, criteria, concepts, tools and information was used to guide the identification of recommended communication projects.

The text in this appendix in **red font** is the code that reflects a specific component. These red codes were used in the summary Table 6 in Appendix 6 that documents the assignment of a score. This score was used to aid in the prioritization of projects.

1 - FEDERAL RECOVERY PLAN FOR WHITE STURGEON (TABLE 4)

Listed below in Table 4 are the strategies/approaches identified for the Nechako white sturgeon population to meet recovery objectives in the federal 'Recovery Strategy for White Sturgeon' (National Recovery Team for White Sturgeon 2009). Further actions associated with these strategies are found in Table 5 (pages 49-51) of this document.

Priority	Strategy
Necessary (Nec)	A - Meet or exceed recovery population targets within specified timeframe.
Necessary (Nec)	B - Protect critical habitats
Necessary (Nec)	C - Restore natural recruitment
Necessary (Nec)	D - Clarify and mitigate threats
Primary (Pri)	E - Address information gaps that inhibit conservation of white sturgeon.
Primary (Pri)	F - Increase stakeholder and general public awareness of white sturgeon and its conservation needs.
Primary (Pri)	G - Restore recruitment in dam affected populations
Secondary (Sec)	H - Maintain and where necessary restore ecosystem functions relevant to white sturgeon
Secondary (Sec)	I - Implement the recovery strategy

2 - PROVINCIAL RECOVERY PLAN FOR NECHAKO WHITE STURGEON

The following are the priority recovery activities as identified in the provincial recovery plan “ Recovery Plan for Nechako White Sturgeon” (Nechako White Sturgeon Recovery Initiative 2004).

1. Conservation Fish Culture

Short Term (TWG lead):

- Key NSWRI priority
- to preserve the remaining population diversity in absence of juvenile recruitment
- if such a conservation fish culture program is not immediately implemented, little hope for survival of Nechako White Sturgeon population (Anonymous 2007)

2. Habitat Requirements, Recruitment & Restoration Activities

Medium Term (TWG lead):

- The objectives are to determine the cause of decline and correct it such that works will result in the restoration of natural recruitment. Looking at:
 - Water Management (flow)
 - Water Quality (temperature, turbidity)
 - Geomorphological changes of Nechako River (habitat ID)
 - Population assessment, monitoring and research

3. Stewardship, Outreach and Harm Reduction

Ongoing (CWG lead)

- to support short and medium term efforts of TWG

3 - PRIORITY BEHAVIOUR CHANGES AS IDENTIFIED BY THE COMMUNITY WORKING GROUP (TABLE 5)

Table 5 summarizes the priority behaviour changes as identified by the CWG:

TABLE 5 – Priority Behaviour Changes as Identified by the CWG	
Desired Environmental Condition (Long Term Outcome)	Desired Behaviour Change (Medium Term Outcome)
A - Increase in sturgeon population numbers	A-4 Increase in use of selective fisheries methods
	A-5 Decrease in numbers of incidental mortality (bi-catch in FN gill nets and/or set lines)
	A-6 Decrease in number of intentional mortalities
D - Improvement of critical habitat for sturgeon <i>(Note: Habitat for larval stage is current priority for TWG)</i>	D-5 Increase in research on sturgeon by University of Northern British Columbia (UNBC) and Vancouver Island University (formally known as Malaspina University)
E - Increase state of riparian health of Nechako watershed	E-5 Increase in occurrence of use of land stewardship practices

4 - CURRENT TWG PRIORITIES

1. Preserve and retain genetic breadth of population (Conservation Hatchery and Elimination of unnatural adult & sub-adult mortality)
2. Water flow (velocity) sensitive to critical needs of sturgeon (Habitat Research/ Mitigation)
3. Critical habitat requirements for larval stage (Habitat Research / Mitigation)

5 - CARRIER SEKANI TRIBAL COUNCIL - HARM REDUCTION PROJECTS

The following are the activities that have been the focus of the harm reduction projects completed by the Carrier Sekani Tribal Council – Fisheries Program (Carrier Sekani Tribal Council 2006;2007, Toth and Shepert 2007, Carrier Sekani Tribal Council 2008).

Activity 1 (Act.1)– Information Dissemination

Objective: Info to CSTC member communities, individuals regarding status of Nechako White Sturgeon, recovery initiative, impact of FN fishery. Note focus Year 1 & 2 (2004 & 2005) for community members and in Year 3 2006 on community leaders, community catch monitors & fisher families.

Activity 2 (Act.2)– By-Catch Reporting/Monitoring

Objective: Through community Catch Monitors, establish and maintain documented reporting mechanisms within each CSTC member community (degree of sturgeon by-catch occurring, assessment of by-catch impacts, to collect sample from any mortalities)

Activity 3 (Act.3)– Promoting Harm Reducing Methodologies

Objective: Promote mechanisms and methods to reduce harm to white sturgeon by regular checking of gillnets, safe release of by-captured sturgeon, promotion of alternative fishing methods (selective fishery)

Activity 4 (Act.4)- Facilitating Selective Fishery Options

Objective: Facilitate a transition of existing food, social and ceremonial (FSC) sockeye fisheries towards more selective means

Community-based Social Marketing

In addition, at the appropriate time, concepts and tools of Community-Based Social Marketing (McKenzie-Mohr and Smith 1999) and Tools of Behaviour Change (Communication/Feedback, Commitments, Prompts, remove Barriers, provide Incentives) were incorporated into the development of the communication plan.

Community-based Social marketing (CBSM) differs from convention marketing in that it involves a planning process that starts with peoples behaviours, and then works backwards, using audience research and a mix of behavior change tools to guide the selection of the most appropriate tactic (communication project) suite to successfully achieving a desired behavior change (McKenzie-Mohr and Smith 1999). In order to achieve actual behavior change, it is generally agreed that knowledge alone will not generally result in a behaviour change. Individuals need to be at a certain state of 'knowledge and beliefs' in order to do something different. For example, they need knowledge, the right attitude, appropriate skills and the aspiration to change all in place before it is possible to change behaviour. In addition, to increase likelihood of successful, it may be necessary to remove barriers and promote the benefits of a desired behaviour change. Historically, it is the mistake of many resource managers to provide only knowledge and assume that will result in a desired behaviour change.

The Typical 10

It is important to realize that within any group or target audience, people will generally be initially represented by a cross section of 'types' of people. These include persons who will be either supportive, persuadable, apathetic, or opposed to the behaviour change that you desire. Please see Appendix 8 for more information.

Audience Research

There are a number of ways to consider conducting audience research. These have been listed in Appendix 8. The method chosen will depend on scope of project, what audience research you already have in hand, and what sort of funds you have to complete task.

Existing Audience Research use to inform communication plan

During the 09-10 fiscal year, NWSRI was fortunate to have parallel funding for the delivery of information sessions in First Nation and regional communities. As such, these sessions were used not only to provide knowledge and increase awareness of sturgeon biology and recovery activities, but also as an opportunity to complete a low level of audience research to:

- find out existing state of knowledge, attitude, skills, aspirations,
- identify barriers to change,
- identify possible incentives to promote desired behaviour change,
- what opportunities we might be able to realize to the advantage of recovery efforts,
- test and adapt messaging,
- collect ideas for activities/products,
- collect ideas on frequency and type of feedback, and
- find out if there were any individuals could perhaps become local contacts/champions.

This information can be found the document 'Summary of white sturgeon outreach and information sessions delivered in First Nation and regional communities in the Nechako and Stuart watersheds' (Sulyma 2010).

In addition, a review of any pertinent NWSRI documents was completed to see what sort of data was available on target audiences. Notes were also kept throughout the preparation phase of the communication plan around perspectives⁴ on different audiences.

7 - EXISTING ACTIVITY/PRODUCT, EXISTING PARTNERSHIPS, POTENTIAL FOR NEW PARTNERSHIPS, AND OPPORTUNITIES

Other things that were also considered when deciding on communication projects include:

- building on existing activities or product,
- existing partners,
- the potential for establishing new partnerships, and
- if there were opportunities that could be realized to the advantage of the NWSRI (e.g, community events, meetings, AGMs of FNs or interest group, etc,).

⁴ For example, perspectives shared during workshops, meetings or conversations

APPENDIX 5 – OUTLINE FOR COMMUNICATION PROJECT DESIGN AND EVALUATION

Project Name:

Lead:

Communication Project Number:

Start Date:

Target Finish Date:

Desired Environmental Condition (Long Term Outcome):

Desired Behaviour Change (Medium Term Outcome):

Target Audience:

From any existing audience research information, for the target audience, what is the current level of:

- Knowledge:
- Attitude:
- Skills/Infrastructure:
- Aspiration:

Are there any known barriers?

Are there any ideas for incentives that would promote a desired behaviour change?

Is there a respected individual within this audience who is on side and may be interested in helping?

What 'changes' (outcomes) are you hoping to see?

		For the audience, describe the change you hope to see.	Evaluation: Targeted level/ degree of change
Short Term Outcomes (Knowledge & Beliefs)	Desired <u>K</u> nowledge		
	Desired <u>A</u> ttitude		
	Desired <u>S</u> kills/ Infrastructure		
	<u>A</u> spiration to change		
Medium Term Outcomes	Desired Behaviour Change		

Key Themes (up to a maximum of 4) and associated messages for each theme. Themes are the underlying idea or set of ideas to be communication to the target audience. Use these themes to guide the content and power of the message.

Key Theme	Key Messages for each Theme
Key Theme 1	Key message 1 Key message 2
Key Theme 2	Key message 1 Key message 2
Key Theme 3	Key message 1 Key message 2
Key Theme 4	Key message 1 Key message 2

Communication Principles to embody within this project (see list in Appendix 9) and rational for why these were selected

Communication Principle	Reason for focus on this principle

What are you going to do? (e.g. What ‘tools of Behaviour Change’ are you going to use?):

Given this information, what would the best one or combination of ‘tools of behaviour change’ to use? (please see Appendix 8)

What opportunities can be used/realized to increase the likelihood of achieving desired short term and medium term outcomes as listed above?

Who will deliver the message? Why?

If relevant to project, what is the best timing and location for delivery?

What are the key themes and messaging style (given all of information summarized above):

Through the delivery of this project, what barriers can be removed to improve likelihood of achieving desired outcomes?

What incentives can be offered along with this project to provide to encourage desired outcomes?

Partners:

What existing and/or new partners can NWSRI collaborate with to deliver this project? Do we have a champion who can help (perhaps deliver the message)?

Evaluation:

***Efficiency Evaluation** - How will you measure your efficiency (what you did)?*

***Effectiveness Evaluation** – How will you measure if you achieved the targeted level of change and thus, move towards achieving your desired outcomes?*

Technique/Methodology (e.g. paper survey, phone survey, sampling, reporting, etc):

When will the evaluation occur?

Who will oversee the evaluation component of the project (implementation/collation/analysis)?

How will evaluation be reported out and to whom?

Assuming targeted level of changes is achieved, what is the 'next phase/project' that will build on the success of this project?

Budget:

Consider the following components of the project when preparing a project budget:

- Who will be the overall coordinator of the project?
- Will new or additional audience research need to be completed? If so, how will this be done? Who will do it?
- Who will implement the various components of the project?
- Who will develop and or produce/publish and required products
- Will there be any venue or food costs?
- How will Promotion and Advertising occur and will there be any development and costs associated with this?
- Travel costs?
- Evaluation costs.
- Reporting Out (production of written summary of project and evaluation of whether or not desired outcomes were met)

APPENDIX 6 – RATIONALE FOR ASSIGNMENT OF ‘SCORE’ TO PROJECTS (TABLE 6)

The following table summarizes the criteria used to assign a score to each recommended communication projects. A weighted value was assigned to each criterion. The score was used to assist with the prioritization of communication projects (e.g. the higher the score, the higher the potential placement on the priority list). For a description of each criteria and the context of the coding below in **red font**, please see Appendix 4.

TABLE 6 – Assignment of ‘Score’ to Projects													
Communication Project Number	Project/Activity/Product	Target Audience/s	Federal Recovery Plan Priority (1.0.pt/✓ for Nec, 0.5 pt/✓ for Pri)	Provincial Recovery Plan Priority (1pt/✓)	Current Priority of TWG (2pt/✓)	Priority Behaviour Change ID’ed by CWG (2pt/✓)	Consistent with CSTC Harm Reduction Reports. (2pt/✓)	Existing Activity/Product (0.5pt/✓)	Idea generated by target audience (1pt/✓)	Existing Partnership with funding/s (2pt/✓)	Pot. New Partnership with funding (2pt/✓)	Opportunities (0.5 pt/✓)	Score
5a	Sturgeon Quick Facts - FN	First Nations	✓ Pri-F	✓ 3	✓ 1	✓✓✓ A-4, A-5, A-6	✓ Act.1		✓				12.5
5b	Sturgeon Quick Facts – Gov’t	Provincial gov’t Executive & Ministers office	✓✓ Nec-A Pri-F	✓ 3	✓ 1								4.5
5c	Sturgeon Quick Facts - General	General Public, Municipal Gov’t, NGO’s	✓ Pri-F	✓ 3	✓ 1	✓✓ A-5, A-6			✓				8.5
5d	Sturgeon Quick Facts – Youth under 10	Youth 10 years of age and younger	✓ Pri-F	✓ 3									1.5

TABLE 6 – Assignment of ‘Score’ to Projects

Communication Project Number	Project/Activity/Product	Target Audience/s	Federal Recovery Plan Priority (1.0.pt/✓ for Nec, 0.5 pt/✓ for Pri)	Provincial Recovery Plan Priority (1pt/✓)	Current Priority of TWG (2pt/✓)	Priority Behaviour Change ID'ed by CWG (2pt/✓)	Consistent with CSTC Harm Reduction Reports. (2pt/✓)	Existing Activity/Product (0.5pt/✓)	Idea generated by target audience (1pt/✓)	Existing Partnership with funding/s (2pt/✓)	Pot. New Partnership with funding (2pt/✓)	Opportunities (0.5 pt/✓)	Score
5e	Sturgeon Quick Facts – Youth 10 to 18	Youth between 11-18 yrs old	✓ Pri-F	✓ 3									1.5
7	Develop a campaign explore beneficial partnerships with high profile NGO groups	High profile NGO groups	✓ Pri-F	✓✓ ✓ 1 2 3	✓✓ ✓ 1 2 3								9.5
8	Develop a campaign to update government on status of recovery initiative and current risks.	Provincial gov't (executive & minister's office)	✓ Nec-A	✓ 1	✓✓ ✓ 1, 2 3			✓					8.0
9	Develop a campaign to solicit grad students from UNBC and Vancouver Island University to do research on sturgeon	University professors & grad students	✓✓ Pri-E Pri-F	✓✓ ✓ 1, 2 3	✓ 3	✓ D-5					✓		8.0
10	Develop and deliver a campaign to bring together local governments (municipalities and regional districts) in the Nechako watershed.	- Mayor & Council of each regional community, - Regional District reps	✓✓ Nec-A Pri-F	✓✓ 1 3	✓ 1								5.0

TABLE 6 – Assignment of ‘Score’ to Projects

Communication Project Number	Project/Activity/Product	Target Audience/s	Federal Recovery Plan Priority (1.0.pt/✓ for Nec, 0.5 pt/✓ for Pri)	Provincial Recovery Plan Priority (1pt/✓)	Current Priority of TWG (2pt/✓)	Priority Behaviour Change ID'ed by CWG (2pt/✓)	Consistent with CSTC Harm Reduction Reports. (2pt/✓)	Existing Activity/Product (0.5pt/✓)	Idea generated by target audience (1pt/✓)	Existing Partnership with funding/s (2pt/✓)	Pot. New Partnership with funding (2pt/✓)	Opportunities (0.5 pt/✓)	Score
11	Develop and deliver a campaign to bring together Chief and Council's of all First Nations in the Nechako watershed.	Chief and council's of all FN comm.	✓ Nec-A Pri-F	✓✓ ✓ 1, 2 3	✓ 1	✓✓✓ A-4, A-5, A-6	✓✓ ✓ Act.1 Act.2 Act.3 Act.4			✓		✓	20.5
14	Set up a Facebook site for NWSRI	All	✓ Pri-F	✓ 3			✓		✓			✓	4.5
15	TWG host a update ½ day Update Session for interested CWG, gov'mt, stakeholders, academia, public	Interested CWG, gov'mt, stakeholders , academia, public	✓ Pri-F	✓ 3			✓ Act.1		✓				4.5
16	Design and deliver a 'Riverside Session/Assembly' for FN fisher families and community leaders	FN Fisher families, Chief & Council	✓ Nec-D	✓ 3	✓ 1	✓✓✓ A-4, A-5 A-6	✓✓ ✓ Act.1 Act.2 Act.3		✓	✓		✓	19.0
17	Inform target audiences of habitat restoration project in Nechako River	Vanderhoof, all FN communities, recreational users of Nechako River, FSJames	✓ Pri-F	✓ 3	✓ 2	✓ 3	✓ Act.1						8.0
18	Create video 'How to release a live sturgeon from a gill net'	Fisher families	✓ Nec-D	✓ 3	✓ 1	✓ A-5	✓✓ Act.1 Act.3		✓	✓		✓	13.0

TABLE 6 – Assignment of ‘Score’ to Projects

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19	Develop a Sturgeon Boat Kit	Fisher families	✓ Nec-D	✓ 3	✓ 1	✓ A-5	✓✓ Act.1 Act.3		✓	✓		✓	13.0
20	Support work of CSTC to find ways to compensation FN fishers for gill net damage sustained when releasing live sturgeon from gillnet	Fisher families	✓ Nec-D	✓ 3	✓ 1	✓ A-5	✓ Act.3	✓	✓				9.0
21	Teach FN people how to mend a damaged gill net	Fisher families and members of the community	✓ Nec-D	✓ 3	✓ 1	✓ A-5	✓ Act.3		✓				7.5
22	Continue to work with and support CSTC on planning and implementation of selective fishery event (beach seine) at Nadleh	Fisher families, members of community, Chief & Council	✓✓ Nec-D Pri-F	✓ 3	✓ 1	✓✓✓ A-4, A-5 A-6	✓✓ ✓ Act.1 Act.3 Act.4	✓		✓		✓	19.0
23	Continue to bring to members of FN communities the knowledge and awareness of the status of Nechako white sturgeon	Members of FN communities	✓✓ Nec-D Pri-F	✓✓ 1 3	✓ 1	✓✓✓ A-4, A-5 A-6	✓✓ Act.1 Act.3	✓	✓	✓		✓	19.0
24	Collaboratively designed with each FN community a ‘community event’ (e.g. River and Fish Festival) to be held in each FN community	Members of each FN community	✓✓ Nec-D Pri-F	✓✓ 1 3	✓ 1	✓✓✓ A-4, A-5 A-6	✓✓ ✓ Act.1 Act.3 Act.4		✓			✓	18.5

TABLE 6 – Assignment of ‘Score’ to Projects

Communication Project Number	Project/Activity/Product	Target Audience/s	Federal Recovery Plan Priority (1.0.pt/✓ for Nec, 0.5 pt/✓ for Pri)	Provincial Recovery Plan Priority (1pt/✓)	Current Priority of TWG (2pt/✓)	Priority Behaviour Change ID'ed by CWG (2pt/✓)	Consistent with CSTC Harm Reduction Reports. (2pt/✓)	Existing Activity/Product (0.5pt/✓)	Idea generated by target audience (1pt/✓)	Existing Partnership with funding/s (2pt/✓)	Pot. New Partnership with funding (2pt/✓)	Opportunities (0.5 pt/✓)	Score
25	Support ongoing projects with agricultural sector stakeholder groups in Vanderhoof area	Agricultural sector	✓✓ Nec-D Pri-F	✓✓ 1 3		✓ E-5		✓	✓	✓		✓	9.0
26	Work with Parks Canada (Fort St. James National Historic Site) to incorporate sturgeon information at site.	All	✓ Pri-F	✓✓ 1 3		✓, ✓ A-5 A-6			✓		✓	✓	9.0
27	Engage community of Fraser Lake community	Mayor & Council and Residents of Fraser Lake	✓ Pri-F	✓✓ 1 3		✓✓ A-5 A-6						✓	7.0
28	Develop and implement a web-based ‘Adopt a Sturgeon’ program	All	✓✓ Nec-A Pri-F	✓✓ 1 3	✓ 1							✓	6.0
29	Develop a form (paper and web-base) to allow 24/7 reporting of sturgeon sightings and encounters	All	✓✓ Nec-B Pri-F	✓✓ 2, 3			✓ Act.1					✓	5.5
30	Paint sturgeon on street drains (like salmon)		✓ Pri-F	✓ 1				✓	✓			✓	3.5

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31a 31b	Save Our Sturgeon Festivals (juvenile release)	FN communities, local gov’t, stakeholder grps, NGOs & residents from regional communities, academia	✓✓ Nec-A Pri-F	✓✓ 1 3	✓ 1	✓✓✓ ✓✓ A-4, A-5, A-6, D-5, E-5	✓✓ Act.1 Act.3	✓		✓		✓	22.0
32	Design and construction of smaller stand-alone NWSRI display	All	✓ Pri-F	✓ 3			✓✓ Act.1 Act.3		✓				6.5
33	Create effective ‘prompts’ for fisher families	FN fisher families	✓✓ Nec-D Pri-F	✓ 3	✓ 1	✓ A-5	✓ Act.3					✓	8.5
34	Partner with each First Nation community to have local artists create art/song/dance that tells the story of sturgeon & their culture	First Nation communities	✓ Pri-F	✓ 3	✓ 1	✓✓✓ A-4, A-5 A-6	✓✓ ✓ Act.1 Act.3 Act.4		✓			✓	17.0
35	Engage city of Prince George	Mayor & Council and residents of PG	✓ Pri-F	✓ 3									1.5
36	Develop a form (paper and web-based) to capture / document stories about sturgeon.	All	✓✓ Nec-B Pri-F	✓ 3			✓ Act.1						4.0
37	Design and develop prompts to remind people about sturgeon	All	✓✓ Nec-D Pri-F	✓ 3					✓			✓	3.5

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38	Continue to put up NWSRI signs at strategic locations.	Fishers, FN and non-FN, recreationalists,	✓ Nec-D Pri-F	✓ 3	✓ 1	✓ A-5	✓ Act.1 Act.3	✓		✓		✓	13.0
39	Develop a form (paper and web-based) for individual or groups to make ‘written commitments’ of some nature to the NWSRI	All	✓ Pri-F	✓ 3		✓ ✓ ✓ A-4 A-5 A-6 E-5	✓ ✓ ✓ Act.1 Act.3 Act.4					✓	16.0
40	Develop school program were youth (Grade 9-12) teach younger kids (grades grades 2-6)	Youth (Grade 9-12)	✓ Pri-F	✓ 3		✓ ✓ ✓ A-4 A-5 A-6	✓ Act.1 Act.3	✓				✓	6.5
41	Seek permission to join in during a FN Elder meeting	FN Elders	✓ Nec-B Pri-F	✓ 3	✓ 1	✓ ✓ ✓ A-4 A-5 A-6	✓ Act.1 Act.3					✓	14.5
42	Develop within each FN community a process to capture elder knowledge about sturgeon		✓ Nec-B Pri-F	✓ 3	✓ 1	✓ ✓ ✓ A-4 A-5 A-6	✓ Act.1 Act.3		✓			✓	15.5
43	Establish a NWSRI Compensation Program	First Nation fisher families	✓ Nec-D	✓ 1	✓ 1	✓ A-5							6.0
44	Explore opportunities and partnership with Spruce City Wildlife Hatchery group	Spruce City Wildlife	✓ Nec-A	✓ 1	✓ 1			✓				✓	5.0

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45													
46													
47													
48													
49													
50													

The following information has been excerpted from the document “Fostering Stewardship Behaviour: Outreach Project Planning Workbook” (Hubert et al. 2009), prepared by Stewardship Outreach Team of Ministry of Environment.

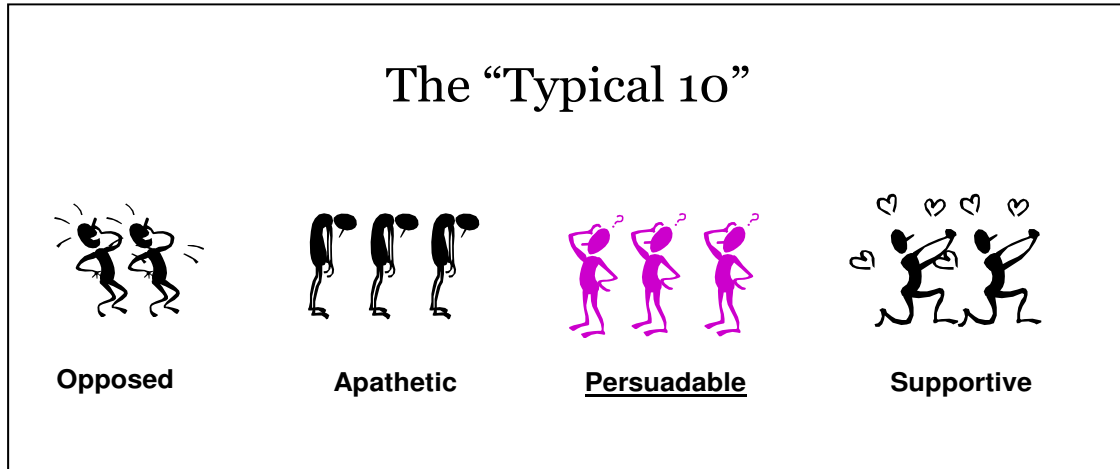
Social science research is a very good way to understand our audiences better. With the identification of a target audience, social science research becomes much more tangible and affordable.

There are a number of social science research tools to consider using:

- 1) **Literature Review:** A literature review can provide you with a significant amount of knowledge. Consider looking at trade magazines, academic journals, grey literature, case studies from other regions, and books. For key pieces of information, consider contacting the author directly to get more details.
- 2) **Surveys:** Surveys are a great way to get a feel for the perspectives of a group of people. With the internet available, conducting surveys has become much easier and at a lower cost. Surveys can either be conducted in house, or contracted out. While contracting out increases costs, it provides the added benefit of expertise in survey methods. Check within your organization to see if there are personnel with survey skills.
- 3) **Focus Groups:** Focus groups are a great way to delve deeper into the perspectives of your target audience. The discussion at focus groups can help you test messaging, identify important pieces of information missed by your survey, and identify key strategies that might help you reach your goal.

The 'Typical 10' that make up an audience

Within your target audience, the "Typical 10" represents a cross section of the proportion people that would typically fall into one of four different levels of engagement.



Opposed: These people are completely opposed and may never change their attitudes (although they may change their behaviour if there is enough pressure from their peers). They are often non-compliant with regulations and have a vested interest in not changing their behaviour.

Apathetic: These people are not engaged and are unmotivated. They may be uninformed or perhaps have attempted to make the behaviour change in the past with negative results.

Persuadable: These people are open minded, open to change, but either do not know about the problem, don't know why it is important, don't know what to do, or are encountering a significant barrier preventing engagement.

Supportive: These are the people who are your supporters already. They may be early adopters.

Work to create social norms. Do this by strategically directing your messaging. The best segment to target are the 'Persuadables', where engagement is low, but the possibility to convert them to supporters is high. The reason this approach is important is because of the characteristics of human behaviour.

The supportive segment may already be working on addressing the issue. Peer driven initiatives are often very effective at changing behaviour. This group may need some additional support to reach the other segments.

Humans tend to behave in ways that are acceptable by the people around them. If we can get the persuadables on board, then we are moving towards the creation of a social norm. This new social pressure may convince the apathetic to consider the behaviour change again or for the first time.

As the apathetic begin to engage in the behaviour change, we begin to build up the social support that we need to achieve the necessary legislation to enforce the remaining opposed people.

As you can see, by taking this approach, we have effectively reduced our target audience from "the general public" to some key individuals within a small priority segment of our target audience. *That* is the power of social norms, and why it is such an important tool for stewardship outreach.

APPENDIX 8 – TOOLS OF BEHAVIOUR CHANGE

The following information has been excerpted from the document “Fostering Stewardship Behaviour: Outreach Project Planning Workbook” (Hubert et al. 2009), prepared by Stewardship Outreach Team of Ministry of Environment.

TYPES OF BEHAVIOUR CHANGE TOOLS

Knowledge Tools

- Education
- Interpretation
- Extension
- Communication and Feedback

Social Tools

- Commitments
- Prompts
- Incentives
- Norm Appeals

CHOICE OF BEHAVIOUR CHANGE TOOLS

The tools you choose may be influenced by audience. In some cases you may decide to segment the messages by:

- Primary target groups
- Other groups that can influence the target groups
- Stakeholders, and
- Internal

It is important that the approaches for messaging are pre-tested to ensure that they meet the needs of the audience and to guard against unforeseen negative reactions. In addition, they need to be assessed for their ability to meet outcomes.

KNOWLEDGE TOOLS:

These tools focus on peoples understanding. They are directed at the individual or group themselves. Knowledge tools can be used at many different points in the behaviour change process. The tool that is use will often depend upon the characteristic of the target audience.

EDUCATION

This is the most well known of the bunch and what organizations are typically most familiar with and focus on as their outreach project. While no one can deny the importance of education, it is only the first step in the behaviour change process. In addition, if other tools are not used in conjunction with Education, then it can be rendered entirely ineffective.

When to use education:

Education is an effective tool when a simple knowledge barrier is preventing your audience from behaving in a sustainable manner. Education is an effective tool when you are dealing with a large audience with diverse perspectives. It involves distributing the most basic details about the situation without assigning blame, making judgments, or promoting values. Education is in effect setting the stage for the tools of change that will directly contribute to the behaviour change. If education is used incorrectly, it can make the other tools ineffective.

Common ways that education is used incorrectly:

Wrong Messenger– if the audience does not trust the messenger, they will not trust the message

Advocacy hidden as education – once a message becomes political, then it connects with the values section of people’s brains and it makes it less likely that the information will be taken seriously.

It is not targeting the correct barrier – educating people that are already knowledgeable will get you nowhere. Don’t assume that a lack of behaviour change is due to a lack of knowledge.

Assuming that everyone needs to know – people are on a need to know basis, and many people simply do not need to know because they are already knowledgeable. Using education efficiently mean understanding who to target. There is no such thing as “The General Public”.

Education is a starting point. Once this foundation is set, you must move past it to the other barriers that are preventing behaviour change.

INTERPRETATION AND EXTENSION

Extension and Interpretation are very similar approaches, but with different audiences and different purposes. Essentially, these approaches are about packaging scientific or social information in a way that it is useful for the target audience.

Interpretation

In the case of interpretation, it means packaging the information in a way that it is palatable to a lay audience, often with the provision of behaviour options that people can take in response to the message. Park interpretation is a great example of this. Interpretation is a useful tool for instilling new values in the public.

When to use interpretation: This approach is great for expanding the prominence of a social value around an environmental issue. This approach can change of communities view issues to contribute to the development of social norms around what is right and what is wrong.

Extension

Extension is a similar approach, but for a very different audience. Extension involves packaging scientific information and making it useful for practitioners (such as farmers or foresters, or fishers). The information not only needs to be accurate, but provide options for the recipient of the message that addresses the operational barriers that the organization faces. Extension does not directly try to change values, but rather helps people make the correct behavioural choices based upon the best available science by providing them with the skills that they need to make the behaviour choices.

When to use extension: This approach is valuable for translating up to date scientific understanding into messaging that is useful for target audiences. Prime examples of this include forest practices, fishing practices, snowmobiling and ATVing, etc.

ONGOING COMMUNICATION AND FEEDBACK

Outreach does not end when the behaviour change occurs. In fact, this is only the beginning. Regular communication and feedback to your audience can accomplish two things:

- It allows you to demonstrate the positive results of their actions. People are more likely to repeat a behaviour *and* tell their peers to try the behaviour if they see positive results.
- It is a great way to learn more about the barriers to engaging in the behaviour so that you can make it easier for others.

If used effectively, communication can be a very useful tool to reinforce a message, facilitate continuous improvement, and help to foster social norms.

When to use communication and feedback: Communication should be used at any time when you need to connect or re-connect your target audience with the issue.

Things to consider:

- Make communication as closely connected to the behaviour as possible. What was the direct result of their actions? Abstract messages don't work.
- Use vivid language. People need to be able to connect emotionally with your message. Stay away from abstract concepts like "carbon footprint".
- Provide feedback at different levels (individual, group, community)

SOCIAL TOOLS:

Social norms are bar none the most powerful tool for motivating voluntary behaviour change. Human beings are social creatures and are constantly reacting to social dynamics throughout the day. The social tools available for outreach seek to capitalize on these forces and develop a social situation that facilitates the desirable behaviour change.

COMMITMENTS

People like to be viewed as honest and having integrity. People are much more likely to carry out their agreed upon activity if they have made a commitment. Commitments should be voluntary and written if possible. Commitments must also actively involve the person. They need to feel personally responsible for following through with the commitment. If they can pass blame for not meeting their commitments, then they are less likely to follow through.

When to use commitments: Commitments are useful to make a behaviour change a priority for people. Often people will believe a behaviour is important but will forget about it or have competing priorities. In other cases, people may know that it is the right thing to do, but will only feel compelled to do it if they are held accountable. It is much easier to behave in appropriately in private than in public. Commitments work well in conjunction with other tools.

PROMPTS

It is amazing how simply forgetting to do something can be a significant barrier. People develop patterns of doing things, using familiar tools, or taking ingrained approaches. They become unconscious of these patterns in their daily lives. Prompts are a simple tool to remind people at the correct time and place of the positive behaviour change that we would like to see them do. Prompts can be visual or auditory and come in many different forms. Prompts are not just materials, but can also be events, phone calls, etc.

Prompts should be:

- Noticeable and self-explanatory
- Close in space and time to the targeted behaviour
- Worded positively

When to use prompts: Prompts are an effective tool for forgetfulness and procrastination. They remind the person as closely as possible to the moment they make the behaviour choice.

INCENTIVES

Incentives are the carrots and sticks that we use to motivate behaviour. They can be positive (financial reward) or negative (speeding ticket). Incentives are financial or otherwise, to motivate people to perform a certain activity (very helpful when motivation to engage is low). Usually most effective when they are presented at the time the behaviour is to occur (pairing):

Incentives should be:

- Closely paired to the behaviour
- Visible

When to use incentives: Incentives should only be used when people already view a behaviour as desirable, feel they can engage in the behaviour but do not yet feel motivated to act, or are inhibited by an infrastructure barrier.

A warning about incentives: There are known negative consequences of using incentives. For one, negative incentives such as a fine can actually be used by your target audience to justify their behaviour. In these cases it is important to ensure the cost of the negative incentive is greater than the benefit of engaging in the negative activity.

In other cases, even positive incentives can foster cost/benefit thinking rather than a change in ethics. In these situations, behaviour change is only maintained as long as the benefit outweighs the costs.

NORM APPEALS

Ultimately everything we do should lead to the achievement of new social norms. But there are already social norm tools that are available to you, even before a behaviour is widely accepted or supported. Norm appeals can be a powerful way to spread a desired behaviour in a community. They play on a person's perception that behaving a certain way is "the right thing to do". Target innovators/leaders in a community/group to adopt behaviour and more and more people will change as it becomes socially unacceptable not to do the desired behaviour.

Norm appeals should be:

- Noticeable
- Explicit
- Worded positively (e.g. 'do this', instead of 'don't do this')
- Used in conjunction with commitments and incentives

When to use norm appeals: This tool is most effective if there are prominent leaders in a community who are either already practicing the behaviour you are promoting, or would be willing to consider the behaviour change. In some situations, huge dividends can be achieved by targeting prominent members of a community to come on side and become a spokesman for your cause. If prominent members of a community make a behaviour switch, then often many others will follow suit.

APPENDIX 9 – LIST OF SUGGESTED COMMUNICATION PRINCIPLES (TABLE 7)

TABLE 7 – List of Suggested Communication Principles	
Principle	Reason
Credibility	Without a credible communication approach, or credible communicators, individuals will simply not believe in the end goal.
To involve, not just inform	Promotes ownership of the program and a feeling of being a necessary part of the program
Trusted and respected communicators	If the target audience does not trust or respect the communicators, the messages may fall to deaf ears.
Face-to-face communication	Audience is involved, communication is two-way and provides a feedback mechanism
To avoid information overload	Too much information leads to confusion and irritation. Accurate and timely information is key.
Consistent messages	Inconsistency loses credibility in the program. Without consistency, audiences are confused and frustrated about what to expect.
To repeat messages and vary mechanism	The more ways a message can be communicated, the more likely it is to be internalized. Using different mechanisms ensures repetition without individuals 'switching off'.
To create demand: encouraging target audience to ask and look for further information, rather than the information being pushed at them	Ensures buy-in to the change.
Tailor communication to audience needs: give information that the audience wants, not what you want to tell	Make information 'real' to the audience. The audience is more likely to listen if the information is pertinent to their current frame of interest.
Central co-ordination	Ensures consistent approach.
Manage expectations	Encourages audience to believe in what you tell them. Preparing shows you understand their needs.
Listen and act on feedback	Encourages support in the approach by being responsive to the needs of the audience. Ensure approach meets the changing audience needs.