

**EBMWG Workshop on Schedules C/G
Socio-Economic Indicators**

Partner Implementation Workshop Notes

July 20, 2007

Disclaimer

This report was commissioned by the Ecosystem-Based Management Working Group (EBM WG) to provide information to support full implementation of EBM. The conclusions and recommendations in this report are exclusively the authors', and may not reflect the values and opinions of EBM WG members.

EBMWG Workshop on Schedules C/G Socio-Economic Indicators (AM05)
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SFU Harbour Centre

1. Introduction

- Opening comments were made by Alex Grzybowski, the facilitator. The purpose of the workshop is to review the socio-economic indicators contained in Schedules C and G of the agreements between the Province and First Nations. The information discussed at the workshop will be provided to LRF for their consideration. Additional objectives may be considered in G2G discussions. The purpose of the workshop is to provide information for the potential reconsideration of Schedules C and G.

2. Participants

Participant	Affiliation
Alex Grzybowski	EBMWG Director, Workshop facilitator
Terre Satterfield	EBMWG, Associate Professor, UBC
Cameron Brown	DSPs ¹ , Heiltsuk First Nation
David Flood	EBM implementation coordinator, Coast Forest Conservation Initiative (CFCI)
Ralph Matthews	SC ² , Professor of Sociology, UBC
Lloyd Juhala	CCPIMC ³ Chair
Tavis McDonald	NCPIMC ⁴ , BC Timber Sales (BCTS),
Wally Eamer	LRF, Nanwakolas Council
John Bolton	EBMWG, Heiltsuk First Nation
Rina Geimienhardt	DSPs, Forestry Manager, Heiltsuk Coastal Forest Products Ltd.
Glen Dunsworth	EBMWG, CFCI consultant
Amy Beetham	EBMWG, Ministry of Forests and Range (MFR)
Dorthe Jakobsen	SC, Integrated Land Management Bureau (ILMB)
Audrey Roburn	EBMWG, Rainforest Solutions Project (RSP)
Gerry Fraser	CCPIMC, International Forest Products (Interfor)
Darol Smith	NCPIMC Chair
Hans Granander	CCPIMC
Neil Philcox	SC, Workshop coordinator, RSP
Kelly Brown	DSPs, Heiltsuk First Nation
Keeva Kehler	Planning Officer, ILMB
Gord McGee	DSPs, ILMB
Shawn Morford	Consultant, Rubus EcoScience Alliance
Victor Cumming	Consultant, Rubus EcoScience Alliance

¹ Detailed Strategic Planning

² AM05 Steering Committee

³ Central Coast Plan Implementation Monitoring Committee

⁴ North Coast Plan Implementation Monitoring Committee

3. Consultants' Overview

- The consultants prepared a draft report for discussion at the workshop. They requested feedback on the content of the report prior to finalising it.
- It was pointed out that the requirement to link EBM principles directly to economic and social outcomes is a new idea that has not yet been done elsewhere. This task is grounded at some level in Schedules C and G.
- A question to consider is “Given a set of indicators what kind of data collection is required to go and get that information?”
- Shawn Morford gave a presentation to go over the report, entitled: “*Indicators of HWB on the North and Central Coast, Schedules C and G.*” (see Shawn’s presentation).

3.1. Developing Indicators:

- The consultants discussed that there are three different ways to develop indicators:
 - Literature reviews can inform indicators chosen;
 - Indicators can be developed at the community level, in a bottom up approach, based on local priorities and knowledge;
 - Combination of the two approaches can be adopted – a literature review on HWB and appropriate indicators gives some ideas and then the communities, stakeholders ground-truth those indicators.

3.2. Purpose of Project:

- The consultants discussed the purpose of the project – they were tasked with reviewing Schedules C and G and recommending a practical monitoring framework to allow the measurement of the potential impacts of EBM implementation.
- How does literature define HWB?
- The consultants identified a master list of indicators in addition to C and G indicators and tried to ascertain how well the schedules addressed the master list. It was noted that choosing indicators is about philosophy as much as it about science. They may be many different interpretations as to what important indicators might be to measure HWB.
- The consultants felt that the book entitled “*Ten Steps to a Results Based Monitoring and Evaluation System*”, by Kusek, John and Rist, Ray C. (2004) provides useful information for monitoring and recommended that interested parties read this.

3.3. General Discussion:

- *Question:* If you achieve all your indicator targets does that mean that you have achieved your objectives? Would people agree that HWB is improved? Do C and G really measure people’s well-being?
 - *Consultant response:* If people perceive their well-being is good, then it is. But you can measure objective things to indicate objectively if HWB is present. There are interrelated aspects to the elements of HWB. For example, someone’s health status may affect their education opportunities, which in turn affects their economic situation.
- *Question:* If a community’s perception of their well-being and the objective statistics are not consistent – how do you deal with that?
 - *Discussion:* There are subjective versus objective measures for HWB and it is common for disagreement to occur between these. A critical question is to determine

which things are measured subjectively and which are measured objectively and ensure that the complexity is acknowledged.

- *Consultant response:* Indicators serve as proxies for the real thing. We need something to measure. Assumptions have to be made about the indicators. It is important to consider whether the whole suite of indicators taken together paint an accurate picture?

3.4. Scale and choice of indicators:

- It was pointed out that indicators are done on a central coast (CC), north coast (NC), Haida Gwaii (HG) scale. The CC includes Campbell River and northwards so the information is different than if the regional boundary was set from Cape Caution northwards. Within the regions, people have different perceptions of HWB in each community.
- It was noted that it is important to determine at what scale to measure indicators. The EBMWG will have to consider what scale is appropriate and provide recommendations to the LRF in this respect.
- It was discussed that indicators are for informational purposes that feed into a decision-making process. Indicators themselves do not make decisions or determine outcomes.
- Participants were directed to the book, “*Dances with Dependency*” by Calvin Helin, (Orca Spirit Publishing, BC) which discusses First Nation (FN) community well-being in Canada. There is a chapter in the book called ‘Demographic Tsunami’ that discusses the differing demographics in FN and non-FN communities. Unlike non-FN communities, FN communities are characterised by growing young population. Resource allocation and programming are strongly influenced by demographics. As an example, by 2100, it is predicted that there will be 12,000 people in the Heiltsuk FN community.

3.5. Project overview and discussion:

- The consultants discussed that Step 1 of their project involved reviewing the literature on HWB. They looked at composite indices of HWB based on philosophical and methodological approaches. The consultants identified 5 common themes:
 - Social processes (sense of place and social capital)
 - Physical and mental health
 - Education
 - Economics
 - Culture
- All have feedback loops and are interrelated but have to be separated for measurement purposes. The choice of indicators should be a localised decision. A group may choose to collect data that is readily available – i.e. from StatsCan or they may choose to conduct surveys in the community.
- *Question:* If indicators feed into objectives, which do you choose first?
 - *Consultant response:* It is recommended that you choose objectives first, and then select indicators after objectives are determined.
- The consultants presented logic models to show how objectives and indicators are linked to the literature on HWB. Each box in a logic model has indicators to support it. You can use short term (secondary) indicators as interim measures of success when there is no funding or time to measure long term (primary) indicators.

- *Question:* During a transition period, why not use the short term indicators as primary indicators?
 - *Consultant response:* It depends on the temporal scale you are interested in. There is a logical inference. Cause and effect relationships are important to consider. Moving from primary to secondary indicators affects the causal link – secondary indicators are not as easily attributable to the plan/land use decisions. Theories and assumptions can hypothesise if there was cause and effect. Indicators have to be relevant to the community and region they are measuring well being for. There is a need to consider what objective criteria are, and what are meaningful criteria?
- It was noted that false indicators can provide the wrong impression. As an example, measuring flights into a community is sometimes used to measure tourism rates. However, all residents and workers have to fly in to the community, not all flights are taken by tourists. Measuring flights is a misleading tourism indicator.

3.6. Setting criteria for the selection of indicators:

- The consultants recommended selecting criteria before selecting indicators – how do you decide if the indicators are in or out? Screen out indicators that you will not be using. Screening questions determine what indicators are ultimately chosen. It is recommended that the screening criteria be developing in advance of choosing indicators. Some of the screening criteria the consultants chose were:
 - Are indicators consistent with literature on HWB?
 - Are there logical links between objective and indicator?
 - Comparable over time?
 - Relevant to both FN and Non-FN?
 - Existing secondary data source – scale acceptable/ boundary acceptable?
 - Is primary data available, affordable, and feasible?
 - Desirable direction obvious?
 - Sensitive to change, but unaffected by other changes?
- The consultants felt that there needs to be a way to screen indicators. In 3.1 of the Schedules, the identification of FN cultural resources is not a comparable indicator that can be used over time. The consultants suggested the LRF consider using a different indicator to measure the 3.1 objective.
- The consultants developed 21 primary and 18 secondary indicators based on the 5 HWB components. The rationale, data source and desired direction for each is discussed in the report.
- Some indicators overlap with C and G indicators, but the list does not include all of the C and G indicators – this is a master list that has a wider HWB focus.

3.7. Predictability and causal links:

- It was pointed out that choosing predictability as a screening criterion is an important consideration. A change in the social indicator predicts (indicates) a change in the objective. It is important to show the linkages between indicators and objectives.
- The relationship with scale was considered to be critical by participants – indicators need to be appropriate based on scale. Predictability is almost undoable because there are too many complicating variables. However, it may be feasible to do correlation between

indicators. If it is not easy to show a tight causal link, correlation and defensible logic can be used as substitutes.

- It was pointed out that social indicators are viewed differently from scientific indicators. Causal links can be made with scientific variables. Implementation of ecological integrity (EI) components of EBM may predictably have negative effects on HWB in the short term. There is a need to consider whether you can at least explain variance and evaluate the strength of the relationship. There is a difference between monitoring and evaluation. It is recommended that indicators be monitored and the results be analysed.
- The challenges of clarifying EBM were discussed. EBM is about HWB and EI, and not affecting one to improve the other. HWB is a core part of EBM.
- *Question:* Did you tap into things that was done wrong with Clayoquot or other processes?
 - *Consultant response:* The complexity of improving forest management systems while staying commercially viable was recognised and consultants were mindful of that as they developed the report.
- It was discussed that the proposed indicator system can provide a richer discussion but cannot provide a definition of success or failure. A definition chosen by the EBMWG could compete with the ideas that chiefs and mayors have as to what defines HWB in their community. Some of the definition of HWB has to be done by the communities themselves. On the EI side, we may get causal/predictable links, but with the social side, this is almost impossible and not applicable.

3.8. Missing Indicators from C and G:

- C and G do not contain indicators for Health, Education and Social processes. Social capital is a component of social processes. It is concerned with how well connected you are in your community. Researchers are searching for ways to quantify this link with HWB. Sense of place is the other component, which addresses attachment to the community.
- Participants were directed to an interesting book, “*Bowling Alone: the Collapse and Revival of American Community*”, by Robert Putnam (Simon and Schuster, 2000, NY press).
- *Question:* If EBM is mainly affecting economics and access to cultural resources, why measure the other three variables?
 - *Consultant response:* Due to the interconnected nature of the variables, it is helpful to measure all that we can. For example, if you are healthy you can work. HWB is affected by more than just economics. Economic and social well-being exist on the same curve. For many, the perception of personal control is important. If someone has more control over a resource, they tend to feel satisfied with less of it.
- It was noted that HWB is based on a monitoring information system. Decisions made through EBM are narrow, but you need to look at HWB holistically. EBM is based on an integrated holistic approach, an interdependent system. You cannot plan in a vacuum and must look at qualitative and quantitative sides.
- The consultants’ recommendation was to add three additional objectives to C and G:
 - Health
 - Education
 - Social processes

3.9. Collection of Data:

- Data is available for 23 coastal communities from the academic programs at UBC. Participants can get a sense of what might work in the communities from that data. Secondary sources exist for health data, but not at the best scale. Economic data is readily available, education has some data available, and culture has some but will likely need surveys to provide additional information.
- It was noted that BC Stats does not have information for non-incorporated, First Nation, or smaller communities. There are scale and boundary overlaps for health indicators. Some data is available at health service delivery areas, which is the smallest scale measured. Local Health Area data is available from BC stats.
- It was pointed out that when gathering data from sources, comparability over time is a critical selection criterion. A danger exists in contacting a local hospital or school district and getting information as they may not do that in the future.
- The issue of Canadian Census methodology and cultural appropriateness (inappropriateness) was raised. Some of the cultural data that exists might not be valid for all First Nation communities. It was noted that most FN communities are seasonal and cyclical and migration and mobility is high, so the Census may not accurately capture the population. Some FN groups won't participate due to sovereignty issues. FN statistical institute will work on developing more accurate stats for FN communities. This will be a useful data source in future.
- The importance of establishing a baseline initially was discussed.
- The consultants discussed some of the Primary Data collection methods:
 - Employment survey
 - Household survey
 - Proxy method census
- Participants discussed designing a template for communities that could be modified to allow them to include their own relevant indicators when monitoring and defining HWB from their perspective. A template is a good potential product that could come out of the work.

4. Adaptive Management and Indicators

- It was noted that AM principles should be applied to both pillars of EI and HWB – a key part of the AMF is the ability to predict a potential outcome based on your chosen actions. How do you apply this in the case of HWB? When screening indicators was predictability used to eliminate indicators that cannot be predicted.
- Passive AM is geared to monitoring and evaluating linkages for HWB outcomes over time. Active AM includes doing experiments, which is not acceptable in a community HWB context (i.e. experiments are not conducted using communities as control or treatment data points)
- When developing C and G the primary concern was related to the employment for FN in forestry. It was noted that health, education and social issues were to be dealt with individually in the communities. Sometimes employment brings other social problems, such as increased access to alcohol and drugs. The first priority was to bring jobs into the

communities. Some FN communities don't necessarily want outside involvement or direction in some areas.

- It was pointed out that social attitudes with respect to forestry practices have dramatically influenced the physical environment and changes in the environment have affected social well being.
- It was noted that full EI does not mean there is full HWB. The environment in Bella Coola may be better today, but HWB is not. EBM recognises the need to achieve both simultaneously. We have basic models for what EI includes, but we do not have the same robust model for HWB. Need to keep working with what we can while we figure it out.

5. Indicators and informing decisions (Provincial and non-provincial)

5.1. General Discussion:

- Participants discussed the idea that perhaps two sets of indicators are needed; one set to be used by people working in the plan area for EBM; and a second set to be used in a regional or provincial sense. The implementation partners need indicators that will inform their decisions, but may not be concerned with other indicators.
- There is a need for some consistent indicators across communities as well as having individual community indicators. Comparison across the regions is important. It is also important for FN to have their own tailored indicators specific to their community.
- Participants discussed having general indicators and specific community indicators. It was noted that indicators will likely change over time and fluctuate but objectives will remain more constant. It would be useful to have a menu of indicators to choose from.
- Social indicators are more likely to change where ecological ones tend to be more consistent.
- Different communities exist within communities. HWB needs to be looked at from the community perspective. Regional grouping for Stats Can are not at the right scale. Employment surveys will show better data in the communities with respect to employment, etc. HWB is about balance on the social and economic level. It was discussed that FN people often do not have the same opportunities as non-FN people. It is important to measure things like the discrimination that FN people experience in mainstream society. An important indicator may be to determine how acceptable FN people are in the professional/public sector. It is important to measure shifting social attitudes and bring about social change.
- Participants discussed the importance of addressing tough issues such as discrimination.
- It was noted that C and G may not encompass the entire picture for HWB. It was recommended by participants that the LRF may want to use some indicators for monitoring purposes but not necessarily add objectives and indicators to the schedules.
- Participants recommended ranking indicators in terms of what can be monitored.
- The political realities that exist were raised. Some participants supported inclusion of the three additional components because they reflect political and social realities in communities and are relevant to decision-makers.
- Participants discussed the pros and cons of including the three extra objectives:

Cons	Pros
May not be relevant to EBM implementation	Relevant to overall HWB – provide a complete, holistic picture
Too broad	Improving HWB is a pillar of EBM – must protect both simultaneously
Other initiatives are ongoing to capture these elements	
First Nations did not want interference with these areas – wanted autonomy and independence in the community to approach these.	

- An EBM/AM forest sector implementation model was discussed and a diagram was presented. The model discussed the following items: Activities (status quo, EBM) leads to forest estate model (with outputs such as spatially explicit AAC, cultural values protected etc), leads to regional employment economic model (salary, economic activity), leads to community impact model (housing, education, health) leads to comparison of outputs/results/effects with baseline or set targets, leads to change activities or change policy, leads to change in activities above, or changes in government policy
- The consultants discussed the specific recommendations for Schedules C and G. Refer to the draft report and the Schedules for this section.

6. Recommendations and feedback from participants

- See C and G Item 3.3 and the draft report
- *Question:* Why do we have AAC as an indicator? Would it be better to measure percentage harvested and percentage owned locally?
 - *Discussion:* We can measure an absolute value of harvested activity by local community, over total harvested for the region by everyone.
- It was recommended that the consultants use similar language for indicators across the board (i.e. use the same wording for forestry as was used for shellfish).
- Some participants wanted the indicator to recognize the ‘viability’ issue of economic activity. The difficulty of separating economic pressures that are not related to EBM, but that affect the ‘viability’ of a lumber activity (e.g. demand/price of wood, foreign competition, currency rates, etc.) was pointed out as confounding effects that limits the ability to isolate the implementation of EBM and the ‘viability’ issue.
- It was suggested that the amount of economic harvest over total AAC is a good surrogate.
- The issue that overlapping territories between First Nations squeezes the actual AAC of that each Nation has available is important to consider.
- Participants recommended using an indicator that is based on the average of the last 3 years production. AAC on the coast is soft data because it is trying to predict into the future.
- It was noted that indicators should be as simple as possible to be useful.

- It was suggested that the number of bids put up for sale by BCTS could be used to show local ownership (show in a table on AAC – it could be shown by license holder in the plan area, and harvested/ sale by license holder in the plan area)
- Concern was raised with the consultants’ statement on pg. 70 with respect to mining exploration having little economic potential in the plan area. It was suggested that mining exploration does generate some significant benefits in the communities.
- D14 from draft report: It was recommended that the consultants change ‘shellfish’ to just aquaculture. It was discussed that some First Nation communities are opposed to finfish aquaculture so it may have been left out intentionally, but there are fin fish and shell fish tenures in the plan area.
- An additional point was made that the planning mandate does not extend below the shoreline and most fin fish aquaculture operations are off shore and may not be covered by the LRMP.
- D6 from the draft report: Tourism room revenue: multipliers are different between tourists and workers. The revenue generated by tourists is significantly higher. It was pointed out that there is no secondary sources to make this distinction, and it would be a very significant cost to gather this for the North Coast.
- It was suggested that this is not as important an indicator so don’t put a lot of resources into trying to make it better.

7. Discussion on specific objectives from the draft report

- The consultants received the following suggestions from the participants at the workshop. The table indicates the consultant actions that have been taken to address the suggestions (the following tables were submitted by the consultants after the workshop):

7.1. Economics:

Changes suggested at workshop	Action taken
Use same wording for D13 and D14	Done
Add a new indicator: D15: Jobs per cubic metre by census subdivision and forest district (value-added indicator).	Done
Add back in the “annual resource revenues for FN and communities” as an indicator and include annual resource revenues to BC as a comparison with annual resource revenues to FN and communities (in same indicator).	Done
Consider how to capture benefits as well as income.	There is no easy way to do this without asking each employer for information Reliability of results impossible to assess.

Changes suggested at workshop	Action taken
Consider how to account for non-commercial foods.	Would require individual households to track their non-commercial food use. Could be done by individual communities as indicator but not recommended on a plan area basis. Doesn't pass the affordability criterion.
Create new indicator for local revenue from power production, mining aggregates, and carbon credits.	Done
Add "compared with North Island and province as a whole" to D1 (Economic Diversity Index).	Done.
Add footnote on D11: if BCTS, would be by successful bidder of BCTS volume.	Done
D8 (% of workers in the plan area who are permanent residents). Should be # and %, not just %.	Done
Create D20: Public infrastructure investment.	Done
D14: Add % of fin fish and shellfish tenures.	Done
Add back in: Average income per tax filer and average family income. Get examples from BC Stats website.	Done
Consider new indicator: % of household expenditures spent in the plan area by household.	Added a table discussing the indicators suggested but not recommended in final list and why. Cost of conducting household level research over a year's time does not meet "affordability" criterion.
Add three year running avg. to D13-14-15 (unit description).	Done
Add back in: Mineral exploration expenditures:	Done
Consider new indicator: # of FN community members who have migrated back to the community per year.	Don't recommend including this indicator. Does not meet the criteria of "desired direction obvious." (Criteria 7). Increased numbers of community members migrating back to community does not mean an improvement to economics or culture; that depends on what skills and interests they bring with them or adapt once they arrive. They could be an economic or social drain on the community or an asset.
Change D3 to be 'above \$25,000'. (threshold is too high)	Done

7.2. Culture:

Changes suggested at workshop	Action taken
Include E1 and E2 as recommended indicators (we recommended only secondary indicators but workshop participants thought E1 and E2 should also be included).	Done
Add new indicator: % of FN territory covered by TUSs.	Done. Added new indicator called E7 “Percent of First Nations traditional territory covered by Traditional Use Studies.”
Adjust E3 indicator: Add # of archaeological studies reviewed by FN.	Done. Added wording to Indicator E3. Indicator now says “Number of new archaeological studies or Traditional Use Studies conducted and number reviewed by First Nations.”.
Consider new indicator: # and % of archaeological studies that result in further study.	Don’t recommend adding this indicator. Doesn’t meet Criteria 2 (logical link between indicator and objective it purports to measure).
Add back in FN harvest levels of cultural and traditional resources per capita.	Don’t recommend adding this back in. Measurement is too difficult at the plan area level. What level of involvement constitutes harvesting? Also too many different products to consider. (Criteria 7- primary collection not logistically reasonable/affordable). This indicator may be possible at the community level but is not recommended at the plan area level.
Describe how “discrimination that FN people experience in the mainstream society” could be measured.	Didn’t choose to add as indicator because didn’t meet Criteria 7- (Primary collection not logistically reasonable/affordable), and because this indicator should be measured on a community by community basis rather than a plan area basis because it may not apply to all communities.

7.3. Education:

Changes suggested at workshop	Action taken
Change C1 to say “# and % of graduates from Grade 12 as a percentage of those in Grade 12. Add ‘private independent schools need to be contacted directly.’ to capture people outside the system.	Done
Consider how to address “brain drain” through one or more indicators.	Brain drain is a multi-faceted issue linked to many indicators and can’t be captured adequately by one summary indicator. A brief study on specific reasons why brain drain happens (or barriers to staying in the community) would reveal indicators that then could be measured over time (such as housing availability).

Changes suggested at workshop	Action taken
Add to C2: % of adult population who completed grade 12 , certified job skills training, trades, college etc. This captures the drop outs of Grade 12s.	Done.
Consider new indicator: # enrolled in adult basic education.	Did not include because it did not meet the criteria of ‘desired direction obvious.’ (Criteria 8). If ABE numbers increased, it could mean that fewer are graduating from high school, which would not be considered desirable. Do we want the number enrolled in ABE to go up or down?
Add new education indicator: # and % of students who enter Grade 8 but don’t finish Grade 12.	Done
Consider adding indicator: # of adult band members with post secondary training who live on reserve as a ratio of the total # of band members with post secondary training.	Don’t recommend including as indicator. Doesn’t meet criteria of: “Is the indicator sensitive to change in the outcome, but relatively unaffected by other changes?” (Criteria 9). (What if adult band members who are already off reserve get post secondary training; doesn’t help the community but ratio would change. Result would be misleading.)

7.4. Social processes:

Changes suggested at workshop	Action taken
Include trust levels as a recommended indicator (currently is only a secondary indicator). Expand on how this could be measured.	Done. Read the results again of UBC research on the North and Central Coast to learn that generalized trust is a reliable proxy for social capital and found that there has been a scale developed and tested (where multiple questions are compiled into an index score which can be compared over time). Also added the sense of place indicator that UBC found to be reliable: willingness to stay in community even if good job elsewhere.
Create an indicator that would measure the relationship between FN and non-FN who live in one community such as Bella Coola/Nuxalk.	This will be best captured in the questions related to trust. We need to use indicators that can be used generally across all communities, so we have avoided questions that are only applicable to certain kinds of communities. In the plan area, there are communities like Bella Coola where First Nations and non-native people live side by side, and communities that are only First Nations.

Changes suggested at workshop	Action taken
Provide example of social networks as relates to FN (e.g. restorative justice networks or # joint projects).	<p>The literature on social networks specific to First Nations is weak. Most of the research on social capital is on European-based systems. In those systems, social networks refers to formal membership (joining groups) or informal networks (number of people you know inside and outside the community and the strengths of those relationships).</p> <p>In a working paper called “The Role of Social Capital in Poverty Alleviation in Native American Reservation Communities” (Kathleen Pickering, David Mushinski, John C. Allen, February, 2006, http://www.rprconline.org/wp2006.htm), Native American respondents were more likely to be involved in informal organizations based on social relationships, than formal memberships. For Oglala Lakota respondents for one study, for example, community was not a geographic concept but rather a kinship concept that embraced extended family members living in distant geographic communities. Different native communities answered differently on questions such as “how many people would help in a water emergency” and “having a sense of responsibility with people in need.” and “whether a respondent felt excluded or left out from their community” or respondent’s connections or resources outside of their community upon which they could draw” demonstrating that how social capital is defined varies from community to community.</p>
Add point in report about need to break out results of trust survey questions by gender to test assumption about women having better/different social networks than men.	I am not including gender as an indicator – if researchers want to include that question in the survey for other purposes, they can do that easily.
Address how barriers for urban-based FN to come back to the communities could be measured.	This is an excellent and important study, but not an indicator to track over time. Understanding (qualitatively) these barriers is very important, but not to include in a monitoring framework. this would be a research project in itself
Address how perceptions of FN regarding influx of tourists or other non-FN in their communities could be measured.	Shawn to do.

7.5. General:

Changes suggested at workshop	Action taken
Add paragraph discussing stakeholder meeting as a step in the project.	Done
Add word “suggested” to Section 5.1 title (“Suggested full suite of indicators for HWB”).	Done
Address comment mentioned at workshop for the need for local communities in the plan area to select local level indicators- (this set of indicators is appropriate at the plan area scale, while communities may choose smaller scale indicator)	Added statement in Section 6.1 after first paragraph: “This set of indicators is appropriate for use at the plan area scale. Local communities in the plan area may wish to develop their own local-level indicators that are appropriate for measuring changes at the community level.”
Remove the repeated D7 that is repeated by mistake in Section 6.1.4.	Done.
Renumber the indicators in the report so they correspond to Schedule C and G (called Section 3 in Schedule C and G) - to reduce confusion.	Considered this but decided not to renumber the report because the report contains introductions and literature review in Section 3 of the current report. However, I provided cross references to the Schedule C and G number in Section 6 of the report for easier reference
Consider why crime was not been recommended as an indicator.	Crime did not fit under any of components of human well being that were common across all literature on HWB – it is not an indicator of health, education, social capital or sense of place. BC stats does include it in their Socio-economics index but they also measure 79 other indicators as well—using crime statistics could be a choice that local communities could make based on their priorities. Crime statistics in B.C. are available at the Local Health Area scale (which is problematic because of overlapping boundaries, similar to problems with health statistics).
Add brief discussion in report about difference between correlations and cause-effect and research design that distinguishes biological science from social science.	Done. Added Section 3.6 under Challenges and Limitations.

8. General discussion on indicators related to additional objective categories added (education, social processes, health)

8.1. Education:

- Participants felt that the indicators for education need to include skill training that occurs within specific industries, such as forestry skills training. First Nation representatives in

the region have done an extensive study on trades requirements (through SFU) and training requirements for the Coastal region. It was suggested that the certification numbers be recorded and put into monitoring programs by each FN community.

- It was pointed out that students in FN communities often have to leave their home town in order to complete their high school education or obtain necessary courses to get into college. Measuring the number of children who do not return to Grade 11 may not be accurate for measuring drop out rates if a significant number of the students have been forced to relocate outside of their community to attend Grade 11.
- Participants pointed out that the indicators for education suggested by the consultants assume people are in the system. The figures may be missing those outside the system, such as children who are home schooled or attending private schools. There is a need to access those numbers.
- Participants wanted to see the 'brain drain' from communities addressed. Young, qualified people often cannot find sufficient housing or job opportunities in their home community.
- Participants expressed a desire to see an accurate indicator for drop-outs (particularly at grade 11 and 12).
- It was discussed the community based surveys can capture a lot of this community specific information. A survey can be designed to ask questions about the following:
 - Community housing conditions and supply in FN communities;
 - FN and non-FN relationships between communities (linkages) e.g. Bella Coola and Nuxalk;
 - Indicators on crime levels, alcohol abuse (i.e. does alcohol abuse increase as incomes increase?);
 - Social networks and levels of community trust.

9. Next steps

- The consultants will incorporate workshop input and feedback into their final draft, using their selection criteria and professional judgement.
- Early August 2007 is the timeline for consultants to turnaround comments from workshop into a final draft.
- An important discussion around a baseline study and targets needs to occur.
- Workshop notes will be circulated to all workshop participants.
- The final report will be reviewed by the EBMWG. The EBMWG is responsible for forwarding any recommendations to the LRF stemming from the report. The final report will be disseminated to implementation partners, subject to recommendations by the EBMWG regarding the report.

10. Closing comments

- Participants stated that the workshop highlighted a continued need to spend more time considering what full EBM and HWB means.
- It was noted that most of the existing indicators in Schedules C and G are recommended to remain, but there are new indicators that could be added. The participants need to think through the suggestions and provide recommendations to the LRF.

- Some concern was expressed that the AAC indicators won't adequately capture the amount of benefits returning to the local communities.
- There was a request for the final report to be presented to the NCPIMC so they can provide their comments on it before it is submitted to the LRF.
- A comment was made that the prioritisation of indicators is important, especially those relating to economic development/jobs. This is what affects a community.
- It was noted that focusing on indicators is good, but a critical point of this social success is going to be about the decision making process, decision control and who owns it.
- It was noted that people in communities want some sense of control in the decisions over the resources next to them. De-centralize decision making to the point that local communities next to resources feel they can affect decisions and see that they can benefit from resource activities.
- There is a difference between the measuring the percentage of tenures owned by community members and assessing the decision making authority to decide who has those tenures (decentralized powers for resource control).