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**Socio-economic
Benefits of
Modern Treaties
in BC**

October 2016

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Executive summary

The British Columbia Treaty Commission (BCTC) has published five reports modeling the financial and economic benefits of modern treaties for First Nations, British Columbians and Canadians. Deloitte was engaged to review and update the financial and economic model, understand the socio-economic benefits of treaties, and identify potential measurement frameworks to better quantify benefits of modern treaties.

Deloitte reviewed and updated the financial and economic model which considers the impact of settling treaties for British Columbia, based on the current number and rate of treaty settlement. The number of beneficiaries was adjusted to reflect the reduced number of treaties settled, and the financial benefits were increased to reflect cash settlement and resource revenue sharing from recent settlements.

The updated model shows that there are economic benefits (though reduced) to First Nations and net economic benefits to British Columbians for settling treaties.

Deloitte explored the socio-economic benefits of treaties using the Community Well-Being Index (CWB) developed by Indigenous and Northern Affairs Canada (INAC). The CWB provides insight into a limited set of socio-economic indicators at the community level across Canada, based on the National Household Survey administered by Statistics Canada. In reviewing this data for a First Nation with a modern treaty, it appears that there are benefits to a First Nation during the treaty negotiation period through the implementation period. This finding is very preliminary as there is insufficient data – both number of years of data as well as the number of treaties settled.

As part of this review, interviews with leaders from First Nations with a treaty provided insight into a broader range of benefits resulting from treaties and the treaty negotiations process. First and foremost, treaties address historical issues related to the *Indian Act*, providing a framework and process for reconciliation in line with Articles 3 and 4 of the United Nations Declaration on the Rights of Indigenous Peoples (UNDRIP) and Section 35 of the Canadian Constitution.

Following from this framework and process are benefits that include decision-making, and the design and implementation of a system of government grounded in First Nations values. First Nations find the treaty negotiations process enhances community engagement and creates more accountability in elected leadership, resulting in greater capacity and the development of future leaders.

Treaty implementation unlocks economic potential, ranging from enabling access to financing to foster First Nations businesses; and investment in local and regional infrastructure, housing, and commercial activity and development benefiting both First Nations and non-First Nations communities. These benefits take time to accomplish, are not easy to achieve, and, in the aggregate, improve overall well-being. Further, the treaty negotiations process provides the focus for First Nations to develop the pathways to achieve the milestones that lead to the realization of these benefits.

Deloitte undertook a scan of different socio-economic frameworks and, through interviews, discussed measurement tool applicability to community level reporting. The measurement frameworks developed by three of the First Nations with a modern treaty were also discussed through interviews. The ability to measure socio-economic benefits is important for First Nations as a way to demonstrate progress and provide accountability to their citizens and community.

The First Nations interviewed for this report agree that measurement is important, and are pursuing different and tailored measurement programs funded locally. Each have expressed concerns around cost and capacity as barriers to sustaining a measurement program long-term.

There is an opportunity for the BC Treaty Commission to facilitate a standardization to the approach to measuring socio-economic progress that would allow for potential cost efficiency and comparability across different First Nations communities.

Introduction

Purpose

The British Columbia Treaty Commission (BCTC) has undertaken five forward looking studies of the economic benefits of treaty settlements in British Columbia (BC) since 1992. These reports focused on the financial and economic benefits of treaty settlement to Canadians, British Columbians and First Nations. With eight First Nations implementing treaties¹ and another eight at the Final Agreement Stage,² BCTC would like to supplement this economic and financial perspective with an understanding of the broader social and economic benefits that a modern treaty brings to a First Nations community.

This report updates the financial and economic model developed in previous reports, reflecting the rate of treaty settlement and implementation experience; begins to discuss and understand the broader social and economic benefits arising from modern treaties; and explores different methods to measure and quantify the benefits of treaties at the community level.

Scope and approach

This review was conducted in three stages:

1. Review and update the financial and economic model developed over the previous studies based on recent settlements;
2. Understand the social and economic benefits of treaties and develop an approach to supplement the financial and economic model with non-financial characteristics; and
3. Identify potential measurement frameworks to better quantify and report the impact and benefit of treaties for First Nations, British Columbia, and Canada.

In developing this report, Deloitte reviewed past studies, publicly available information, research and reports, conducted interviews with First Nations leaders in treaty and non-treaty First Nations, and conducted research and interviews with BC treaty First Nations and non-First Nations organizations regarding socio-economic measurement frameworks for assessing community well-being.

¹ Nisga'a Nation, Tsawwassen First Nation, Tla'amin Nation, and the five Maa-nulth First Nations.

² In-SHUCK-ch Nation, K'omoks First Nation, Lheidli T'enneh First Nation, Te'mexw Treaty Association, Tsimshian First Nations [Kitselas and Kitsumkalum], Wuikinuxv Nation, Yale First Nation, and Yekooche First Nation.

Benefits of modern treaties

Financial and economic benefits

The BCTC published a report in 2009 which updated the economic impact model from previous studies that quantified direct and indirect benefits from treaties in BC, and included estimates of the costs to British Columbians in determining the net economic benefit. The conclusion from the report, based on the assumptions used in the analysis, was that there is a significant net economic benefit to First Nations, British Columbia, and Canada resulting from the settlement of treaties with First Nations. Further, it concluded that the sooner treaty settlements occur, the sooner benefits would flow to First Nations people, British Columbians, and Canadians in the form of investments, jobs, and economic development.

The majority of the benefits of settling treaties in the economic impact model is generated through cash compensation and resource revenue sharing (RRS), which collectively contribute approximately 95% of the gross benefits. The cost to British Columbians is the province's share of these components of the treaties, which is generally 17% of the cash settlement (subject to adjustment for the land contribution from the province) and 50% of the RRS cost, adjusted for BC's share of the federal government's contribution.

The following table summarizes the scenarios used.³

Table 1: 2009 treaty settlement scenarios⁴

	Treaties Settled	Treaty Settlement Rate	Estimated Duration to Complete 60 Treaties
Scenario 1	60	15 in the first 5 years 45 in the following 10 years (4 per year average)	15 years
Scenario 2	60	3 per year	20 years
Scenario 3	60	2 per year	30 years

³ Each treaty application can represent a single Nation or an association of multiple Nations.

⁴ "Financial and Economic Impacts of Treaty Settlements in BC," PricewaterhouseCoopers, November 2009.

Updates to the financial and economic assumptions

Deloitte reviewed the core assumptions and conclusions of the 2009 study, and made adjustments to the model to reflect the rate of treaty settlements between 2009 and 2014.⁵ These adjustments are summarized in Table 2.

Table 2: Updates to the 2009 economic impact model

Component	Update
Treaty settlement rate	Reduced the total number of treaties settled to 30 over 15 years, reflecting both the settlement rate from 2009 to 2014 and alternatives to modern treaties (such as Sectoral Arrangements)
Number of treaties settled	
Number of beneficiaries	Reduced the average number of beneficiaries per treaty to 1,200 based on the average of the treaties that have been settled or are in Stage 5 (Final Agreement) ⁶
Benefits per beneficiary	Increased cash settlement and resource revenue sharing per beneficiary to \$61,700 and \$700 respectively, reflecting recent settlements

Based on these adjustments and the reduction in the projected number of total treaties settled, the net present value of settling 30 treaties over a 15 year time frame is \$1.75 billion, as summarized in Table 3.

Table 3: Financial benefits based on updated model

Total treaties to be settled	30
Years until these treaties are settled	15
Cash settlement (\$m)	3,219
Resource revenue sharing	2,664
Total benefits (cash and RRS only)	5,883
Less:	
BC share of cash compensation	(892)
BC share of RRS	(1,504)
Total cost to BC	(2,396)
Net financial benefits (\$m)	3,487
Net Present Value of net financial benefits (\$m)	1,751

⁵ The previous report assumed 60 treaties would be settled in this timeframe which has not occurred. We have assumed a lower achievement of 30 treaties. The reduction is based on the current pace of treaty settlement, extended by the logic that greater use of alternatives to modern treaties (e.g. Sectoral Arrangements) will maintain the lower rate going forward.

⁶ The previous report based their calculations on 2,127 beneficiaries per treaty. Current settlements have an average of 1,200 beneficiaries per treaty. The previous assumption is that every BC Status Indian will eventually be under treaty (127,627 Status Indians / 60 treaties = 2,127 beneficiaries per treaty). We have revised this assumption based on the average number of beneficiaries from the most recent treaties (1,200).

To gain a better understanding of the financial and economic benefits of pending treaty settlements, we applied the adjusted model to the First Nations currently in advanced negotiations of the BC treaty negotiations process using publically available information (financial, beneficiary population, and settlement dates). The adjusted model indicates that the net financial benefit is \$625 million if all eleven are settled in the eight years between 2016 and 2024 as summarized in the table below:

Table 4: Financial benefits based on pending settlements

Total treaties to be settled	11
Years until these treaties are settled	8
	(2016-2024)
<hr/>	
Total cash settlement (\$m)	736
Resource revenue sharing	478
Total benefits (cash and RRS only)	1,214
Less:	
BC share of cash compensation	(204)
BC share of RRS	(270)
Total cost to BC	(474)
Net financial benefits (\$m)	740
Net Present Value of net financial benefits (\$m)	625

Appendix C provides a summary of the financial analysis validating the initial finding that there is a net economic benefit for BC and First Nations from treaty settlements. As Table 4 illustrates, there continues to be a net economic benefit to First Nations and British Columbians though it is less than the previous models due to fewer treaties to be settled and the slower pace of settlement in this revised model.

As indicated from the previous study the sooner treaties are settled, the sooner benefits will flow to First Nations and British Columbians.

Perspectives on total and net benefits

When considering the expression of financial benefits and costs, it is useful to understand the perspective of the financial model. The series of reports examining the financial benefits of settling treaties since 1996 is based on understanding the impacts of settling treaties from the perspective of the Province of British Columbia. From this perspective, the benefits are expressed as total and net benefits as indicated in Tables 3 and 4 with BC experiencing the net benefits.

Shifting to a First Nations perspective, the financial benefits of settling a treaty is better represented by the total benefits (cash settlement and resource revenue sharing) as indicated in Tables 3 and 4. The current model does not consider the First Nation perspective on costs, which could include a consideration of the treatment of financial and economic benefits removed from their territories over time without compensation.

From a broader reconciliation perspective, costs expressed in the model could be considered an “investment” in reconciliation.

Understanding investment assumptions in the model

The economic impact model assumes capital transfers and revenue sharing to be invested in First Nation businesses (40%), financial instruments (20%), community projects (10%), and the remainder (30%) is consumed. The investment and consumption of settlement dollars in the community presumably yields benefits to community members as follows:

- **Investment in First Nations Businesses:** increasing labour force participation, employment rates and average income as more First Nations people are working and earning wages. An increase in the number of members employed, the increased potential of staying employed and better wages has a positive impact on households which influences overall well-being.

- **Investment in Financial Instruments:** a sustainable source of funds for projects or programs to benefit the community and the local economy that have positive influences on community well-being.
- **Investment in Community Projects:** creating jobs, improving labour force participation, employment rates and average income. An increase in employment and income will have an influence on well-being. The types of projects invested in (e.g. improvements to sewer system, housing renovations, etc.) also contribute to improvements in general community well-being.
- **Provided for Consumption:** provides immediate benefit to First Nations citizens. Some citizens may choose to direct these contributions towards improving their education and / or housing, which will have a longer term influence on well-being. Alternatively, and based on the choices of First Nations communities and their leaders, these same funds could be directed to community projects, investments and programs which would also have positive influence on community well-being.

Table 5 provides an illustrative distribution of funds based on the economic impact model for 30 treaties as indicated in Table 3. The actual funds and allocation will vary based on the decisions and choices to be made by First Nations communities and their leaders.

Table 5: Illustrative example of allocation of capital transfers and resource revenue sharing funds from treaty settlement (high)

	Capital Transfers (10 years)	Resource Revenue Sharing first 10 years	Resource Revenue Sharing 10 to 25 years	Total
Investment in First Nations Businesses	\$532,800,000	-	-	\$532,800,000
Investment in Financial Instruments	\$266,400,000	\$201,600,000	\$357,210,000	\$825,210,000
Investment in Community Projects	\$133,200,000	-	-	\$133,200,000
Provided for Consumption	\$399,600,000	\$50,400,000	\$20,790,000	\$470,790,000

Table 6 provides an illustrative distribution of funds based on the economic impact model for the eleven treaties nearing settlement as indicated in Table 4. The actual funds and allocation will vary based on the decisions and choices to be made by First Nations leaders and their communities.

Table 6: Illustrative example of allocation of capital transfers and resource revenue sharing funds from treaty settlement (low)

	Capital Transfers (10 years)	Resource Revenue Sharing first 10 years	Resource Revenue Sharing 10 to 25 years	Total
Investment in First Nations Businesses	\$171,101,200	-	-	\$171,101,200
Investment in Financial Instruments	\$85,550,600	\$65,279,200	\$115,666,583	\$266,496,383
Investment in Community Projects	\$42,775,300	-	-	\$42,775,300
Provided for Consumption	\$128,325,900	\$16,319,800	\$6,731,918	\$151,377,618

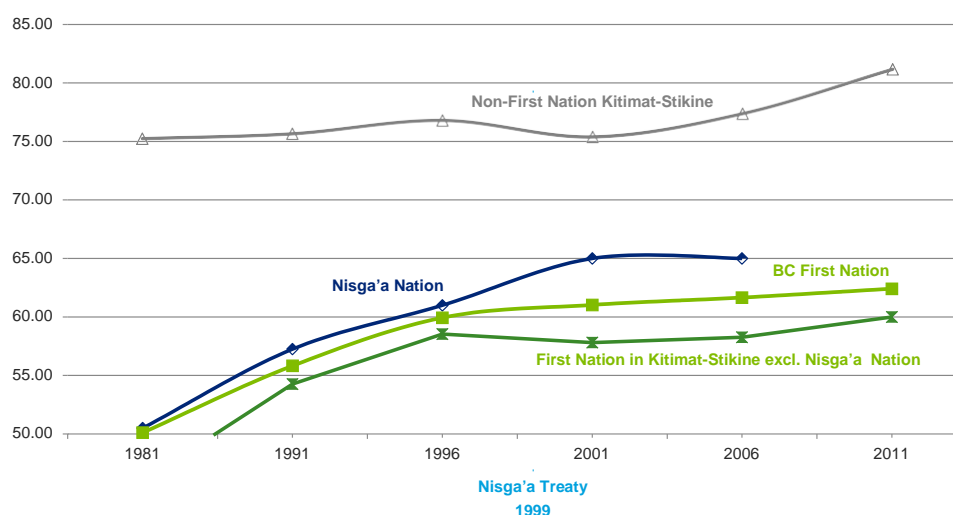
The investment choices to be made by First Nations citizens and leaders relating to the transfer of funds and revenue sharing has the potential to positively influence the local economy for both First Nations and non-First Nations communities and positively influence community well-being.

Understanding benefits of treaties

To gain some insight into the benefits of treaties, we reviewed the Community Well-Being Index (CWB) published by Indigenous and Northern Affairs Canada (INAC) for Nisga'a Nation. The CWB⁷ was developed to provide a general measure of social and economic conditions at the community level on a limited set of indices – education, housing, labour force activity and income for First Nations and non-First Nations communities. Nisga'a Nation⁸ was selected as its treaty has been implemented since 1999, so there are three CWB scores before treaty implementation and two following treaty implementation.⁹ This timeframe reflects the duration of the treaty negotiation and implementation process and the timeframe when benefits become evident.

Graph 1 shows an increase in CWB score during the treaty negotiation stage and the period immediately following implementation. During this same period the CWB scores for the surrounding communities were declining. There is a leveling off in the period between 2001 and 2006 during which time there was a major highway upgrade project in the Nass Valley and economic challenges in the forestry industry. Overall, Nisga'a appears to have benefitted from the treaty settlement process – negotiation phase and early implementation phase.

Graph 1: Overall CWB Nisga'a and Kitimat-Stikine 1981 – 2011



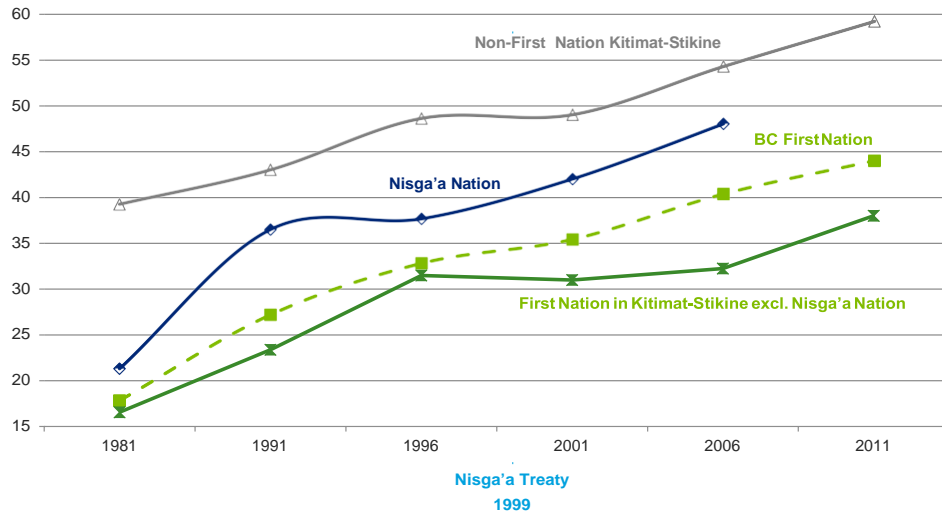
The overall CWB scores for Nisga'a is positively influenced by the rate of change in the Education and the Labour Force Activity scores, as shown in Graphs 2 and 3. The CWB Education score (which is comprised of high school, post-secondary and university completion) is greater than that of the other First Nations communities in the region, and appears to be keeping pace with the non-First Nation communities in the region. This is reflective of the investments in primary, secondary and post-secondary education, including Wilp Wilx- o'oskwhl Nisga'a Institute. It also reflects the value placed on education in the community to build the economy and strengthen Nisga'a society.

⁷ The CWB draws on Statistics Canada's National Household Survey and has been calculated for Canadian communities with a population over 65 individuals for 1981, 1991, 1996, 2001, 2006 and 2011.

⁸ The CWB Index scores for Nisga'a is compiled from the scores calculated for the following Census Subdivisions: Aiyansh (Kitladamas) 1, Gingolx, Gitwinksihlkw, Laxgalts'ap, and New Aiyansh.

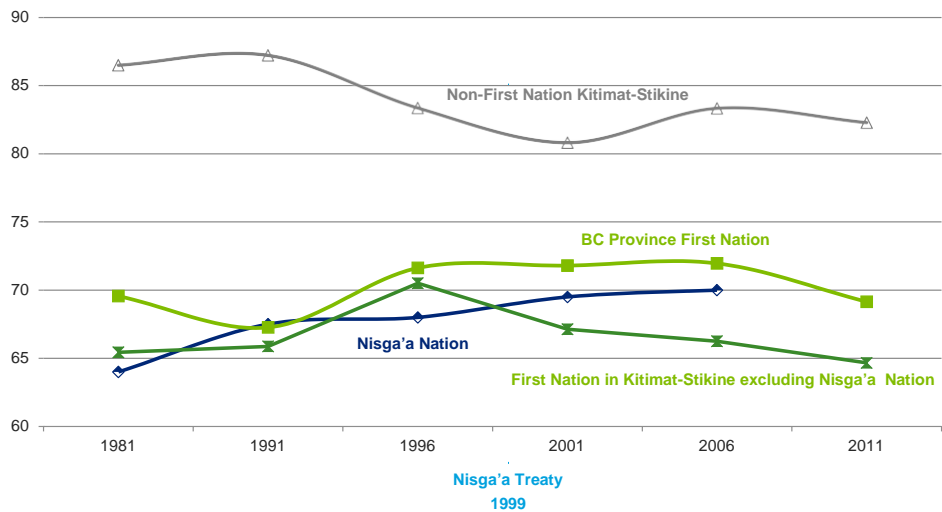
⁹ 2011 CWB data for Nisga'a is not available.

Graph 2: CWB Education Nisga'a and Kitimat-Stikine 1981 – 2011



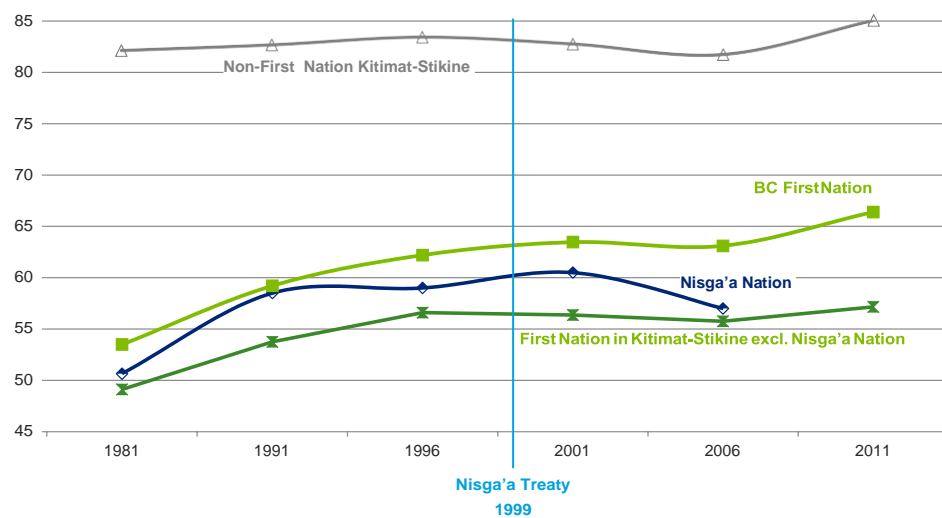
Graph 3 shows the CWB Labour Force Activity (LFA) for Nisga'a relative to the surrounding region. Labour Force Activity is comprised of the employment rate and the participation rate at the time of the census. The graph shows Nisga'a LFA increasing during the negotiation phase through the implementation phase. This is occurring at a time when the LFA for communities in the region (both First Nations and non-First Nation) were declining. This may be reflective of Nisga'a investments in economic development, local businesses and employment and job training.

Graph 3: CWB Labour Force Activity Nisga'a and Kitimat-Stikine 1981 – 2011



The CWB Income score, which represents per capita income, increased slightly during the negotiation period and the immediate implementation period. The income score declined during the period from 2001 to 2006, likely reflecting the changes in the fishery and forestry sectors and shift in the pine mushroom market.

Graph 4: CWB Income Nisga'a and Kitimat-Stikine 1981 – 2011



Overall, based on the CWB Index, it appears that Nisga'a benefited from engaging in and settling its treaty with British Columbia and Canada. Based on this one case example, First Nations could benefit from modern treaties.

Additional benefits of treaties

In addition to reviewing indicators to quantify the benefits of modern treaties, Deloitte undertook an examination of the qualitative benefits of treaties and some of the challenges through a review of treaty implementation reports and interviews with leaders from nine First Nations. A summary of these accomplishments and benefits include:

- **Historical context:** settling treaties begins to address the *Indian Act*, clarifies rights and title and self-government in line with Article 3 and 4 of the United Nations Declaration on the Rights of Indigenous Peoples, and provides protection under the Canadian Charter of Rights and Freedoms. It is the culmination of the efforts of generations of First Nations people to restore their societies, cultures and ways of governing.
- **Governance:** the establishment of a governance framework and structure that is culturally relevant, integrating traditional practices with modern governance concepts and principles. An important difference is the establishment of an intergovernmental framework providing a level of autonomy, decision-making and influence to First Nations with a modern treaty for the affairs of its Nation, communities and the surrounding region.
- **Government:** the establishment of culturally relevant government institutions with the ability to develop and pass legislation with the supporting regulatory framework, and generate revenues to fund government operations and services to citizens. This also results in increased accountability of elected leaders to the community.
- **Society:** the definition of identity, values and rights of citizenship in the Nation from which flows the extension of government services and programs. This provides clarity and a framework to extend services and programs to citizens beyond the immediate community.
- **Culture:** the protection, teaching and repatriation of traditional practices and cultural artefacts. This is enabled through a range of actions, including connecting communities through major infrastructure investments; the development and operation of cultural centres and museums; and programs, funding and legislation that support traditional language and traditional practices such as hunting and fishing.
- **Harvesting Rights:** clarifies the intersection of culture, land and economic activity.
- **Traditional Practices:** are protected and enshrined in treaties and accompanying regulations.

- **Capacity Building:** developing leaders and deepening capabilities in all aspects of the community ranging from elected government officials and administrative personnel; business leaders and entrepreneurs; social and cultural leaders, etc. In some First Nations there is enhanced focus on succession management and developing leadership in youth.
- **Lands and Land Use:** the clear responsibility for the management and stewardship of the urban and rural lands and the surrounding wilderness and habitat, including establishing the regulatory environment. This enables the First Nation to directly balance environmental and sustainability interests with economic development interests. In addition, First Nations with a modern treaty find that addressing community land use issues enables access to capital, thereby unlocking local economic potential.
- **Economic Development:** consistent with the economic model, First Nations with a modern treaty are able to set a positive business environment through local policy, investment in Nation-run businesses, funding or financing of small businesses, and support for major regional infrastructure, residential and commercial developments (e.g., highways, fibre optics communication, electric transmission, regional commercial and shopping centres, etc.), benefiting both First Nations and non-First Nations communities.
- **Financial Sustainability:** consistent with the economic model, the establishment of funds as a method of managing and sustaining the benefit and impact of capital transfers enables First Nation leaders to create a broader range of policy and funding options to enhance economic, social and cultural activities.
- **Government to Government Relations:** the ability to engage different ministries, departments, levels of government and other governments (First Nations and non-First Nation) and agencies as an independent government where the Nations' policies and laws provide guidance and shape relations with other governments.
- **Program and Services:** Block funding for programs and services, allowing First Nations to tailor programs and services according to priorities and values.

These findings are consistent with the published research that indicate policies that address social, cultural and land use issues – which modern treaties address – show better outcomes for First Nations people,¹⁰ and that self-government agreements and comprehensive land claim agreements (modern treaties) have a positive impact on CWB scores relative to other forms of agreements.¹¹

Stronger communities

In addition to these accomplishments and benefits, First Nations interviewed found that the treaty negotiations process also created a stronger sense of shared vision for the future that enhanced community identity, pride and nationhood, and developed stronger governance processes and leadership capabilities. Leaders pointed to the need to engage the community as critical to the success of the treaty negotiations process, and the need to sustain the engagement through implementation.

The leaders interviewed believe that social and societal benefits are progressively realized as the Nation establishes government and laws; builds the physical infrastructure supporting an expanded resident population; and increases economic and commercial activities. With the capital transfers indicated in Tables 5 and 6, First Nations leaders indicated during the interviews that their implementation phase focused on investing primarily towards:

- Establishing and upgrading community infrastructure – sewer, water, water treatment, roads (improving local conditions and to improve connection between communities). This is consistent with the economic model in the investment in community projects.
- Establishing a constitution, governance, laws and procedures
- Establishing and expanding the government administration and services
- Improving the capacity and skills of the workforce
- Creating economic activity to generate revenues to sustain the Nation and its government
- Providing a level of initial financial support to address immediate needs. This is anticipated by the economic model in the form of initial consumption.

¹⁰ Kant, Shashi, Ilan Vertinsky, Bin Zheng, and Peggy M. Smith. "Multi-Domain Subjective Well-being of Two Canadian First Nations Communities." Elsevier, 2014.

¹¹ Pendakur, Krishna, and Ravi Pendakur. "An Analysis of the Socio-economic Outcomes of Aboriginal Peoples living in Communities Associated with Self-Government Agreements, 1991-2011." Simon Fraser University, University of Ottawa, 2015.

Undertaking and completing these foundational priorities allows the Nation to later focus and prioritize resources to expand social (health, housing, education, job training, etc.) and culture programs (language, etc.) to meet the needs of the Nation.

Challenges to plan for and overcome during implementation

The initial stages of implementation activities (such as establishing government and laws, building the physical infrastructure supporting an expanded resident population, and increasing economic and commercial activities) occupy significant resources and time. Based on the experience of the early implementers – Nisga'a, Tsawwassen and Maa-nulth – significant capital improvements typically require securing financing which, with the changes resulting from treaty, creates short term challenges in accessing funds. Further, expanded operating scope and responsibilities creates budget pressures as new revenue streams require time to replace prior funding arrangements.

First Nations with a modern treaty expressed an increasing need throughout the negotiation and implementation process for skilled and trained individuals to fill a range of capabilities and roles, from business and financial management through to government administration and regulatory management. These Nations found that training and developing community members greatly eases the transition and establishment of First Nations governments, reducing reliance on external professionals to support governance and daily operations.

Measuring socio-economic benefits of modern treaties

BCTC's desire to identify the socio-economic benefits of treaties is consistent with global trends to develop holistic socio-economic measures that go beyond economic measures (e.g., Gross Domestic Product) and assess the well-being¹² of a country or a region. Progress is being made in standardising socio-economic measures globally through the work of various international agencies and organisations, such as the OECD Better Life Index and the Inequality-adjusted Human Development Index.

Canadian organisations such as the University of Waterloo and Indigenous and Northern Affairs Canada (INAC), which developed the Canadian Index of Well-being (CIW) and the Community Well-being Index (CWB) respectively, have undertaken work in this area, as have community organizations such as Vital Signs Canada, which undertakes annual community check-ups that provide a comprehensive look at how communities across Canada are faring in key quality-of-life areas. The CWB draws on the Household Survey from the Canadian Census, defining a limited set of indices reporting on education, housing, employment and income at the community level for First Nations and non-First Nations communities. The CWB does have its limitations, and the Treaty Implementation Branch of INAC acknowledges that they too do not have an effective system for assessing the impact of modern treaties on the well-being of Aboriginal communities¹³.

There are also a wide range of studies, reports and analysis covering select dimensions of well-being of First Nations (e.g., First Nations Regional Health Survey,¹⁴ Aboriginal Peoples Survey,¹⁵ etc.). One such study analyzed the subjective well-being of people living on reserves in two Canadian First Nations communities, and found social, cultural, and land use (SCLU) not income to be the most important contributor to well-being, and that SCLU factors contributed to satisfaction across all the other domains of education, employment, income, health, and housing.¹⁶ Treaty settlement contributes significantly to addressing these SCLU factors. Table 7 provides an overview of some of the existing measurement approaches.

¹² OECD. "Istanbul Declaration." June 30, 2007.

¹³ Kenny, Alison. "Measuring Aboriginal Community Well-being: A Review of Methodological Approaches and Analysis of AANDC's Practices." Implementation Branch, Treaties and Aboriginal Government Sector, INAC. July 14, 2014.

¹⁴ Published by the First Nations Information Governance Centre (www.fnigc.ca/).

¹⁵ Published by Statistics Canada.

¹⁶ Kant. "Multi-Domain Subjective Well-being of Two Canadian First Nations Communities." Elsevier, 2014.

Table 7: Overview of Canadian socio-economic measurement programs (a sample)

Name of study	Developed by	Features	Limitations
Canadian Index of Well-being (CIW)	An independent group of national and international researchers and organizations (hosted by the University of Waterloo)	Indices are socially driven, and reflect the 8 things that really matter to Canadians (First Nations perspectives included)	Not a tool for tracking changes at the community level; it is only within the current capacity to collect and report on data at the national level with some provincial disaggregation
Indicators of Well-being in Canada (IWC)	Employment and Social Development Canada	Adaptation of the CIW Based on publicly and readily available information collected and reported by Statistics Canada	In some cases Statistics Canada administers particular surveys and collects data on behalf of ESDC, resulting in dependencies related to funding, scheduling, and data release
Community Well-Being Index (CWB)	Indigenous and Northern Affairs Canada (INAC)	Produced regularly (after each census), based on publicly and readily available data Aims to report at the community level, providing the ability to compare well-being between First Nations and non-First Nations communities	Measures four dimensions of well-being (Education, Labour Force Activity, Income, and Housing) Health, environment, community, civic engagement, etc. are not measured Communities that are too small or do not have sufficient response rates are excluded
Beyond Zero Harm (BZH) Framework	Working group comprised of members from the Devonshire Initiative, IAMGOLD, and rePlan	Framework is based on two types of indicators for well-being – those that are pre-defined (Core Indicators) and those that are community-defined (Co-Created Indicators); the combination of indicators ensures relevance to global development standards and the local contexts	Aims to measure and demonstrate the changes in well-being in small communities It is not designed to be scaled up nationally

Upon reviewing these programs, and after taking into account the Centre for the Study of Living Standards' study¹⁷ which surveyed 38 sets of indicators (or composite measures) of well-being developed by Canadian and internal organisations, the following general observations can be made:

- The methodology for developing indicators can be organization-driven (e.g. IWC and CWB) or community-driven where communities are engaged in developing of indicators and measures (e.g. CIW and BZH).
- The indicators of well-being are predominately based on objective (quantitative) data, though the CIW and BZH models also include subjective (qualitative) data.
- There is significant overlap in the dimensions of well-being indicators – common ones include Education, Health, Income, and Employment. Many models include between 8 and 10 different dimensions.
- No one model, in its current form, is suitable to assess the socio-economic benefits of treaties; all would require some level of customisation.

¹⁷ Sharpe, Andrew and Jeremy Smith. "Measuring the Impact of Research on Well-being: A Survey of Indicators of Well-being." Centre for the Study of Living Standards. February 2005.

A look at existing frameworks – in First Nations with a treaty

Three First Nations in BC are establishing measurement programs. These initiatives aim to ascertain the broader socio-economic indicators that will help measure and report on progress in community well-being due to treaty. The three Nations and their measurement programs are:

- Tsawwassen First Nation: Post-Treaty Community Well-Being Study
- Nisga'a Lisims Government: Quality of Life Survey
- Maa-nulth First Nations: 15 Year Periodic Review

All three Nations are either developing a baseline or undertaking a reasonable estimate of their baseline prior to treaty. The following table provides an overview of these programs, while details on each of these three programs are provided in Appendix F.

Table 8: Overview of First Nations socio-economic measurement programs

Name of study	Developed by	Activities to date	Activities to come
Post-Treaty Community Well-Being Study	Tsawwassen First Nation	<p>A two-part study:</p> <p>Part 1 – quantitative data on income, education and health</p> <p>Part 2 – qualitative data on members' experience in school and degree of impact on well-being, sense of community, trust and governance, and perception of the Nation and life post-treaty</p> <p>Data collected through face-to-face interviews with 60% of the population</p> <p>Analysed and presented data (in 5 separate reports) that has improved the leaders' decision-making ability, the administrator's reporting ability, and the community's access to information</p>	<p>Administer an interim study in 2017 focusing on quantitative data (Part 1), and a complete version of a full study (Part 1 and 2) in 2022</p> <p>Compare TFN data to nationally available data to understand how TFN compares to other communities, both First Nations and non-First Nations</p>
15 Year Periodic Review	Maa-nulth First Nations	<p>A two-part study</p> <p>Part 1 – measures the impact of treaty (core indicators such as Lands, Taxation, Artefacts, Heritage Sites and Place Names)</p> <p>Part 2 – measures changes to environmental, social and economic dimensions (value indicators such as taking only what we need and contributing back to the land; becoming teachers and leaders in our culture; a future that brings new economic activities and revenues to our members)</p> <p>Nations have been collecting data and producing summary reports on core indicators since 2012; the Maa-nulth tripartite has been producing an annual report for non-members</p>	<p>Each of the 5 Nations to implement the study on value indicators</p> <p>Evaluates progress against the Maa-nulth Final Agreement (MFA) at the 15-Year Review</p>

Name of study	Developed by	Activities to date	Activities to come
Quality of Life (QoL) Survey	Nisga'a Lisims Government	Collected community input from 100+ members on what QoL means to them Feedback informed the development of a framework to measure QoL for Nisga'a Lisims Framework based on nine dimensions of Nisga'a well-being: culture, language, family, health, governance, equality, environment, economy, and education	Present validated framework to leadership for approval Begin developing the survey tool Establish 2015 baseline

Upon reviewing these initiatives, the following general observations can be made:

- All three First Nations believe that it's important to undertake a measurement program. It provides their Nation and leaders with a sense of accountability, and it allows them to measure progress
- A key value of the measurement program is community engagement
 - The process of developing these programs (much like the process of negotiating a treaty) is beneficial in and of itself, leading to strengthened community engagement
 - Community involvement in the indicator development process has resulted in a tool that reflects the interests of the community
 - In the case of TFN, it is believed that the tool's relevancy helped secure higher response rates
- There is a bias for face-to-face data collection
 - There is more comfort and willingness to participate
 - Helps avoid self-selection bias that may result from online / mail out survey
- Small communities will need to collect data from a large sample size (at least 60% of the population) to ensure that data is statistically valid
- Cost, time and skillsets are all barriers that need to be overcome

Standardising socio-economic measurement programs

The challenge with measuring societal progress beyond conventional economic measures such as GDP per capita has been constructing a scale to reasonably represent a multidimensional nature of human well-being.¹⁸ Though progress is being made by Canadian organisations to collect and analyse data on well-being or socio-economic measures, these programs are mostly national and provincial in scope and do not provide consistent analysis and reporting at the community level. The CWB Index reports on a limited set of indicators over the longest period (1981 to 2011) whereas the CIW reports on a broad set of indicators at the national and provincial level with some application for municipalities and large communities.

Despite the progress that has been made by First Nations to collect and analyse data specific to their community and treaty, each are using different frameworks to capture and report on the progress and benefits that treaties have for First Nations communities. This creates challenges in reporting and comparing across different communities. Table 9 on the following page provides a list of well-being domains as measured by those interviewed for this report. The red boxes highlight the overlap in domains measured by each group:

¹⁸ Michalos, A.C., Smale, B., Labonté, R., Muharjarine, N., Scott, K., Moore, K., Swystun, L., Holden, B., Bernardin, H., Dunning, B., Graham, P., Guhn, M., Gadermann, A.M., Zumbo, B.D., Morgan, A., Brooker, A.-S., & Hyman, I. (2011). The Canadian Index of Well-being. Technical Report 1.0. Waterloo, ON: Canadian Index of Well-being and University of Waterloo.

Table 9: Comparison of measurement programs and their dimensions

Tsawwassen First Nation	Nisga'a Lisims Government	Maa-nulth First Nations	Canadian Index of Well-being
Individual health	Health	Health	Healthy populations
Education	Education	Education	Education
Living standards	Economy	Living standards Economy	Economy
Community engagement and trust		Community engagement	Democratic engagement
Senses of community or community health		Sense of community	Community vitality
	Environment	Environment	Environment
	Culture and language	Culture and language	Leisure & culture
	Equality	Equality	
	Family		
		Time use	
	Governance		

There is an opportunity to build on the measurement frameworks developed by Tsawwassen, Nisga'a and Maa-nulth, supplemented with the work of other institutions and agencies, to identify a common set of measures that First Nations should consider prior to implementing a modern treaty. Establishing a standard measurement program would build on the experience from the early implementers of treaties, and would provide a more cost effective approach to executing this work.

A common measurement framework

Moving forward with measures starts with a deep appreciation for how powerful data can be for First Nations; measurement matters because it leads to:

- **Self-assessment:** data is used to convey progress or improvement, and provides a basis for comparison relative to other similar groups.
- **Increased transparency and accountability:** data is used to describe how public assets are being directed, which helps achieve a more transparent and accountable government.
- **Focused policy development:** data is used to identify areas where greater investments are needed, or where / how to shift priorities in spending or program delivery.
- **Improved decision making:** data is used to help focus service delivery and prioritisation of services and programs.

For Nations that are implementing a treaty, the transition towards self-government is a significant and complex change. A measurement program enables First Nations to track how they are advancing towards their vision for the Nation, and how the Nation's well-being is improving in accordance with what is valued by the community.

A socio-economic measurement program for First Nations in BC would achieve multiple objectives. First, it would establish a baseline against which socio-economic changes could be tracked. Second, it would allow Nations to evaluate how their well-being compares to available national / provincial data and trends, which could inform decisions and policies aimed at closing the gap between First Nation and non-First Nation communities. Lastly, for First Nations it provides insight to how the well-being of their community is impacted by a treaty.

Socio-economic frameworks measuring well-being in a holistic manner are commonly made up of two parts, core indicators and community specific indicators:

- **Core indicators** are measures common to all that adopt the framework. By their very nature, core indicators provide consistency and comparability. In the context of measuring the impact or benefit of modern treaties, core indicators represent the minimum that Nations would measure, analyse and report.
- **Community specific indicators** are unique to each Nation or treaty, reflecting what matters most to the local citizens or members. In the context of measuring the impact or benefit of modern treaties, community specific indicators represent aspects of a treaty that are important to citizens of that Nation.

Core indicators

Core indicators are generally grouped into categories, or domains. According to the CIW at the University of Waterloo, most of the phenomena relevant to human well-being at the present time can be grouped into eight domains. Based on this assessment and agreement, the CIW was developed which measures the following eight domains:

1. Education
2. Healthy populations
3. Living standards
4. Community vitality
5. Democratic engagement
6. Environment

7. Leisure and culture
8. Time use

Each domain includes a set of core indicators that, typically, are developed and / or selected based on pre-determined criteria. Nations can define the criteria as they see fit, but at a minimum the core indicators must be relevant to global development standards; and allow for comparison with other geographies and groups. The table below provides some sample indicators for consideration:

Sample core indicators¹⁹

Domain	Sample core indicators ²⁰
Education	Percentage of 20 to 24 year olds in population completing high school
Healthy populations	Percentage with self-reported diabetes
Living standards	Percentage of persons with low incomes
Community vitality	Percentage reporting very or somewhat strong sense of belonging to community
Democratic engagement	Percentage who feel policies of the local government have made them better off
Environment	Percentage who participated in resource conservation and sustainable activities during the past 12 months
Leisure and culture	Average number of time spent on cultural activities during the past month
Time use	Percentage of 65 years and older reporting daily active leisure activities

Community specific indicators

Well-being for First Nations is closely linked to cultural continuity and the integration of culture and language in business, governance and day-to-day interactions. Factors of cultural continuity include: self-government, land claims, education, health, cultural practices (including use of traditional language, participation in traditional forms of spirituality or ritual, traditional use of lands and resources), and police / firefighting infrastructure.²¹ Though education and health already figure amongst the dimensions of core indicators, some or all of the other measures of cultural continuity could be considered as community specific indicators. The list of potential community specific indicators developed by the Assembly of First Nations (AFN) as part of the initial development of its *Closing the Gap Reporting Framework* could supplement measures linked specifically to a Nation's treaty settlement.

The importance of measuring

As Nations move towards increased levels of self-government and take greater control of their own socio-economic development and future, it is important to assess and report on the progress and impact of their decisions and actions in the community.

¹⁹ An indicator describes, in statistical terms, aspects of a domain that is of primary concern.

²⁰ These sample indicators are provided as examples and have been extracted from the University of Waterloo's national, provincial and / or community survey.

²¹ Chandler, Michael J. and Christopher Lalonde. "Cultural Continuity as a Hedge Against Suicide in Canada's First Nations." University of British Columbia, 1998.

Conclusion

Modern treaties are one of several choices First Nations in BC have to create culturally relevant governance structures, pursue economic development opportunities and continue moving towards independence. This report builds on previous work, updating the potential financial and economic benefits of modern treaties, and begins to develop an understanding of the broader socio-economic benefits of modern treaties for First Nations people. Our research and interviews supports the perspective that First Nations benefit from engaging in the treaty negotiations process in both financial and socio-economic factors (based on a limited set of domains and data).

Our work underscores the need for a common and sustained measurement framework and approach to better quantify the impact and benefit of modern treaties. The measurement framework must be relevant to First Nations communities and overcome the key challenge of collecting community-level data that support the reporting and tracking of community well-being.

Developing a common measurement framework that addresses both financial and socio-economic factors that incorporate community-level data collection and analysis for First Nations and Nations engaged in the treaty negotiations process will provide a common quantitative base to determine the impacts and benefits of modern treaties. A common and sustained approach to measurement developed for First Nations with a treaty can be extended to benefit all First Nations communities whether pursuing a treaty or other forms of agreement.

Appendix A

Interviewed Nations

Nation	Level of Governance
L'heidi T'enneh	Sectoral Arrangement
McLeod Lake	Sectoral Arrangement
Tsawwassen	Treaty
Maa-nulth	Treaty
Tla'amin	Treaty
Nisga'a	Treaty
Huu-ay-aht	Treaty
Toquaht	Treaty
In-shuck-ch	Non-Treaty (currently working towards ratification)

Appendix B

Lessons learned from the treaty experience

This is a summary of lessons learned from our interviews with Nations engaged in the treaty negotiations process. There are four key lessons learned that are further elaborated on in this section.

Implementation planning

Nations interviewed feel the implementation effort is greater than anticipated. What the participants identified was the combination of the significance of the work and the amount of different work (establishing new governance, setting laws, policies and procedures, economic development, infrastructure, and social / cultural projects), combined with the need to acquire and develop new skills and capabilities.

- Nations need to ensure that implementation costs are adequately estimated and budgeted.
- Nations that conduct annual reviews of the implementation process have a better understanding of their progress and success factors.
- Most Nations will need to plan for capacity development and support during the implementation process.

Capacity development

Nations have indicated that training community members, pre and post-treaty, greatly eases the transition and reduces the amount of external professionals that need to be hired to support governance, implementation and daily operations. Some Nations have expressed the need for training in the following areas:

- Business management
- Accounting
- Taxation implementation and management
- Financial management
- Trust and advisory board development
- Policy development
- Government administration
- Municipality and regulatory training (i.e. permits and licenses)
- New job development, process development, transactional procedures and new job descriptions.
- Administration
- Trades

Engagement and Communication

Nations have indicated that communication and engagement is integral to treaty success, particularly in terms of remaining in regular communication with members and with other First Nations during the negotiations and the implementation process.

Nations indicated that a community engagement strategy and communication plan with members would increase their ability to pass laws and ratify the treaty. Implementation of a community engagement strategy and communications plan keeps members informed on the core issues.

Nations indicated they have benefitted from requesting support from other Nations that have successfully settled and are implementing a modern treaty. Learning from others helps to better understand the journey ahead and improve planning and preparation.

Developing a new relationship between Nations and government

First Nations are establishing a new relationship with Canada through the treaty negotiations process. The treaty negotiations process is acknowledged to be a “capacity builder,” as Nations become accustomed to process while developing their own procedural capabilities. Nations have stated that developing new government-to-government relationships requires effort on both sides, with both entities engaged in the success of the other. The treaty negotiations process sets the foundation for building this new relationship.

Appendix C

Financial economic model

Review of economic benefit model

The purpose of this section is to revalidate the conclusions of prior economic impact studies carried out for BCTC which have concluded that treaties are good for BC on an economic basis.

This analysis is a high level verification that there is a net economic benefit to British Columbia from treaties. It is not a comprehensive quantification of benefits, nor is it intended to allow for a comparison of how economic benefits may have changed from previous analyses.

In November 2009, PricewaterhouseCoopers LLP prepared an assessment of the “Financial and Economic Impacts of Treaty Settlements in BC” (the Report). The Report used a comprehensive economic impact model that quantified numerous direct and indirect benefits from treaties in BC, and included estimates of the costs to British Columbians in determining the net economic benefit. The most notable conclusion from the Report was that, based on the assumptions used in the analysis, there is a significant net economic benefit to British Columbia from the negotiation of treaties with First Nations.

The results of the Report show that the vast majority of economic benefits from treaties are generated by cash compensation and resource revenue sharing (RRS), which collectively contribute approximately 95% of the gross benefits. As the model was developed to understand the impact of treaties in British Columbia, the model considers the cost to British Columbians as the province’s share of these components of the treaties, which is generally 17% of the cash settlement (subject to adjustment for the land contribution from the province) and 50% of the RRS cost, adjusted for BC’s share of the federal government’s contribution.

Given the significance of these two components of treaties to the overall net benefits, and reflecting the high level nature of this update, we have focused this analysis on only these two aspects.

Model validation

The Report reviewed treaty negotiations that had occurred up to 2009, and included the following notable assumptions:

- 60 treaties were assumed to be settled, with three scenarios reflecting different rates of completion (15, 20 and 30 years until 60 treaties were settled).
- The calculation of benefits was based on a projection of the number of beneficiaries per treaty and the assumed quantum of benefits per beneficiary. The average number of beneficiaries per treaty was calculated to be 2,127, based on the 2009 population of BC Status Indians divided by 60 treaties.
- The assumed benefits per beneficiary for the most significant aspects of the treaties were:
 - Cash settlement per beneficiary: \$53,200, paid out over 10 years; and
 - Resource revenue sharing: \$600 per beneficiary per year for 25 years.

It is important to recognize that the Report was forward looking, was based on the most recent treaty settlements, and used a “normalized approach” to forecast the outcomes of treaties such that the same general benefits were assumed for each treaty. The individual outcomes of each treaty are very different, which is a function of the specific locations and characteristics of each First Nation, so it is not possible to forecast the outcomes on a treaty-by-treaty basis over the long term. Accordingly, there is an inherent assumption within the approach, which we have also made, that even though the allocation of total benefits will differ from one treaty to another (between, for example, land allocation, capital transfers, resource

revenue sharing, resource tenures, etc.), the overall sum of the economic benefits will be comparable on a per beneficiary basis.

Based on the above, we have prepared a high level calculation of the net benefits to British Columbia of treaties focusing only on normalized assumptions for total cash compensation and resource revenue sharing. We have updated the assumptions, as noted below:

- We have assumed that the total number of treaties will be lower than in the previous report, to reflect a greater incidence of alternatives to treaties (such as Sectoral and self-government agreements), and that the pace of treaty settlements will be slower. We have assumed a total of 30 treaties will be settled over a period of 15 years.
- Rather than using a province-wide average population and treaty settlement assumption to determine the average number of beneficiaries per treaty, we have determined the average number of beneficiaries per treaty based on the average of the modern treaties settled. For the treaties that have been settled or are in Stage 5 (Final Agreement), the average population is approximately 1,200. We have assumed that the First Nation population per treaty will increase at an average annual rate of 2.0%, based on the national annual average growth rate for Status Indians from 2006 to 2011.
- The assumed benefits per beneficiary for the most significant aspects of the treaties have been updated as follows:
 - Cash settlement: Following the Report, the Maa-nulth First Nations Treaties progressed from Agreement in Principle (AIP) to Final Agreement, and the capital transfer component increased from a total of \$62.5 million at the AIP stage to \$73.1 million in the Final Agreement. This represents an increase per beneficiary of approximately \$5,400. Accordingly, we have increased the assumed total cash compensation per beneficiary to \$61,700 to account for the latest settlements and inflation.
 - Resource revenue sharing: We have increased the payment to \$700 per beneficiary per year for 25 years to reflect the most recent settlements and inflation.

Economic analysis update findings

The chart below summarizes the findings of the economic analysis update. As noted above, the analysis focusses on only the two most significant direct economic impacts from treaties, and due to differing assumptions is not comparable to previous studies.

Economic update results summary

Total treaties to be settled	30
Years until these treaties are settled	15
Cash settlement (\$m)	3,219
Resource revenue sharing	2,664
Total benefits (cash and RRS only)	5,883
Less:	15
BC share of cash compensation	(892)
BC share of RRS	(1,504)
Total cost to BC	(2,396)
Net financial benefits (\$m)	3,487
Net Present Value of net financial benefits (\$m)	1,751

The calculation of the Net Present Value uses a 3.5% discount rate applied to the future cash flows based on the deferred payments of the cash compensation over 10 years and the RRS over 25 years, both of which are indexed to inflation.

Economic analysis of First Nations in advanced negotiations

We have also conducted a similar analysis on a subset of the First Nations in the treaty negotiations process representing eleven treaties which are deemed to be the most likely to settle within the next few years.

This analysis is based on the same model used above, but applied to each treaty separately. For those treaties for which the financial details are publically available, the information has been used in the model. For the others, the normalized inputs have been applied to the actual current beneficiary populations. For each treaty, a specific settlement date has been assumed.

Total treaties to be settled	11
Years until all these treaties are settled	2016-2024
Total cash settlement (\$m)	736
Resource revenue sharing	478
Total benefits (cash and RRS only)	1,214
Less:	
BC share of cash compensation	(204)
BC share of RRS	(270)
Total cost to BC	(474)
Net financial benefits (\$m)	740
Net Present Value of net financial benefits (\$m)	625

While the above analysis only addresses the two most significant contributors to the net benefit, the bases for the other smaller direct and other indirect benefits have not changed, so it can be concluded that they also provide a net benefit to British Columbia as concluded in the previous report.

In conclusion, our analysis re-affirms that there is a net economic benefit to BC from treaty settlements.

Appendix D

Other benefits of treaties

	<i>Indian Act</i>	Sectoral Agreements	Modern Treaties
Historical Context	No framework for reconciliation.	No framework for reconciliation.	Framework and process for reconciliation in line with UNDRIP and protected under Section 35 of the Canadian Constitution.
Governance	Structure of Chief and Council defined in the <i>Indian Act</i> .	Under Elections Code specific elements of First Nation government defined within the context of the <i>Indian Act</i> .	Defines culturally relevant governance that addresses traditional practices and incorporates modern concepts.
Government	Structure of Chief and Council defined in the <i>Indian Act</i> .	Under Elections Code specific elements of First Nation government defined within the context of the <i>Indian Act</i> .	Defines culturally relevant government institutions developing and establishing legislation and regulatory framework.
Society	Based on definition in the <i>Indian Act</i> .	Based on definition in the <i>Indian Act</i> .	Defines citizenship – identity, rights and values in a constitution.
Culture	Not defined or protected.	Not defined or protected.	Protect and grow culture and nurture cultural practices.
Harvesting Rights	Not defined or protected.	Not defined or protected.	Defines and protects traditional harvesting practices and the associated resource base.
Traditional Practices	Not defined or protected.	Not defined or protected.	Defines and protects traditional practices such as hunting trapping and fishing with the relevant regulatory framework and legislation.
Capacity Building	N/A	N/A	Resources provided to build capacity to engage in the treaty negotiations process. Development programs established to build a range a capacity during implementation.
Lands and Land Use	Management of reserve lands only with administration by the Government of Canada.	Under Land Code, management of reserve lands only with local administration.	Management and stewardship defined by the First Nation.
Economic Development	N/A	N/A	Economic potential of land base accessible supplemented with clarity in legislative and regulatory framework.

	<i>Indian Act</i>	Sectoral Agreements	Modern Treaties
Financial Sustainability	N/A	N/A	Capital transfers and resource revenue sharing provide long term financial sustainability.
Government to Government Relations	N/A	N/A	Government-to-government relations defined through Intergovernmental Framework in treaty.
Program and Services	Annual program funding provided from the Government of Canada.	Annual program funding provided from the Government of Canada.	Block funding enabling long term planning and program design to sustain service delivery. First Nations governments generate revenues through economic activity and land use.

Appendix E

Overview of well-being studies in First Nations

Overview of Tsawwassen study

The following table provides an overview of TFN's Post-Treaty Community Well-Being Study.

Tsawwassen First Nation – Post-Treaty Community Well-Being Study	
Purpose	Framework
<ul style="list-style-type: none"> • Collect baseline socio-economic data • Know how treaty impacts how people express their culture, how they view government, how they view community cohesion • Track change and the impact of government decisions over time • Understand how TFN compares to other communities, First Nations and non-First Nations; TFN's goal is to narrow the gap between the outcomes that exist within the community and elsewhere 	<p>The survey, measures satisfaction with life as a whole, using the following indicators:</p> <ul style="list-style-type: none"> • Individual health • Sense of community or community health • Community engagement and trust • Education • Living standards <p>The indicators were developed based on existing literature, existing indices and extensive community consultation. Indicators are measured through a mix of closed-ended and open-ended questions that provide quantitative and qualitative data on well-being (e.g. how well you feel about your life). Many of the closed-ended questions are structured like the census, while the open-ended questions are designed to get at the process that might underlie aspects of well-being at TFN and perceptions of the treaty.</p>
Methodology	<p><u>Survey development</u></p> <ul style="list-style-type: none"> • Two-part survey design: <ol style="list-style-type: none"> 1) First part draws from existing measurement programs such as the census and general social surveys and world values surveys 2) Second part comprised of extensive community consultations to ensure that the questions being asked reflected how the TFN Membership understands well-being <p><u>Survey administration</u></p> <ul style="list-style-type: none"> • Completed one round of data collection • Administered in 2012, close to TFN's effective date to collect baseline data prior to the treaty impacting TFN and the well-being of members • Most data was collected through in-person interviews over a six month period; TFN held a members gathering (remote members were flown in) to facilitate the process, at which time members were consulted on a number of projects and also participated in the well-being study • 60% response rate reflecting TFN's demographics (age, gender, residency on / off reserve) • Honorarium paid for interviewee's time (1-2 hours) • Plan to repeat the survey every 5 years (like the census), possibly with a pared down version in 2017 that repeats the first part of the survey, and a complete version in 2022 that repeats

Tsawwassen First Nation – Post-Treaty Community Well-Being Study

Issues		
	<p><u>Data analysis</u></p> <ul style="list-style-type: none"> Challenge with measuring the performance of programs as small sample size skews outcomes (e.g. graduation rate might be 100% one year, but maybe only had 3 students eligible for graduation that year) Plan to do stand-alone benchmarking when the time / resources permit <p><u>Data privacy and confidentiality</u></p> <ul style="list-style-type: none"> Contracting out data collection to a 3rd party helped with collecting confidential information (e.g. members' thoughts about TFN government, personal info on health / substance abuse) TFN owns the data but the data resides at UBC; a protocol agreement outlines who can use the data and how 	
	Outcomes	Key success factors
	<p><u>Reporting</u></p> <ul style="list-style-type: none"> Produced four reports between spring 2013 and winter 2015 1st report based on quantitative data 2nd report on well-being and satisfaction, reported on member satisfaction on four dimensions: <ol style="list-style-type: none"> Income, employment and living conditions Education and experience in school Health and relationship with other members Trust in others 3rd report on culture 4th report on trust and government; based on qualitative data, and includes regression analysis to determine which indicators have the greatest impact on well-being (as defined by TFN) <p><u>Benefits</u></p> <p><i>Members have access to information</i></p> <ul style="list-style-type: none"> TFN produced a version of the 1st report for all members with a presentation on the study's results <p><i>Leaders make informed decisions</i></p> <ul style="list-style-type: none"> Provides input for planning. The income data obtained through the survey is more robust which helps TFN better understand the cost implications of various policy options Helps leaders define priorities. For example, survey indicated that 'encouraging a strong economy' and 'ensuring land development occurs sustainably' had the strongest relationship with Tsawwassen Government approval <p><i>Administrators know what to focus on</i></p> <ul style="list-style-type: none"> Helps with reporting and with communicating status / progress 	<p>Based on TFN's experience, the following key factors have contributed to the study's success:</p> <ul style="list-style-type: none"> TFN developed its first strategic plan in 2008, one year prior to signing the treaty; the process involved a significant community input, and resulted in clear priorities for the Nation which help shape the objectives of the community well-being survey A bottom up approach to developing the survey tool helped ensure that the end result reflects what is important to TFN as a community Having a member coordinate the interviews and explain the objectives of the study helped to inform the community and foster a high level of compliance The 3rd party research team established good relations with the community, which facilitated data collection Support from leadership

Overview of Maa-nulth study

The following table provides an overview of how MFN measure the impact of the treaty.

Maa-nulth First Nations – 15 Year Periodic Review	
Purpose	Framework
<ul style="list-style-type: none"> To have substantiating documentation to the effectiveness of the Maa-nulth Final Agreement (MFA) at the 15-Year Review Opportunity for tripartite (Maa-nulth First Nations, provincial and federal governments) to assess how implementation is going and to make improvements as required 	<p>The study is structured in two-parts:</p> <ol style="list-style-type: none"> Core indicators which provide data to measure the impact of the treaty, such as: <ul style="list-style-type: none"> Lands Taxation Artefacts, Heritage Sites and Place Names Value indicators which provide data to measure changes to environmental, social and economic dimensions, such as: <ul style="list-style-type: none"> Percent of people who harvest wild foods – hunting, fishing, gathering plants (child, youth, adult, elder) Percent of people who use traditional medicines Number of businesses on reserve <p>The framework for the value indicators is common to all 5 Nations, though indicators are unique and were developed by each Nation</p>
Methodology	<p><u>Survey development</u></p> <ul style="list-style-type: none"> <i>Core indicators</i>: drawn directly from chapters in the treaty; established a minimum of 2-3 indicators for each chapter; the draft list of indicators was shared with representatives from each Nation who then consulted with their community; Maa-nulth Treaty Society Board of Directors (which includes leadership from each of the five Maa-nulth Nations) approved the list of core indicators <i>Values indicators</i>: indicators from the treaty that were deemed not core indicators; the list was expanded after consultation with the development team and representatives from each Nation; each Nation then reviewed the list to ensure that it was comprehensive Community consultation was done at the annual assembly to ensure that the views of all demographics were captured List of core and values indicators were signed off on in April 2012 <p><u>Survey administration</u></p> <ul style="list-style-type: none"> <i>Core indicators</i>: since 2012, each Nation has been tracking these indicators annually <i>Values indicators</i>: Nations have not yet implemented this study due to budgetary constraints <p><u>Reporting</u></p> <ul style="list-style-type: none"> <i>Core indicators</i>: report produced annually with a summary report produced by all Maa-nulth Nations delivered to legislature / council
	Data

Outcomes	Key success factors
<p><u>Informed decision-making</u></p> <ul style="list-style-type: none"> Helps with decision making, and with investment decisions <p><u>Improved resource management</u></p> <ul style="list-style-type: none"> Helps with the management of the fishery and improvements to harvesting and distribution of food fish 	<p>Based on MFN's experience, the following key factors have contributed to the measurement program's success:</p> <ul style="list-style-type: none"> Representatives from each Nation who participated were well connected to their community; these representatives were responsible for their Nation's communications, were highly trained, and came on for the ratification of the constitution, which meant that they were intricately connected to their Nation's members; all were familiar with databases, membership information, and familiar with the treaty; most if not all were members of their communities A high level of importance was placed on getting the indicators right at the start; this was done by ensuring that indicators were deemed reliable, repeatedly re-measurable, and cost effective to track; because trending was key to measuring the effectiveness of the MFA over time, it was also important that the indicators not change Data collection was a challenge in the beginning, largely because people did not feel connected to the 15 year review; once they bought into the benefits of measurement, the data collection process was greatly facilitated

Overview of Nisga'a study

The following table provides an overview of NLG's Quality of Life (QoL) framework.

Nisga'a Lisims Government – Quality of Life (QoL) Survey	
Purpose	Framework
<ul style="list-style-type: none"> To measure QoL, and see how to improve QoL To establish a baseline, and to measure the Nation's growth To benchmark against national results, and against other Indigenous groups 	<p>Based on eight groupings, each with their own sub-groupings:</p> <ul style="list-style-type: none"> Culture and language <ul style="list-style-type: none"> Sub-grouping: access to traditional foods, feasting, tradition, culturally involved families, connection to land, Nisga'a language Family Health Governance Equality Environment Economy Education
Methodology	<p><u>Framework development</u></p> <ul style="list-style-type: none"> Led by working group (45 people representing various NLG agencies – school district, elders, youth association, social development, etc.) Examined all available census / survey data (within BC, Canada, and Australia) that was relevant to Aboriginal communities and to Nisga'a Commissioned a video to solicit input from the community to define the meaning of QoL Framework presented to the Annual General Assembly, obtained validation from members Present validated framework to leadership for approval <p><u>Data collection</u></p> <ul style="list-style-type: none"> Intend to develop online and paper survey; survey will be translated into Nisga'a forelders Method: 100% face-to-face interviews To be representative of demographics; will interview those 15 years and up, and will collect anecdotal information from younger children through the youth council Intend to survey every five years, and a pulse survey every 18-24 months (core components to be included in the pulse are still undetermined) <p><u>Data analysis</u></p> <ul style="list-style-type: none"> Intend to benchmark against available third party data (e.g. Nisga'a Valley Health Authority, regional / provincial school districts, various government agencies such as Nisga'a Citizenship, etc.)
Issues	<p><u>Data privacy and confidentiality</u></p> <ul style="list-style-type: none"> Intend to host data in NLG; governance of that data is a known issue that has not yet been resolved, need to bring in policy to ensure that data is used appropriately

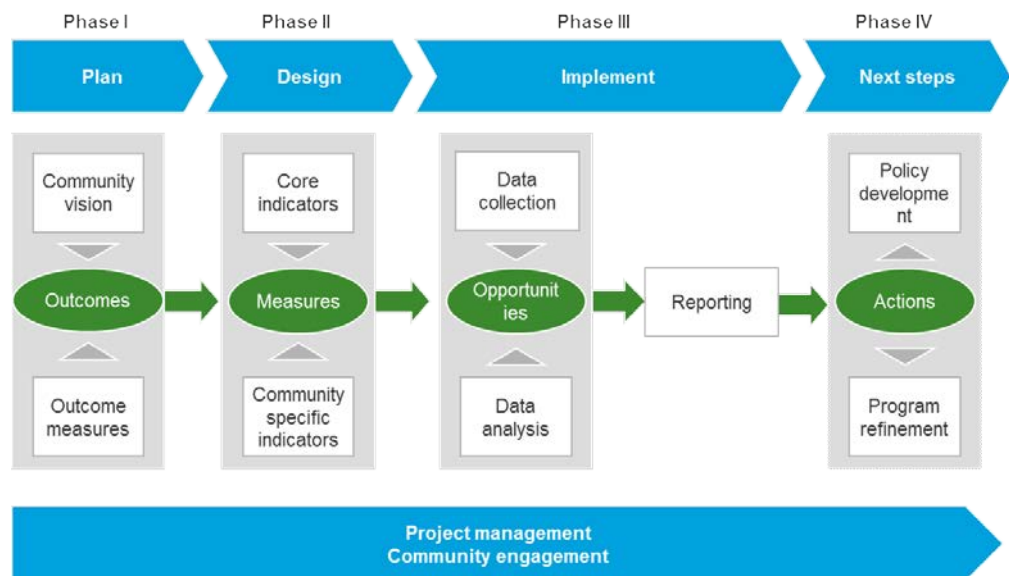
Outcomes	Lessons learned
<ul style="list-style-type: none"> Expect that the study will reveal how effective NLG's programs are (e.g. health delivery, level of education), and identify gaps that need to be filled (i.e. where NLG wants to be vs. where they are) Expect to amend policies and programs based on results, to achieve growth and increased QoL 	<p>Based on NLG's experience thus far, the following lessons have been learned:</p> <p>Need 1 or 2 champions to see the initiative through</p> <ul style="list-style-type: none"> This is new, and there are many other priorities. Having elected officials champion to help execute the strategy is important <p>Need support from a strong team</p> <ul style="list-style-type: none"> NLG is benefitting from the expertise of an economist and from having a strong technical team; the team will be further supported with the hiring of a data analyst who will manage the data <p>Keep up communications</p> <ul style="list-style-type: none"> It's important to sustain the dialogue amongst members of the working group during and between meetings to keep the level of commitment high

Appendix F

An approach to tracking socio-economic progress

The following approach is a four-phase process for discussing, defining, measuring and analysing community well-being. The approach is presented to support dialogue, better data and ultimately better decision-making within First Nation communities.

Approach to tracking socio-economic progress



This approach would result in Nations adopting a set of core indicators that would provide them with comparability against other First Nations and non-First Nations communities, while also having the choice to develop a set of unique indicators should there be community specific things they want to measure.

Phase I – Plan

The focus of the planning phase is consultation and engagement with the community that is the subject of measurement. This phase should result in a clear view of what needs to be measured based on what is of interest to the community and its leaders.

Define community vision

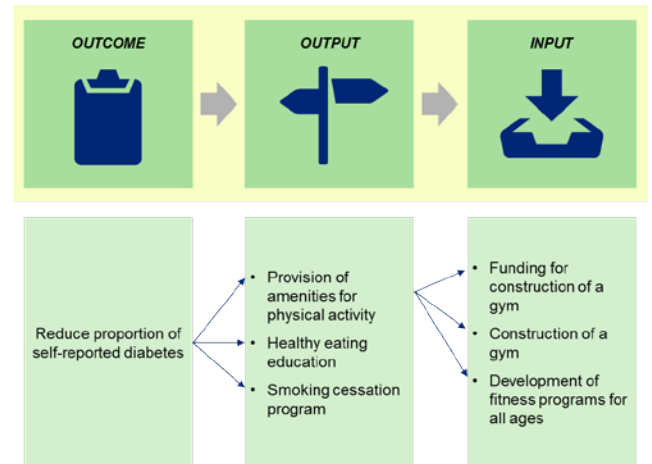
The exercise of defining the community's vision aims to answer the question: "What should the Nation be like in the longer-term?" This step is typically achieved through facilitated workshops, and is highly beneficial in terms of community engagement. The vision can then help define the objectives of the measurement program, and can be linked to shorter-term actions, the results of which can be tracked over time.

Create outcome measures

The exercise of creating outcome measures involves translating the Nation's vision into a series of measurable outcomes that sets the basis for a series of social and economic choices.

The objective of this step is to answer the question: "What do we want to see?" (outcome). This can then lead the Nation towards discussions about "What do we need to do to attain the desired outcome?" (outputs), and "What resources will we need to reach that goal?" (inputs).

Through these discussions, the Nation is able to build consensus and clarity on the key decisions and trade-offs that are required. Once the outcome measures are defined, the Nation is in a position to set goals and measure progress.



Phase II – Build

The focus of the build phase is developing the indicators that will measure what is important to the community.

Develop core and community specific indicators

With the vision and outcome measures defined, the Nation is then ready to review the measures that are shared or are more common across different communities and for which a level of comparability is desired (i.e. core indicators), and determine which ones to track. To supplement this, the Nation also has the opportunity to develop additional (community specific) measures not already captured in the list of core indicators.

This step provides community members with the opportunity to participate in community consultation (e.g. through a facilitated workshop) that aims to define well-being from their perspective. This feedback is then translated into specific indicators with consideration for how the indicator will be measured (i.e. what specific information is required to measure the indicator), and how inputs will be collected (e.g. from survey participants, from local / regional data sources). The draft community specific indicators are then validated with community stakeholders.

Phase III – Implement

The focus of the implementation phase is capturing and analysing data related to each indicator.

Collect data

In this step, a data collection plan is developed and data is collected.

This process will need to consider:

- **Data sources:** what are the Nation's existing data sources, and what new information will need to be collected from the community and from third party sources.
- **Data management:** what is the secure system in which data will be inputted, and where will it be located.
- **Data collection methods and tools:** whether the decision is to conduct face-to-face interviews, an online / paper survey, or a combination of tools will need to be developed to gather data.
- **Confidentiality and privacy:** to encourage participation and to protect the privacy of respondents, any survey that is developed will need to be designed such that the participants' individual responses cannot be matched with specific information at the time of data analysis and reporting.
- **Sample size:** Given the predominance of small populations within First Nation communities, it becomes all the more important to ensure that sufficient data is collected to accurately portray the well-being of the population in question. Nations that do not opt to conduct a census-style data collection approach (that would see the entire community enumerated) should nevertheless aim to get as many responses as

possible with the resources available so as to avoid data being skewed (or misrepresented). According to the University of Waterloo, a guideline of a minimum response rate of 60% would ensure that the data can be treated with statistical confidence and the margin of error remains reasonable (5% or less).

- **Capabilities of data collection team:** This should include both experienced enumerators who are deemed neutral, as well as community members who can be trained and who help to overcome language and cultural barriers.
- **Frequency of data collection:** this will be determined uniquely in every context, with the objective of striking a balance between cost / effort (which may dictate a 5 year cycle) and data consistency (which would suggest a 1-2 year cycle). Frequency will also be influenced by the type of indicator and the type of data inputs (e.g., if relying on published data or data collected by another organisation or agency, then the frequency will be determined by that organisation).

Analyse data

This step is about organising and making sense of the data. Data analysis should be driven by the types of questions that the community or community leaders want to measure – which ties back to the vision / purpose of the measurement program – and can include the evaluation of:

- Year-over-year changes in well-being
- Overall changes since the collection of the first baseline
- How the Nation's well-being compares to available national / provincial data and trends
- Disaggregated data to understand differences in well-being for different demographics:
 - Gender
 - Age
 - Income level
 - Education level
 - On / off reserve
 - Urban / rural

Effort should also go towards contextualising the data, which can be done by asking questions such as:

- How do our Nation's results compare to national / provincial data?
- How do our Nation's results compare to other Nations' data (treaty or non-treaty)?
- How do the results compare to our Nation's historical data?
- Which domains / indicators of well-being appear to be weakest / strongest?
- Which domains / indicators of well-being show the greatest / least improvement?
- What major event(s) and / or (in)direct actions have likely impacted our results?
- How are we performing on key outcome measures?

Reporting

This final step is about preparing audience-specific materials (the content of which is largely pre-determined based on the objectives of the measurement program) for the purpose of presenting the results. Through a series of workshops and / or meetings, the data is presented in an engaging way that builds an understanding of the results, and opens the dialogue around what the results mean and what logical next steps will build on the findings.

Phase IV – Next steps

The focus of the next steps phase is taking action in light of the findings. Specifically, a system of measures ideally supports evidence-based policy development, hence the report will ideally serve as fuel to spark ongoing discussion around policy change, governance change, and / or program change (see case study #1 for an example of a policy workshop that the CIW organised following the release of their national report on well-being).

Additionally, once the program is in place and there is a running body of data and analysis, it is then possible for policy makers to consider what other reports or analysis could be developed using the data that is collected. This exercise would potentially provide refinement to the measurement program on a periodic basis.

Case study #1 – University of Waterloo Policy Workshop

Policy experts in each of the eight domains of well-being were brought in; together they looked at the study findings, and brainstormed integrated innovative policy solutions that spanned across the framework. This proved to be a valuable contribution to data interpretation, and moved the conversation forward around social change.

Principle of consultation and engagement with the community

The cornerstone of this approach is that community is the heart of the process. This stems from the view that the act of developing a measurement program is instrumental in generating dialogue around what well-being means for individual members and for the community as a whole. It is through this active process of listening and exchanging ideas that Nations can set the stage for increased transparency, which in turn helps to strengthen a community's sense of trust (see case study #2²² for an example of connecting a community-driven process to a tool that measures well-being).

Case study #2 – “Look into Wood Buffalo” Community Well-being Survey

In 2011, Social Prosperity Wood Buffalo (SPWB) began facilitating a community-driven process to build resilience in Wood Buffalo's social profit sector to increase its capacity to address complex social problems and enhance quality of life.

Part of the process involved developing a shared measurement system to track quality of life indicators and inform the strategies and approaches of organisations and collaborations seeking to move the needle on significant community issues.

SPWB worked with the Canadian Index of Well-being to develop their Community Well-being Survey. Residents were surveyed to find out how they felt about their quality of life in Wood Buffalo. Were they happy, healthy and able to access all of the community resources that could help them reach their full potential? The survey provided a snapshot of how residents felt about their work-life balance, perceived accessibility of community facilities and services, and other factors that influence well-being.

The Community Well-being Survey Working Group wanted to engage all members of the Wood Buffalo community in a conversation about well-being as it relates to individuals, organizations, networks and society as a whole. The hope is that the survey results will inspire organizations from different sectors (local government, industry, and social profit agencies) to use this information to collectively develop strategies that will improve quality of life outcomes for all residents.

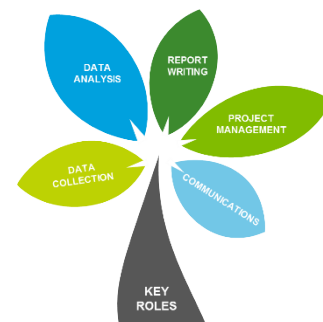
²² Zywert, Katharine et al., “Social Prosperity Wood Buffalo 2014 Process Report, Enabling systems change in Wood Buffalo's social profit sector.” Social Prosperity Wood Buffalo, 2014; and Phillips, Keely, Hilbrecht, Margo, Smale, Bryan, “Look into Wood Buffalo Community Wellbeing Survey: Sense of Belonging, Residency and Household Type, and Wellbeing among Wood Buffalo Region Residents.” Canadian Index of Wellbeing, University of Waterloo, August 2014.

Resource considerations

For Nations that are considering undertaking a community measurement program, a number of different resources will be required.

Key roles

From a people point of view, the list below provides a summary of the different roles identified through our research and consultations²³. In addition to the capabilities needed of those fulfilling each role, suggestions for where to source the roles have been provided (though the main assumptions hold true, which is that Nations will first look within their community for skilled resources, and will maximise opportunities for experts to work themselves out of a job through the process of capacity building).



DATA COLLECTION

Capabilities: Systematic, attention to detail, strong interpersonal and communication skills (able to build rapport with interviewees).

Sourcing: Roles could be filled by community members, who may or may not be volunteers.

DATA ANALYSIS

Capabilities: Strong statistics skillset, research-inclined. Someone who can ensure that the right measures are being tracked. Someone who knows what to look for in the data, and how to interpret the data.

Sourcing: Role could be filled by a community member with the right skillset, or could be sourced from outside the community (e.g. a local non-profit or educational institution) with the intention of building capacity within the Nation.

REPORT WRITING

Capabilities: Ability to translate data into meaningful insights that the Nation can act upon. Ability to help the community interpret the data.

Sourcing: Role could be filled by the individual doing data analysis / project management.

PROJECT MANAGEMENT

Capabilities: Strong statistical analysis and research skills, experience designing surveys, strong coordination skills to manage the end-to-end process (timeline, budget, team, and deliverables).

Sourcing: Role could be filled by an academic (researcher / statistician / demographer) or professor.

COMMUNICATIONS

Capabilities: Strong community relations, ability to inform members and answer questions throughout the process (what's happening, why it's happening, why it's important, what's expected of them, what's the timeline, what they can expect at the end).

Sourcing: Role could be filled by the Nation's Communications Coordinator.

²³ For comparative purposes, the key roles that make up the team at Statistics Canada can be found at <http://www.statcan.gc.ca/eng/employment/jobs/jobs>.

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