

# **Kiggavik Project Final Environmental Impact Statement**

Tier 3 Technical Appendix 9A Socio-Economic Baseline

September 2014

## **History of Revisions**

Revision Number	Date	Details of Revisions
01	December 2011	Initial release Draft Environmental Impact Statement (DEIS)
02	September 2014	FINAL Environmental Impact Statement; Main appendix text remains as submitted in 2011, Attachment D-Thelon River's Canadian Heritage River Status in the Context of the Kiggavik Project has been added.

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## **Abbreviations**

AANDC	Aboriginal Affairs and Northern Development Canada
AEM	Agnico Eagle Mines Ltd.
AREVA	AREVA Resources Canada Inc.
ATV	All-Terrain Vehicle
BQCMB	Beverly and Qamanirjuaq Caribou Management Board
CBC	Canadian Broadcasting Corporation
CAP	
CBoC	Conference Board of Canada
CINE	Centre for Indigenous Peoples' Nutrition and Environment
EIS	Environmental Impact Statement
ESL	English as a Second Language
GDP	
GN	Government of Nunavut
GNBS	Government of Nunavut Bureau of Statistics
GNDoEDTGovernment of Nunavu	ut Department of Economic Development and Transportation
GNDoF	Government of Nunavut Department of Finance
GNDoHR	Government of Nunavut Department of Human Resources
GPS	
GoC	Government of Canada
HIV	Human Immunodeficiency Virus
HTO	Hunters and Trappers Organizations
IBC	Inuit Broadcasting Corporation
IIBA	Inuit Impact and Benefits Agreement
INAC	Indian and Northern Affairs Canada
IQ	Inuit Qaujimajatuqangit
ITK	Inuit Tapiriit Kanatami

KMTS	Kivalliq Mine Training Society
KIA	Kivalliq Inuit Association
MMG	Mineral and Metals Group
NRCan	Natural Resources Canada
NAC	
NBCC	Nunavut Business Credit Corporation
NDC	Nunavut Development Corporation
NEF	
NIRB	Nunavut Impact Review Board
NLCA	
NPC	Nunavut Planning Commission
NSRT	Nunavut Surface Rights Tribunal
NTI	Nunavut Tunngavik Incorporated
NWB	Nunavut Water Board
NWMB	Nunavut Wildlife Management Board NWT
PHAC	Public Health Agency of Canada
RRSP	Registered Retirement Savings Program
RCMP	Royal Canadian Mounted Police
SEDS	Sivummut Economic Development Strategy
SEMC	Socio-economic Monitoring Committee
Statscan	Statistics Canada
STI	Sexually Transmitted Infection
SINED	Strategic Investments in Northern Economic Development
WG-S	

#### 1 Introduction

#### 1.1 Overview

This baseline report provides information on the existing socio-economic environment in Nunavut and in Kivalliq Region. This information has been used to assess effects of the Kiggavik Project (the Project) proposed by AREVA Resources Canada Inc. (AREVA). The Project is a new uranium ore development, including open pits, underground mine, mill, and associated infrastructure. The Project is located in the Kivalliq region of Nunavut approximately 80 km west of the community of Baker Lake (Figure 1.1-1).

This baseline integrates i) quantitative and qualitative data collected during socio-economic and Inuit Qaujimajatuqangit (IQ) investigations, including from field studies between 2009 and 2011; ii) results of consultations on the Project undertaken by AREVA up to the mid 2011; and iii) information from secondary sources, such as census data, Government of Nunavut reports, academic studies and reporting by other large mining projects in northern Canada.

The work presented in this socio-economic baseline was conducted under the Scientific

Research License # 03 055 11R-M (see attachment A).

This report is organized as follows:

- Section 2 describes the study areas.
- Section 3 presents methods and results for Nunavut.
- Section 4 presents methods and results for Kivallig Region and its seven communities.
- Section 5 provides a summary of key baseline results.
- Section 6 presents references cited in this report.
- Section 7 provides a glossary of terms used in this report.



#### 1.2 Purpose

The purpose of this baseline report is to describe the socio-economic environment that may be affected by the Project, in order to provide sufficient information to support the Environmental Impact Statement (EIS). The objectives are to:

- present and discuss the socio-economic conditions in Nunavut and in communities affected by the Project in order to understand the potential for impacts and benefits and to develop appropriate mitigation and benefit enhancement measures in response
- construct a baseline of socio-economic data that can be used to monitor change in Project affected communities such that the effectiveness of mitigation and benefit enhancement measures can be evaluated and such that where unforeseen impacts occur, these can be iteratively addressed as the Project proceeds
- interact, in the course of baseline data collection, with affected people in order to exchange information on the Project and to provide people the opportunity to express their concerns and preferences with regard to Project development.

## 2 Study Areas

#### 2.1 Regional Study Area

Nunavut is the regional study area for purposes of the socio-economic component of the EIS. Impacts on Nunavut are primarily related to the potential for benefit to the territory's economy, to government revenues and to the development of the mining sector. In addition, there is potential for cumulative socio-economic effects, with implications for government policy, planning and programs in Nunavut.

### 2.2 Local Study Area

Kivalliq Region and its seven communities of Arviat, Baker Lake, Chesterfield Inlet, Coral Harbour, Repulse Bay, Rankin Inlet and Whale Cove make up the local study area (see Figure 1.1-1). The closest community to the Kiggavik Project site is Baker Lake, approximately 80 kms east of the Project site. Chesterfield Inlet is a further 190 kms east, located on the Project's marine transportation route. These communities are closest to lands and natural resources with some potential to be affected by the Project.

In addition, economic and social benefits are expected, for these two communities as well as the other five communities in Kivalliq. Such benefits will largely derive from employment, training and business opportunities, and social investment consequent on the terms of the Inuit Impact and Benefits Agreement (IIBA) that will be signed between AREVA and the Kivalliq Inuit Association (KIA). There is also potential for negative economic and social effects on individuals and potentially on the seven Kivalliq communities, largely associated with the challenges of more people transitioning into the formal wage economy.

#### 3 Nunavut

#### 3.1 Methods

This socio-economic baseline for Nunavut has been developed using a number of secondary sources, including census data and documents prepared by various agencies of government, academics, economic and social development consultants, and proponents of other large projects in Nunavut. Examples include statistical reporting by the Government of Nunavut Bureau of Statistics (GNBS) and Statistics Canada (Statscan); specialized reports such as those on diet, harvesting, health and economic development recently prepared for GN departments; and the Meadowbank Gold Project and Mary River Project Environmental Impact Statements. Such secondary sources are cited throughout this section and a full list of references is provided in Section 6.

#### 3.2 Results

#### 3.2.1 Government

#### 3.2.1.1 Governing Institutions

The territory of Nunavut was created in 1999, with the signature of the Nunavut Land Claims Agreement (NLCA). The agreement includes provision for:

- title to approximately 351,000 km² of land (Inuit owned lands), of which about 37,000 km² include mineral rights
- equal representation of Inuit with government on a new set of wildlife management, resource management and environmental boards (co management boards)
- the right to harvest wildlife on lands and in waters throughout the Nunavut settlement area
- capital transfer payments of \$1.148 billion, payable to the Inuit over 14 years
- a share of federal government royalties for Nunavut Inuit from oil, gas and mineral development on Crown lands
- the right to negotiate with industry for economic and social benefits from non-renewable resource development on Inuit owned lands

- creation of three federally funded national parks
- inclusion of a political accord that provides for the establishment of the new Territory of Nunavut and through this a form of self government for the Nunavut Inuit.

Governing institutions in place to implement the terms of the NLCA include:

- The Government of Canada (GoC) owns and controls crown lands as well as subsurface
  mineral rights on most Inuit owned lands. It remains in control of environmental
  assessments and regulatory processes and permits for resource extraction, land use and
  water use. These authorities are exercised by the federal Minister of Indian and Northern
  Affairs, through various federal and territorial boards and agencies. GoC also funds over
  90% of Nunavut's government budget.
- The Government of Nunavut (GN) is elected by all residents of the territory (Nunavummiut). Nineteen members of the legislative assembly are elected as independents, and select a premier and cabinet ministers from among themselves. GN has some direct tax authority, and manages and administers the territory's economic and social development, through its departments including finance, human resources, health and social services, education, and economic development and transportation. GN has little direct authority over land and resource use in Nunavut, but does have political influence over federal decisions and is a key intervener in processes of various regulatory boards established under the NLCA.
- Nunavut Tunngavik Incorporated (NTI) is an elected body, representing the Inuit beneficiaries of the NLCA and administers all Inuit owned land. NTI has a regional Inuit association in each of Nunavut's three regions, Kivalliq, Kitikmeot and Qikiqtaaluk. NTI and regional Inuit association representatives are elected by Inuit beneficiaries. Representing the interests of about 85% of the population, NTI and the regional associations have considerable influence over federal and territorial decision making and are key interveners in regulatory board processes. Because most Nunavummiut are also Inuit beneficiaries, GN and NTI largely represent the same constituents, with the GN also representing the 15% of the population that is not Inuit.

The Nunavut Planning Commission (NPC) is responsible for land use policy and planning to guide and direct resource use and development. NPC also has a role in evaluating proposed developments for conformance with policy and planning. In developing land use policies and plans, NPC carries out extensive consultation, with communities as well as with other institutions of government and civil society, to take into account a range of values, priorities and aspirations. Land use plans thus include consideration of the economic, social and cultural needs of Nunavummiut as well as environmental and ecosystem considerations. The Keewatin Regional Land Use Plan, for Kivalliq Region, was completed in 2002.

The Nunavut Impact Review Board (NIRB) has the responsibility to assess and monitor the environmental and socio-economic impacts and performance of developments. NIRB screens project proposals, issues guidelines for preparation of environmental impact statements (EISs), leads the regulatory review process, sets terms and conditions for any forthcoming approvals and makes recommendations to the federal government for decisions. The NIRB process is highly consultative.

The Nunavut Water Board (NWB) has responsibilities and powers over the use, management and regulation of inland water in Nunavut, including issuing of water licenses and the deposit of wastes into inland waters. Water licenses include terms and conditions, with all applicable provisions of territorial and federal legislation.

The Nunavut Surface Rights Tribunal (NSRT) is a quasi-judicial body with a mandate to settle disputes on access, and compensation for loss of, as examples, wildlife or carving stone rights. Disputing parties are encouraged to negotiate and reach settlement before applying to the NSRT for assistance.

The Nunavut Wildlife Management Board (NWMB) is the regulator of access to wildlife in Nunavut. It establishes wildlife harvesting quotas, and approves plans for the management and protection of wildlife and wildlife habitats. In Kivalliq, the Beverly and Qamanirjuaq Caribou Management Board (BQCMB) has been established with specific responsibilities for two caribou herds whose migratory routes range into the Northwest Territories (NWT), Manitoba and Saskatchewan.

#### 3.2.1.2 Capacity to Govern

Nunavut is a very young jurisdiction within Canada, and has multiple new agencies of government, a historical legacy of inexperience with formal institutions of government, and unique political imperatives with regard to how government is run. There are capacity constraints as a result. Other constraints include high employee remuneration costs in face of limited budgets (see Section 3.2.2.7 below), low educational achievement in the territory, large staffing requirements of government relative to the size of the labour force and, increasingly, competition for workers with the private sector.

With regard to the human resource constraints in the GN alone, Nunavut's Department of Human Resources has in place a number of programs to address constraints both with government staff but also with the broader public to prepare people for positions with government in the future. This is in the context of i) the NLCA goal that GN staffing is representative of the Nunavut population as a whole, that is, aspires to Inuit making up 85% of staff; and ii) expectations that government services can be delivered in Inuktitut and reflect the integration of Inuit values. Priority hiring for Inuit; student summer and internship programs; staff training programs; language and cross cultural training; and initiatives to address retention issues have all been put in place, but will take some time to mature and achieve desired outcomes.

GN had a staffing requirement of about 4,000 in 2010, equivalent to about 30% of Nunavut's entire labour force of 13,700 (GNBS, 2011a) at that time. About 85% of these jobs would normally require at least some post secondary education. In 2010, 23% of these jobs were vacant (see Table 3.2-1), with higher rates of vacancies in intergovernmental affairs and finance, and at the senior management, paraprofessional and administrative levels. In the absence of qualified Inuit, filling these jobs would mean some combination of i) hiring qualified non Inuit, reducing the percentage of Inuit in government service to below the current average of 51%, up from 42% in 2002 (and likely diluting language and cultural content in government as well); and ii) hiring unqualified Inuit, reducing the quality of government services at least in the shorter term.

Table 3.2-1 GN Staffing by Level, December 2010

	Total Positions	Position Filled by Inuit (%)	Positions Filled (%)
Executive	37	38	92
Senior management	182	22	74
Middle management	450	26	80
Professional	1,297	27	80
Paraprofessional	1,445	69	75
Administrative	560	93	75
Total	3,971	51	77

Source: GNDoHR, 2011

Note: Figures include employees of Arctic College, Nunavut Housing Corporation and Qulliq Energy Corporation, but do not include employees of independent organizations responsible for implementing the NLCA.

On the other hand, institutional capacity is enhanced by significant participation of people in decisions that affect them. In an investigation of political culture in Nunavut, Henderson (2007) found that there were many factors present in Nunavut (as compared to Canada) that might be expected to limit public participation in governance, including the non party system of elections, higher transaction costs, reduced access to information and poorer socio-economic indicators – all of which have been found to limit political participation elsewhere. However she also found that people's participation was at a comparable level to that in the rest of Canada. Inuit social values, the NLCA provision that government be highly consultative and active community level political organizations have created avenues for public influence on government decision making. This in turn enhances the capacity of government to respond to public will.

#### 3.2.2 Economy

The economy of Nunavut is mixed, combining both land and wage based components. Although the land based economy is not well captured statistically, its importance is reflected in people's preferences and concerns; in government deliberations; and in academic and other literature. The land based economy continues to provide important economic, social and cultural benefits to Inuit. In addition, the land based economy and associated values provide the foundation upon which economic development priorities, policies, strategies, plans and programs of government and its people are based, including moving forward with the wage based component of the economy.

It is to be emphasized that there is not necessarily always a clear separation between the land based and wage based components. Hunting, trapping and fishing for example serve to supplement household food security and nutrition (subsistence) but are also commercialized as a source of cash income. Outfitting, although a cash and/or wage generating activity, is based on traditional knowledge and practices that have their origins in the land based component of the economy. Even government service positions, although formally wage based, are more effectively delivered with due consideration and application of values derived from land based activity.

Thus most individuals are, or strive to be, active in both the land and wage based components of the economy. There is a continuum, along which harvesting, arts and crafts, guiding and wage based employment lie, and along which individuals operate as they engage in a range of economic activities. It is in this sense that the economy is mixed, and is distinguished insofar as the goals of economic activity are nuanced. 'An important feature of the mixed economy is that the production of money is not seen as the sole or final goal of economic activity. Rather the goal flows from the earlier subsistence structure, which is the maintenance of wildlife harvesting and its related social interactions in order to provide security and psychological returns' (Dowsley, 2010).

#### 3.2.2.1 Economic Development Policy

The guiding document for all governing institutions in Nunavut is Tampata 2009-2013, Building Our Future Together (GN, 2009). The document describes the vision for Nunavut to the year 2030, reaffirms guiding principles, identifies priorities and sets out an action plan for implementation. The

<sup>1</sup> Specific references to consultation results, government policy and programming and literature on Nunavut and the northern Canada more generally are contained throughout this document.

vision set within the context that basic need (broadly defined, to include social and cultural needs) must be met, is that:

- Nunavummiut will continue to have a highly valued quality of life and a much better standard of living for those most in need
- individuals and families will all be active, healthy and happy
- communities will be self-reliant, based on Inuit societal values, with reduced dependence on government

Nunavut will be recognized for our unique culture, our ability to help one another and for our useful contributions to Canadian and global issues.

The guiding principles for achieving this vision continue to include those set out in an earlier guiding document, Pinasuaqtavut 2004-2009 (GN, 2004). The principles are derived from Inuit societal values as these have been passed on over generations:

- inuugatigiitsiarnig: respecting others, relationships and caring for people
- tunnganarniq: fostering good spirit by being open, welcoming and inclusive
- pijitsirniq: serving and providing for family and/or community
- aajiiqatigiinniq: decision making through discussion and consensus
- pilimmaksarniq/pijariuqsarniq: development of skills through observation, mentoring, practice and effort
- piliriqatigiinniq/ikajuqtigiinniq: working together for a common cause
- ganugtuurnig: being innovative and resourceful
- avatittinnik kamatsiarniq: respect and care for the land, animals and the environment.

To achieve the vision, Government of Nunavut priorities are to:

- improve education and training outcomes
- reduce poverty
- connect our community
- increase housing options
- increase support for culture and the arts
- help those at risk in our communities
- support community-based, sustainable economies
- address social concerns at their roots
- improve health through prevention
- enhance our recognition in Canada and the world
- strengthen the public service.

The Government of Nunavut's economic (and social) development strategies are based on the vision, principles and priorities identified first in Pinasuaqtavut and subsequently in Tampata. The strategies seek to identify the means by which the vision can be achieved, focusing on the economic sectors that represent potential for both growth and increased employment while being consistent with both environmental conservation and Inuit values. The strategies also explore means to realize this potential, through 'foundation' interventions to prepare Nunavut and Nunavummiut to access economic opportunities.

- The Nunavut Economic Development Strategy<sup>2</sup> (SEDS, 2003) identified mining, tourism and commercial fishing as sectors of most potential for economic development, with arts and crafts, harvesting and small business to be emphasized, The strategy also notes that the development of infrastructure (transportation, energy and telecommunications) is a prerequisite (foundation intervention) for realizing the potential for growth in these three priority sectors. Subsequent work on the strategy emphasized the need to strengthen education and training, community capacity and business development as additional prerequisites (NEF, 2009).
- Qanijijuq (NEF, 2004) identified the same sector priorities for funding made available by
  the federal government for economic development, the Strategic Investments in Northern
  Economic Development (SINED) program. In addition, Qanijijuq identified three
  foundation areas for investment capacity building, trade and communications
  (connectivity). Qanijijuq II (NEF, 2008) reconfirmed the priorities for the renewal of the
  SINED program in 2009.
- The Department of Economic Development and Transportation has produced sector strategies for mining, tourism, arts and crafts and transportation (GNDoEDT, 2006 to 2010). These strategies also strongly emphasize the need to enhance the capacity of communities and people to participate.

The Government of Nunavut has now initiated a business planning process to support the achievement of Tampata's vision for Nunavut and Nunavummiut, including through the implementation of the Nunavut Economic Development Strategy, as well as the sector strategies (GN, undated). The two imperatives to i) protect the environment; and ii) increase employment are explicitly recognized as fundamental to all GN activity.

<sup>&</sup>lt;sup>2</sup> The strategy is the product of a process led by the Nunavut Economic Forum to bring together community, government and private business organizations to conduct economic research and analysis and jointly plan for Nunavut's economic development.

It will be noted that enhancing the capacity of Nunavummiut to participate in new economic opportunities, is common to all the above referenced documents. The Conference Board of Canada (CBoC, 2001) noted a decade ago that '[e]economic growth is required for a society to achieve its development objectives and meet increased demand for goods and services arising from a growing population and rising levels of individual consumption . . . [t]traditional land based economies cannot, on their own, keep pace with the increasing demands for goods and services produced in the industrial economy.'

#### 3.2.2.2 Performance of the Formal Economy

As noted above, the economy of Nunavut is mixed, including both wage and land based components. Economic statistics capture what might be called the 'formal' economy – goods and services that are exchanged for money. These statistics therefore include not only wage based but also land based economy activity where such activity results in a financial transaction.

Table 3.2-2 provides Statistics Canada's data on Nunavut's formal economic performance between 2002 and 2009<sup>3</sup>. In constant dollars, there is evidence of economic growth as measured by changes in gross domestic product (GDP).<sup>4</sup> GN's more recent reporting on year to year changes in GDP (GNDoF, 2011) indicate that growth in 2008 was 10.6%, that GDP shrank in 2009 by 6.2%, and that expectations of growth in 2010 are 11.8%. These swings, larger than those indicated by the Statistics Canada data, are almost entirely due to the end of the bulk of construction at Meadowbank in early 2009 and that project's ramping up of gold production in 2010.

Table 3.2-2 Gross Domestic Product, Nunavut 2002 to 2009 (2002 dollars, millions)

	2002	2003	2004	2005	2006	2007	2008	2009	% change 2002 to 2009
Gross Domestic Product	951	949	1,000	1,009	1,039	1,090	1,195	1,150	20.9
Personal expenditures	418	442	461	477	497	521	558	575	37.6

<sup>&</sup>lt;sup>3</sup> Data presented are the most recent available.

<sup>&</sup>lt;sup>4</sup> GDP is measured largely through the dollar value of goods and services exchanged (reported as expenditure and as income) in an economy. Goods and services without a reported dollar value, including subsistence, housework and volunteering for example, do not get counted.

Table 3.2-2 Gross Domestic Product, Nunavut 2002 to 2009 (2002 dollars, millions)

	2002	2003	2004	2005	2006	2007	2008	2009	% change 2002 to 2009
Government expenditures	921	972	942	986	989	1,031	1,009	1,080	17.3
Business expenditures	146	253	314	359	329	596	882	427	192.5
Net exports	-534	-720	-725	-809	-780	-1,065	-1,249	-929	74.0
Final domestic demand	1,512	1,653	1,703	1,817	1,809	2,148	2,449	2,082	37.7
Economic Growth (%)		-0.2	5.4	0.9	3.0	4.9	9.6	-3.8	n/a

Source: GNDoHR, 2011

Note: Figures include employees of Arctic College, Nunavut Housing Corporation and Qulliq Energy Corporation, but do not include employees of independent organizations responsible for implementing the NLCA.

The table presents data in constant 2002 dollars to permit comparison between years. In current dollars, the GDP of Nunavut was estimated at \$1,420 million in 2009 and forecast at \$1,633 million in 2010 (CBoC, 2010). Although prices are much higher in Nunavut, inflation — as measured by the consumer price index — has been somewhat slower than in Canada over the last decade (see Table 3.2-3).

Table 3.2-3 Consumer Price Index

	lqaluit	Canada
2010	111.8	116.5
2009	113.5	114.4
2008	109.0	114.1
2007	107.7	111.5
2006	104.5	109.1
2005	102.1	107.0
2004	100.8	104.7
2003	99.9	102.8
2002	100.0	100.0
Source: GNBS, 2011e		

The table also gives some idea of recent economic trends. The rate of increase of government expenditures has been relatively slow, with the result that government accounted for just over 50% of

domestic demand in 2009, as compared to over 60% in 2002 (this compares to less than 25% that is typical of Canada's government expenditures). Business expenditures have increased by almost 200%, raising business' share of demand from less than 10% in 2002 to just over 20% in 2009. Business expenditures were particularly high during Meadowbank's construction in 2007 and 2008, but fell back in 2009. Personal expenditure growth has been steady, and has quite consistently made up about 25% of final demand over time.

While such trends are positive, there are cautions. As noted, many of the recent changes evident in the table are attributable to Meadowbank (GNDoF, 2011), in the context of Nunavut a very large project. With the completion of its construction in 2009, the dependence of the economy on government increased again in 2010, although not to levels seen prior to 2005. Further, there is very high dependence on imports to meet domestic demand. Imports accounted for almost half of goods and services in the economy in 2009. Again, with the end of Meadowbank construction this had moderated somewhat over 2007 and 2008, however throughout Nunavut's history the territory has consumed more than it has produced. The Conference Board of Canada (CBoC, 2001) indicated that over time, continuing high dependence on both government spending and imports could have negative effects on household incomes in face of rapid population growth.

Table 3.2-4 presents the Conference Board of Canada's projections for GDP growth to 2020. The projections assume the construction of the Meliadine gold project, with production starting in 2016. GDP growth is forecast to outpace the expected population growth rate, which is estimated to average 1.5% annually to 2014 and fall to 1.2% by 2020. This implies improving incomes for Nunavummiut.

Table 3.2-4 Forecast for GDP and Sector Growth 2011 to 2020, (2002 dollars, millions)

	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	% chang e 2011 to 2020
GDP*	1,221. 4	1,243. 0	1,274. 2	1,337. 7	1,371. 5	1,461. 4	1,523. 5	1,567. 9	1,595. 3	1,567. 6	28.3
	2.8	1.8	2.5	5.0	2.5	6.6	4.3	2.9	1.7	-1.7	na
Primary	2.2	2.3	2.4	2.4	2.5	2.6	2.6	2.7	2.8	2.8	27.3
(excluding mining)	3.8	3.4	3.0	3.1	2.7	2.5	2.4	2.3	2.3	2.3	na
Mining	138.1	146.1	154.5	163.6	174.1	262.7	304.4	322.0	323.6	273.5	98.0
Mining	23.5	5.8	5.8	5.8	6.4	50.9	15.9	5.3	-0.5	-18.2	na
Secondar	318.3	320.4	328.0	365.5	377.3	441.7	479.5	500.2	504.7	457.2	43.6
y (goods producing industries)	4.3	0.7	2.4	11.4	3.2	17.1	8.6	4.3	0.9	-9.4	na

Table 3.2-4 Forecast for GDP and Sector Growth 2011 to 2020, (2002 dollars, millions)

	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	% chang e 2011 to 2020
Tertiary (service	891.5	910.2	933.2	958.5	980.0	1,004. 8	1,028. 7	1,051. 9	1,074. 4	1,093. 8	22.7
producing industries)	2.3	2.1	2.5	2.7	2.2	2.5	2.4	2.3	2.1	1.8	na

Source: CBoC, 2010

The forecast indicates that growth in the primary (excluding mining) and tertiary sectors will be fairly steady, at about 2% to 3% a year. Steady growth at this rate in the service sector, a rate substantially above population growth, is a stabilizing influence because the service sector (which includes government services) represents about three quarters of GDP. The variations in GDP growth (6.6% in 2016 as compared to -1.7% in 2020) are thus largely attributable to the mining sector and the construction component of the secondary sector. The stimuli represented by the expected beginning and then end of construction of Meliadine, the start of production at Meliadine and the closing of Meadowbank (barring any additional finds) are largely responsible for the big percentage change numbers in the table. In this regard, it is worth noting that other mining projects, including some with capital costs of over \$1 billion dollars, are currently in, or have indicated they intend to enter, the environmental approval process and may be expected to begin construction before 2020. This would substantially affect the projections.

#### 3.2.2.3 Informal Economy

The informal economy is excluded from the above analysis. It includes not only subsistence activity (food harvesting, but also harvesting for clothing and arts and crafts materials for example) but also goods and services that are exchanged without financial transaction. Volunteering, lending of harvesting equipment, bartered services and most child care, as examples, are not captured in official statistics.

Further, even the economic value of the food component subsistence activity is not well understood – there are only intermittent and partial attempts to establish the market value of harvested food. For example, InterGroup (2008) calculated a net harvest value for Nunavut for the Beverly and Qamanirjuaq caribou herds of about \$12 million and a subsistence food value of about \$9 million, but these are only two of Nunavut's herds. Estimates of the GNDoF (2008) are that food harvesting has a value of about \$30 million annually in Nunavut. However the EIS for the Mary River Project puts an estimated value of \$20 million annually for harvested food, for only five communities on the north part of Baffin Island, communities with only about 18% of the territorial population (Baffinland, 2011),

<sup>\*</sup> The shaded rows present the dollar amounts and the unshaded rows present percent changes from year to year.

Because land based activity in the formal economy is not disaggregated from wage based activity and because there are no reliable estimates of the size of the subsistence portion of the informal economy – much (but not all) of which may be considered to be land based – the true economic value of land based activity is not known. In 2001 the Conference Board of Canada suggested a figure, based on a 'consensus of key informants', of \$40 to \$60 million as the value of some of the land based component of the economy (excluding for example volunteering and equipment sharing). However the definition of land based activity was that it did not include a financial transaction. That is, the only land based activity considered was informal and therefore excluded such formal activity as pelt sales, tourism, sales of arts and crafts, the commercial fishery, environmental monitoring and communications. Although none of these sectors is large, in aggregate the economic contribution is likely significant – tourism was estimated to contribute about \$26 million to the economy in 2007 (GNDoF, 2008), arts and crafts about \$33 million annually (GNDoEDT, 2010b), and the commercial fishery over \$30 million<sup>5</sup>. It can be concluded therefore that in addition to social and cultural value, the land based economy plays a much more significant economic role than any available data suggest.

Without good data, past and future trends are challenging to forecast. There are no data that provide conclusive evidence that land based economic activity has seen significant change in the recent past. However there is some anecdotal evidence to suggest that although harvesting, a major component of the land based economy, remains an important economic activity for a majority of Nunavut households, some decrease may be underway.

The Nunavut Wildlife Management Board's harvest study has data on harvesting rates for about 80 species of land and sea mammals, birds and fish over the five year period 1996/97 to 2000/01 (NWMB, 2004). Figure 3.2-1 shows results for Nunavut as a whole – the data are for those species most actively harvested (as measured by the number of harvesters) and exclude commercial harvests, defined as harvests sold outside of Nunavut. The data are expressed as the harvest level in each year as a percentage of the five year mean6. Harvest rates are variable from year to year and show no clear trends over time, with the two notable exceptions of caribou and ringed seal.

<sup>&</sup>lt;sup>5</sup> This is not an official estimate, but is based on recently increases in quota, reported catches and approximate value.

<sup>&</sup>lt;sup>6</sup> Comparing absolute harvest levels does not produce a comparable visual impression. For example, about 200,000 arctic char were harvested annually over the period, as compared to about 600 beluga.

250 200 150 96/97 **97/98** 100 **98/99** 99/00 00/01 50 Canada goose Bearded seal Eider duck Arctichare Ringedseal Harpseal Arctichar Arctic to t Laketrout Beluga

Figure 3.2-1 Harvesting Levels, 1996/97 to 2000/01

Source: NWMB, 2004.

The NWMB cautions against any over interpretation of the data and presents harvest results in terms of number of animals, which can be difficult to interpret because animals vary enormously in size. Nevertheless, the two species that do show some evidence of declining harvests, caribou and ringed seal, are hunted by more hunters, and are hunted in larger numbers than any other land or sea

mammal of comparable size<sup>7</sup>. Thus if the observed declines are real, and have continued since 2001, the suggestion is that an important harvesting component of the land based economy may be decreasing.

Other anecdotal evidence includes the following:

- As reported from the Aboriginal Peoples Survey of for each of the census years of 2001 and 2006, 70% of Nunavummiut participated in harvesting in 2001, and 67% (which included 59% of women) did so in 2006. Country food made up about half or more than half of the meat and fish eaten in 73% of households in 2001, and in less than 66% of households in 2006. In 2001, 96% of Nunavummiut indicated that they lived in households that shared harvested food with others but this had fallen to 80% by 2006 (2001 data are reported in Impact Economics, 2008; 2006 data are from Statscan, 2008a).
- A study by the Centre for Indigenous People's Nutrition and Environment (Kuhnlein et al, 2000) on Inuit diet across the Canadian Arctic included an investigation of perceptions of changes to consumption levels of traditional food. The results for Nunavut are in Table 3.2-5. In total, about as many people felt they were consuming less than five years earlier as felt they were consuming more and about half felt consumption levels were the same. This would indicate little change on average, however it is only in the 20 to 40 age groups that a decrease in consumption was not reported. In addition, although the data are not publicly reported, subsequent work on the CINE data suggested that consumption of traditional food had fallen off in younger generations (Kuhnlein et al., 2004).

Table 3.2-5 Perceptions of Consumption of Traditional Food in 1999 Relative to Five Years Previously

Age	More	Less	Same	
15 to 19	30.7	33.2	35.8	
20 to 40	28.2	24.9	46.9	

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NWMB reported about 3,000 hunters harvesting a total of about 24,500 caribou and about 2,700 hunters harvesting about 25,000 ringed seal over the five year study period. By contrast, no other land or sea mammal was hunted by more than 1,000 hunters and the third largest harvest in terms of number of animals was about 4,000 arctic fox.

Table 3.2-5 Perceptions of Consumption of Traditional Food in 1999 Relative to Five Years Previously

Age	More	Less	Same
41 to 60	20.5	22.9	56.4
61+	16.0	35.5	48.3
Total	25.1	26.2	50.1

Future trends are yet more uncertain. Two main threats to harvesting are described by Impact Economics (2008) as environmental change on the supply of wildlife and increasing costs associated with harvesting. The CINE work reported people's perceptions of constraints to higher levels of harvesting as costs, work, child care and weather in that order. Recent polar bear and seal initiatives in Europe and the United States have undermined the potential for some tourism and pelt harvesting. In addition, as evidenced from results of consultations conducted by mining project proponents (Cumberland, 2006; Baffinland, 2011), there is some concern among older Inuit about a generational shift, with younger people less interested and/or less able to participate in land based economic activity.

In addition to the economic value discussed above, social and cultural benefits need to be considered as value, if not in market terms. Land based activity encompasses not only knowledge of the land and its resources, and the passing of this knowledge down through generations, but also strategies, technologies and skills in applying this knowledge to livelihoods. Maintaining the practice of land based activity confirms values, including consensus decision making, resourcefulness and respect for the environment. Participation in harvesting and other traditional activities enables social cohesion and cooperation as families and communities work together and share. People find spiritual value in land based activity. Men and youth are empowered as they provide food for their families and friends. Social and cultural practices and values associated with land based activity confirm the identity of Inuit, and are increasingly understood as essential for physical, social and emotional wellbeing at individual, household and community levels (GN, 2004; GN, 2009).

#### 3.2.2.4 Employment

Job creation has been strong in the recent past, again related primarily to the mining and construction sectors, however Nunavut's employment picture remains challenging. Table 3.2-6 gives an indication of why. Over the years 2009 to mid 2011, the number of employed people increased by almost 10%, representing about 1,000 new jobs. This is job growth that is faster than population growth (currently about 2% per year) but it also job growth that is slower than the growth, of almost 17%, in the labour force.

Table 3.2-6 Recent Employment Statistics<sup>8</sup>

	2009	2010	July 2011	% Change
Labour force	12,400	13,700	14,500	16.9
Participation rate	61.2	65.5	68.9	n/a
Number employed	10,800	11,700	11,800	9.2
Employment rate	53.5	55.7	56.1	n/a
Number unemployed	1,600	2,100	2,700	68.7
Unemployment rate	12.6	15.0	18.6	n/a

Source: GNBS, 2011a

Note: Figures for 2009 and 2010 are annual averages, whereas the figure for July 2011 is a 3 month moving average, that is, it incorporates data from May and June 2011.

The labour force increases in size as a function of people becoming old enough, or more encouraged to economic opportunity, to seek employment. The young median age of the population and the increase in the participation rate suggest that both are factors contributing to rapid labour force size growth. As a consequence, despite many new entrants into the labour force finding jobs, many do not find jobs, resulting in a spike in unemployment. The table above shows that despite strong job creation, the number of unemployed had increased by almost 70% between 2009 and mid 2011.

Unemployment is particularly acute in the 15 to 24 year old age cohort, with an unemployment rate approaching 40% as compared to the population wide unemployment rate of less than 19%. The unemployed are almost all Inuit – data for the non Inuit population are suppressed on confidentiality grounds because the unemployed are so few. Males are slightly more likely to be unemployed than women in percentage terms, however because males are more likely to be in the labour force, there are three unemployed males for every two unemployed females. (See Table 3.2-7.)

<sup>&</sup>lt;sup>8</sup> As a point of comparison, 2006 census data noted a labour force of 12,600, a participation rate of 65.3%, unemployed numbering 2,000 and an unemployment rate of 15.6%. These data are comparable to those in the table for 2009 and 2010 however methods used by Statistics Canada and the Nunavut Bureau of Statistics for estimating employment parameters are different.

Table 3.2-7 Employment by Identity, Gender and Age, July 2011

	Size of the Labour Force	Number Employed	Participation Rate	Unemployment Rate
Total	14,500	11,800	68.9	18.6
Inuit	10,100	7,500	61.9	25.8
Non Inuit	4,400	4,300	93.7	n/a
Male	8,000	6,400	74.3	19.8
Female	6,500	5,400	63.3	17.1
15 to 24 years	3,100	1,800	52.2	39.7
25 years and above	11,500	10,000	75.4	13.0
Source: GNBS, 2011a			•	•

The above discussion on employment does not reflect informal land based economic activity. NWMB (2004) counted an average of over 5,300 hunters registered with Hunters and Trappers Organizations (HTOs) over the 1996 to 2001 period of their harvesting study, equivalent to about one third of the 15 years and over population, and to about half of the labour force in 2001. Statistics Canada data from the 2006 census indicated that about 10,300 people, or two thirds of the 15 years and over population, had harvested animals, fish or plants in the previous year. It is cautioned that these figures do not represent the equivalent of full time jobs in the land based economy – for example only 7% (430) of harvesters in the NWMB study were considered to be intensive harvesters, those who participated in more than a limited number of major harvesting activities during the annual cycle.

Table 3.2-8 below provides the Conference Board of Canada's (2010) forecasts for employment until the year 2020. Job creation is expected to be much lower than that seen in 2009/2010, at 200 to 300 new jobs per year, but both population and labour force growth rates are also expected to slow. The result is marginal improvements in unemployment rates over the next decade. It is noted however that by mid 2011, GN Bureau of Statistics data indicate that Nunavut's population and labour force

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<sup>&</sup>lt;sup>9</sup> As noted earlier, the 2006 census data indicate that harvesting levels had gone down slightly since 2001. The difference between the NWMB count of harvesters (5,300) and the Statistics Canada count (10,300) is a function of the definitions used to count harvesters rather than of an absolute increase in numbers.

had already grown faster than forecast and that unemployment was higher. That table also shows that wages are expected to rise, and rise faster than the expected consumer price increases of less than 2% annually.

**Table 3.2-8 Employment Forecast** 

	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Average weekly wage	1,007	1,039	1,074	1,118	1,156	1,194	1,236	1,276	1,317	1,355
(\$, industrial composite)	3.0	3.1	3.4	4.1	3.4	3.3	3.5	3.2	3.3	2.9
Population	33,200	33,700	34,200	34,700	35,200	35,700	36,200	26,600	37,100	37,500
Population	1.5	1.6	1.6	1.5	1.4	1.4	1.3	1.3	1.2	1.2
Labour force	12,000	12,300	12,500	12,700	12,900	13,200	13,400	13,600	13,700	13,800
Labour force	2.4	2.1	1.7	1.5	1.4	2.2	1.6	1.4	1.3	0.3
Employment	10,500	10,800	11,000	11,300	11,500	11,700	11,900	12,100	12,300	12,300
Employment	2.1	2.8	1.9	2.5	1.5	2.2	1.8	1.5	1.5	0.1
Unemployment rate (%)	12.6	12.0	11.9	11.1	11.0	11.0	10.8	10.7	10.6	10.8

Source: CBoC, 2010

Note: For the first four indicators, the shaded rows present the dollar amounts and the unshaded rows the percent changes.

As for other economic parameters, it is noted that development of one or two large projects currently in the environmental approval process could change the employment outlook substantially, as has been demonstrated by the economy in NWT.<sup>10</sup>

<sup>10</sup> The rapid GDP growth in NWT, expected to approach 10% in 2011, will be largely due to recovery in diamonds (including planned

expansions at Snap Lake and Diavik). NWT had, by 2009, a per capita GDP of more than twice the national average. Unemployment is expected to fall to the 4% to 5% range, and averages wages to increase by up to 40% over the coming decade. (CBoC, 2010).

#### 3.2.2.5 Mining

As noted, the economic policies and strategies of Nunavut accord the mining sector a primary role in development. Mining is expected to be the source of most capital investment, formal sector employment growth, direct and induced economic growth and government revenue in the near to mid-term future. Mining constitutes the single highest growth potential sector for the territory.

Nunavut is known to be rich in mineral resources, although exploiting these resources has been somewhat challenging. Remoteness, the extreme climate, incomplete geological data, limitations on the availability of a range of infrastructure (including roads) and difficult geotechnical conditions (permafrost) have all contributed to high costs and thus to uneven development of these resources.

Nevertheless, three mines operated through the 1980s and 1990s, generating some territorial mineral output<sup>11</sup> and as of mid 2011, Nunavut had one new operating mine (Meadowbank), and a second under construction (Doris North). It is noted that under conditions similar to those in Nunavut, large mining projects are successfully operating in NWT and in Nunivak in northern Quebec. These include mines of major players such as BHP (Ekati, diamonds), DeBeers (Snap Lake, diamonds), Rio Tinto/Aber (Diavik, diamonds) and Xstrata (Raglan, nickel).

In addition, and despite the challenging environment, exploration interest in Nunavut's mineral resources continues to be very high, as evidenced by exploration and project development expenditures since 2006 (see Table 3.2-9). While the trend has not been uniformly upward, reflecting in some respects both movements in commodity prices and the recession of 2008, Nunavut has consistently seen 10% or more of all Canadian exploration and project development expenditures over the recent past, about twice the levels seen in NWT.

<sup>11</sup> The three mines were the Lupin gold mine, the Nanisivik lead and zinc mine and the Polaris zinc mine. Jericho diamond mine also operated for two years in the mid 2000s.

Table 3.2-9 Exploration and Project Development Expenditures

	2006		2007		2008		2009		2010*		2011*	
	\$ (millions )	% of Total										
Nunavut	210.6	11.0	338.0	11.9	432.6	13.2	187.6	9.6	280.6	10.0	322.8	10.3
Northwe st Territorie s	176.2	9.2	193.7	6.8	147.7	4.5	44.1	2.3	98.8	3.5	83.0	2.3
Canada Total	1,011.5	100. 0	2,830.8	100. 0	3,279.5	100. 0	1,944.4	100. 0	2,817.5	100. 0	3,188.0	100. 0

Source: NRCan, 2011

\*These are preliminary figures.

As an indication of where and how the these budgets are being spent, Table 3.2-10 lists 85 exploration projects considered active in 2010 in Nunavut. Although most operators are junior and mid level, there are some major players, including BHP Billiton, Xstrata, Vale, Teck, Newmont (Hope Bay) and ArcelorMittal (Mary River). Key targets are gold, diamonds, base metals and uranium. Exploration projects are found in all three regions. Not many of these projects will necessarily develop into mines in the near future, however it is clear that there is potential for geographically widespread mining sector development.

Table 3.2-10 Nunavut Exploration Projects, 2010

	Nearest Community	Project	Commodities	Operator/Partner(s)
Kitikı	neot			
1	(Baker Lake)	West Plains (Committee Bay Gold Project)	Gold	North Country Gold
2	Bathurst Inlet	Blue Caribou	Copper, Molybdenum, Silver, Gold, Rhenium	Skybridge Development
3	Bathurst Inlet	Contwoyto IOL Concession	Gold	Golden River Resources
4	Bathurst Inlet	Gondor	Copper, Lead, Zinc	MMG Resources/Xstrata
5	Bathurst Inlet	Hackett River	Silver, Zinc, Gold, Copper, Lead	Sabina Gold & Silver
6	Bathurst Inlet	Hood River IOL Concession	Gold	Golden River Resources
7	Cambridge Bay	Boston (Hope Bay Project)	Gold	Hope Bay Mining

Table 3.2-10 Nunavut Exploration Projects, 2010

	Nearest Community	Project	Commodities	Operator/Partner(s)
8	Cambridge Bay	Doris (Hope Bay Project)	Gold	Hope Bay Mining
9	Cambridge Bay	George Lake (Back River Project)	Gold	Sabina Gold & Silver
10	Cambridge Bay	Goose Lake (Back River Project)	Gold	Sabina Gold & Silver
11	Cambridge Bay	Madrid (Hope Bay Project)	Gold	Hope Bay Mining Ltd.
12	Kugaaruk	Amaruk Diamonds	Diamonds	Diamonds North Resources
13	Kugaaruk	Amaruk Gold	Gold	Diamonds North Resources
14	Kugaaruk	Amaruk Nickel	Nickel, Copper, Cobalt	Diamonds North Resources/MMG Resources
15	Kugaaruk	Anuri	Gold	North Country Gold
16	Kugaaruk	Halkett Inlet	Gold	MMG Resources
17	Kugaaruk	Inuk (Committee Bay Gold Project)	Gold	North Country Gold
18	Kugaaruk	Raven (Committee Bay Gold Project)	Gold	North Country Gold
19	Kugaaruk	Three Bluffs (Committee Bay Gold Project)	Gold	North Country Gold
20	Kugluktuk	Arcadia Bay	Gold	Alix Resources
21	Kugluktuk	Coppermine Project	Uranium	Hornby Bay Mineral Exploration
22	Kugluktuk	Hammer	Diamonds	Stornoway Diamond/North Arrow Minerals
23	Kugluktuk	Hepburn Base Metals	Copper, Silver	MMG Resources
24	Kugluktuk	Hepburn Diamonds	Diamonds	MMG Resources
25	Kugluktuk	High Lake	Copper, Zinc, Silver, Gold	MMG Resources
26	Kugluktuk	High Lake East	Copper, Zinc, Silver, Gold	MMG Resources
27	Kugluktuk	Hood	Copper, Zinc	MMG Resources
28	Kugluktuk	Izok Lake	Copper, Zinc, Lead, Silver	MMG Resources
30	Kugluktuk	Lupin Mine	Gold	MMG Resources
31	Kugluktuk	MIE	Nickel, Copper, Cobalt,	MIE Metals

Table 3.2-10 Nunavut Exploration Projects, 2010

	Nearest Community	Project	Commodities	Operator/Partner(s)
			Platinum, Palladium, Gold	
32	Kugluktuk	Rockinghorse IOL Concession	Gold	Golden River Resources
33	Kugluktuk	Ulu	Gold	MMG Resources
34	Kugluktuk	Wishbone	Copper, Silver, Zinc, Lead, Gold	Sabina Gold & Silver
35	Kugluktuk	Yava	Copper, Lead, Zinc, Silver, Gold	Savant Explorations
Kiva	liq			
36	Arviat	Nueltin Lake	Uranium	Cameco
37	Baker Lake	Aberdeen	Uranium	Cameco
38	Baker Lake	Ferguson Lake Diamonds	Diamonds	Thanda Resources/Starfield Resources
39	Baker Lake	Ferguson Lake Ni-Cu-PGM	Nickel, Cobalt, Copper, Platinum, Palladium	Starfield Resources
40	Baker Lake	Greyhound Lake	Copper, Lead, Zinc, Gold, Silver	Aura Silver Resources
41	Baker Lake	Judge Sissons (North Thelon)	Uranium	Forum Uranium/Agnico-Eagle Mines
42	Baker Lake	Kiggavik North	Uranium	Forum Uranium
43	Baker Lake	Kiggavik Project (Including Kiggavik, Sissons, St. Tropez Claims)	Uranium	AREVA Resources Canada/DAEWOO International/ JCU Exploration (Canada)
44	Baker Lake	Kiggavik South (North Thelon)	Uranium	Forum Uranium
45	Baker Lake	Lac Cinquante (Angilak)	Uranium	Kivalliq Energy/Nunavut Tunngavik Incorporated
46	Baker Lake	Mallery Lake Project	Gold	Uranium North Resources
47	Baker Lake	Meadowbank Mine	Gold	Agnico-Eagle Mines
48	Baker Lake	Muskox	Gold	Agnico-Eagle Mines
49	Baker Lake	Nanuq	Diamonds	Peregrine Diamonds
50	Baker Lake	Nanuq North	Diamonds	Indicator Minerals/Peregrine Diamonds/Hunter Exploration
51	Baker Lake	Nutaaq	Rare Earth Elements	Forum Uranium

Table 3.2-10 Nunavut Exploration Projects, 2010

	Nearest Community	Project	Commodities	Operator/Partner(s)
52	Baker Lake	Parker Lake	Gold	Agnico-Eagle Mines
53	Baker Lake	Schultz Lake (North Thelon)	Uranium	Forum Uranium/Agnico-Eagle Mines
54	Baker Lake	Tanqueray Block (North Thelon)	Uranium	Forum Uranium
55	Baker Lake	Turqavik	Uranium	Cameco
56	Baker Lake	Ukalik (North Thelon)	Uranium	Forum Uranium
57	Baker Lake	Yathkyed (Angilak)	Uranium	Kivalliq Energy/Nunavut Tunngavik Incorporated
58	Chesterfield Inlet	Chesterfield Inlet	Diamonds	Shear Diamonds/Stornoway Diamond
60	Coral Harbour	Southampton Island [a]	Nickel, Cobalt, Copper, Platinum, Palladium	Anglo American Exploration (Canada)
61	Coral Harbour	Southampton Island [b]	Nickel, Cobalt, Copper, Platinum, Palladium	Anglo American Exploration (Canada)
62	Rankin Inlet	Churchill	Diamonds	Shear Diamonds/Stornoway Diamond
63	Rankin Inlet	Churchill West	Diamonds	Shear Diamonds/Stornoway Diamond
64	Rankin Inlet	Meliadine	Gold	Agnico-Eagle Mines
65	Repulse Bay	Qilalugaq	Diamonds	Stornoway Diamond/BHP Billiton Diamonds
66	Whale Cove	Aura	Gold	Uranium North Resources
67	Whale Cove	Cache	Gold	Alix Resources
68	Whale Cove	SY Project	Gold	Corsa Capital/Kaminak Gold
Qikio	taaluk			
69	Arctic Bay	Nanisivik Mine	Zinc, Silver	Breakwater Resources
70	Clyde River	Bravo Lake (Baffin Island Gold)	Gold	Commander Resources/AngloGold Ashanti
71	Clyde River	Qimmiq (Baffin Island Gold)	Gold	Commander Resources/AngloGold Ashanti
72	Hall Beach	Roche Bay	Iron Ore	Advanced Exploration/Roche Bay
73	Hall Beach	Tuktu	Iron Ore	Advanced Exploration/Roche Bay

 Table 3.2-10
 Nunavut Exploration Projects, 2010

	Nearest Community	Project	Commodities	Operator/Partner(s)
74	Igloolik	Aviat	Diamonds	Stornoway Diamond/Hunter Exploration
75	Iqaluit	Chidliak Diamonds	Diamonds	Peregrine Diamonds/BHP Billiton
76	Iqaluit	Chidliak Ni-Cu-PGM	Platinum, Palladium, Lead, Zinc, Copper, Gold	Peregrine Diamonds/BHP Billiton
77	Iqaluit	Qilaq	Diamonds	Peregrine Diamonds
78	Kimmirut	Kimmirut	Uranium	Peregrine Diamonds
79	Pangnirtung	Cumberland	Diamonds	Peregrine Diamonds
80	Pond Inlet	Mary River	Iron Ore	Baffinland Iron Mines, now ArcelorMittal and Nunavut Iron Ore
81	(Repulse Bay)	Melville Gold	Gold	AngloGold Ashanti
82	Resolute Bay	Polaris Mine	Lead, Zinc	Teck Resources
83	Resolute Bay	Storm	Copper, Zinc, Silver	Commander Resources
84	Sanikiluaq	SQ-05 [a]	Copper, Iron Ore	McKinnon Prospecting
85	Sanikiluaq	SQ-05 [b]	Copper, Iron Ore	McKinnon Prospecting
Source	: Nunavut Geoscience, 2	2011	•	

In addition to Kiggavik, there are four projects in or are about to enter the environmental approval process and might be expected to start construction within the coming two to five years. This will represent an extraordinary demand for Nunavummiut labour and businesses, building of much additional infrastructure in the territory and an exceptional boost to Nunavut's GDP. A brief overview of the existing and the more foreseeable mining projects in Nunavut, as at early 2011, follows<sup>12</sup>:

<sup>&</sup>lt;sup>12</sup> Information for the project descriptions comes from proponent websites, reporting to the Nunavut Mining Symposium and documents on the NIRB public registry.

- Jericho Diamond Mine is in Kitikmeot Region, about 250 kms south of Kugluktuk. Shear Diamonds is now the operator. Tahera Diamond Corporation operated Jericho between 2006 and 2008, when it was closed as Tahera moved into bankruptcy. In 2010, the property was sold to Shear, which expects to reopen the mine, likely under environmental approvals in place. Jericho is a small mine, producing about 300,000 carats annually when it was open and employing less than 300 people on average. Shear is also actively exploring for diamonds and gold at various locations in Kivalliq Region.
- Meadowbank Gold Mine is in Kivalliq Region, about 70 km northwest of Baker Lake. Agnico Eagle is the operator. Construction costs were \$800 million and operations began in 2010. The mine has an expected operational life of nine years, at a production rate of about 400,000 ounces/year. However measured and indicated resources on Agnico Eagle's leases are now over 3 million ounces and additional deposit discoveries are considered possible. Thus there is some expectation that mine life will be extended considerably. Meadowbank is large in the Nunavut context. The work force in early 2011 was over 1,100 people, with almost 25% of these from Kivalliq communities. Project economic effects are significant in terms of increasing employment and incomes in Kivalliq and in terms of effects on territorial GDP. The project has also motivated preparation for employment training and a good business response, both of which represent contributions to Kivalliq's future capacity to supply the mining sector.
- Doris North (Hope Bay) Gold Mine is in Kitikmeot Region, about 90 km south of Cambridge Bay. The operator, Hope Bay Mining, is now owned by Newmont. The project is in construction. This small underground mine is just one of the properties in the larger Hope Bay Greenstone Belt under exploration license to Newmont. Newmont expects to seek environmental approval for a phase 2, which could include both an expansion of Doris North and the development of a number of other properties throughout their lease area. Doris North's construction phase employs about 300 people, and as currently permitted has expected production of about 300,000 ounces over an operational phase of only 2.5 years. With the development of a phase 2 however, mining in Newmont's Hope Bay complex as a whole could extend until 2029 and produce a total of 9 million ounces.
- Mary River Iron Ore Mine is in Qikiqtaaluk Region of Nunavut. It is on Baffin Island, about 160 km south of Pond Inlet. The project has very recently been acquired by a joint venture of ArcelorMittal and Nunavut Iron Ore. Mary River is a large, high grade iron ore deposit, with capital costs currently estimated at about \$4 billion. The project expects to ship 21 million tonnes of iron ore annually for 21 years, and includes the construction of a railroad to move the ore to port. Mine life could be extended or the production rate increased if, as expected, additional iron ore deposits are discovered as exploration continues. Construction will require a work force of between 3,000 and 5,700 people and take four years. Operations will employ over 1,000. The draft EIS for the project was submitted to NIRB in January 2011.
- Meliadine Gold Mine is in Kivalliq Region, about 25 km north of Rankin Inlet. The project
  was recently purchased by Agnico Eagle, now the operator. Measured and indicated
  resources are 3.3 million ounces of gold and inferred resources are 1.7 million ounces.
  Under its previous owner, Meliadine had entered the environmental approval process.

- However Agnico Eagle has reformulated the project and has submitted a revised project proposal accordingly. The project enjoys high support from nearby Rankin Inlet and Agnico Eagle is a known operator in Nunavut because of Meadowbank. The environmental process is expected to proceed comparatively rapidly.
- Hackett River Base Metals Mine is in Kitikmeot Region, about 325 km southeast of Kugluktuk. Sabina Gold & Silver is the operator. The mine will produce silver, zinc, lead, copper and gold. Capital costs have been estimated at \$700 million, project life at 16 years and operational employment at 600 people. In response to a project proposal submitted over three years ago, NIRB issued guidelines for the EIS in early 2009. However Sabina is now aggressively seeking to increase resources through ongoing exploration. With one of the world's largest undeveloped volcanogenic massive sulphide properties, the project as earlier conceived has potential to become much larger, and be operational for decades.
- High Lake and Izok Lake Base Metals Mines are in Kitikmeot Region, about 290 km south of and 255 km southwest of Kugluktuk respectively. Mineral and Metals Group (MMG) is the operator. Both projects are expected to produce silver, zinc, copper and lead Izok Lake alone currently has an estimated 14.8 million tonnes of ore containing the four metals. Previous owners of the projects had submitted a draft EIS for High Lake to NIRB however MMG's priority has shifted to Izok Lake. Izok Lake is expected to cost about \$1 billion to construct, and be operational for at least 10 years. MMG expects to move Izok Lake into the environmental approval process in 2012. MMG is also now owner of two gold properties, in Nunavut, including the Lupin gold mine MMG is looking for a buyer and/or operator to reopen this mine.

It is noted that mining sector investment implies substantial contributions to identified requirements for foundation interventions in Nunavut's economic development strategies, including the building of transportation infrastructure, and enhancing the capacity of individuals, businesses and communities. Each mining project that goes forward not only has large effects on Nunavut's economic parameters, but contributes to preparing the ground that facilitates subsequent projects and other economic and social development.

## 3.2.2.6 Other Priority Economic Growth Sectors

Tourism and the commercial fishery are the other two priority sectors for economic development in Nunavut. Tourism is largely non consumptive (excluding hunting), can be managed towards minimal environmental effects, has potential for provide substantial employment in areas that do not necessarily require advanced education and is an economic activity that is consistent with efforts to maintain the integrity of traditional cultures. Associated, Nunavut's arts and crafts sector provides income to over 20% of the Inuit working age population and is estimated to contribute over \$33 million to the economy annually (GNDoEDT, 2010b).

GN expects the tourism industry to grow in the coming years, in part as a result of the growing level of awareness of climate change and its impacts on the Arctic, its people and their cultures. The government recognizes the need to construct tourism related infrastructure while ensuring that Inuit are the primary economic and social beneficiaries of tourism and that the very cultural and ecological values that attract visitors to Nunavut are protected (GNDoF, 2008).

The commercial fishery in Nunavut focuses primarily on two species, turbot and shrimp, although inshore fishing of arctic char accounts for a small percentage of the sector. The fishery has grown over the recent past – there have been larger allocations for turbot and shrimp catches for Inuit and increased investments in offshore fishing vessels. As noted earlier, the commercial fishery is believed to have contributed over \$30 million annually and has some room for continued growth through increased quotas.

### 3.2.2.7 Economic Infrastructure

Economic development strategy documents note the need to develop infrastructure in Nunavut if goals are to be achieved. There are no road connections between any Nunavut communities and no connection to the south. Currently, aside from networks of roads in and around some communities, the only road of length is the road to Meadowbank. To travel overland between communities and to harvest and exploration sites, people and mining companies use snow machines and all terrain vehicles.

Discussions have been ongoing for years about the construction of an all weather road linking Rankin Inlet to Churchill, and then to southern Manitoba. In 2009, a business plan for the road was completed and there are plans to move to a cost benefit analysis. The road is of immense interest to Kivalliq despite some controversy about potential negative environmental and social effects however progress on the project is unpredictable. The future of the Bathurst Inlet Port and Road Project, which would build over 200 kms of road in Kitikmeot to facilitate the development of its mining potential, is also uncertain.

Thus Nunavummiut and tourists largely travel within and into Nunavut by air, while goods are transported by sea during the short summer season, or by air. Both air and sea transportation infrastructure is in need of updating and expansion. Every community has an airport but these are not always sufficient to meet the needs of residents and visitors. Most of the airports were constructed decades ago. Because of changes in aircraft design more modern (and cost efficient) planes are unable to land in most communities. Marine transportation infrastructure is also constrained. With few updated charts and very basic landing facilities, boats and cargo suffer damage and delay. As with roads, there are various projects underway to improve air and marine transportation infrastructure. A new airport in Arctic Bay has just opened, the Nanisivik Naval Facility is expected to start construction in 2013 and smaller upgrades are underway at various air and marine facilities across the territory.

The needed transportation investments are large – the mining sector appears to offer the most potential for building new transportation infrastructure, although such infrastructure will be purpose built and therefore may not always meet the requirements of, for example, the tourist sector.

Telecommunication in Nunavut relies on costly satellite technology because ground based systems such as fiber optic cable and microwave are not feasible. There are a number of internet service providers in Nunavut. Recent years have seen a steady flow of investment in broadband infrastructure, notably the upgrades to the QINIQ service. The investment in QINIQ is part of a five-year commitment between Nunavut Broadband Development Corp, SSI Micro and the federal government. QINIQ is introducing services for classroom connectivity, large data transfers, audio and video conferencing and direct connections with other internet service providers in the larger Nunavut communities.

### 3.2.2.8 Government Revenue

Nunavut's economy is dominated by the GN expenditures. The public sector typically accounts for about 40% to 50% of domestic demand, half to three quarters of capital formation (in the absence of large mining projects) and a third of formal sector employment in the territory. Government revenue was projected to total \$1.355.9 billion in 2011/12. Transfers from the federal government represented 92% of this revenue, with only 8% coming from own source revenue – the biggest own source revenues are from taxes on personal income, payrolls and tobacco. Government expenditures were expected to be \$1.316.9 billion in 2011/12, with about 90% for operational expenditures and the balance for capital investments. This would allow the government a small surplus.

A high proportion of the GN budget is expended on non discretionary entitlement programs, constraining budget flexibility. In 2010/11, GN spent almost half of its revenue on social services, including education, health, social assistance and social housing — in part as a result of the challenging socio-economic status of the population (see Table 3.2-11). However in addition, costs for fuel, labour and transportation (including between Nunavut and the rest of Canada), result in higher unit costs for government services (as well as for personal and business goods and services).

Fuel alone was estimated to take up about 20% of government's annual budgets in 2006 (GNDoF, 2010). 13 Per capita government spending is about three times that of Canada as a whole.

Table 3.2-11 Operational Expenditures

	2008/09	2009/10	2010/11	2011/12
Health and Social Services	281.7	290.0	292.9	297.0
Education (includes Nunavut Arctic College)	204.0	249.7	230.1	221.2
Community and Government Services	165.2	169.5	167.7	184.2
Nunavut Housing Corporation	119.0	128.5	133.1	143.8
Justice	74.4	74.1	78.2	88.4
Finance	63.9	52.3	58.0	61.3
Economic Development and Transportation	53.3	56.5	52.7	58.4
Other	93.1	59.1	99.2	140.1
Total	1,054.6	1,079.7	1,111.9	1,194.4

Source: GNDoF, 2010 and 2011

Note: Figures for 2010/2011 are revised estimates and figures for 2011/12 are budget estimates

Revenue growth is expected to average about 4% to 5% annually between 2011 and 2020 provided renegotiation in 2014 of transfers from the federal government does not result in material changes (see Table 3.2-12). Growth in expenditure over the period will be slight slower. The Conference Board or Canada also expects own source revenues to increase at a slightly slower pace than federal transfers, so transfers will continue to represent over 90% of total revenues for the foreseeable future.

<sup>&</sup>lt;sup>13</sup> This is the last year for which full data are available.

Table 3.2-12 Government Revenues and Expenditures

	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Total revenue	1,284.5	1,373.4	1,451.5	1,531.1	1,602.5	1,677.6	1,757.6	1,838.5	1,921.4	2,006.3
Total revenue	4.6	6.9	5.7	5.5	4.7	4.7	4.8	4.6	4.5	4.4
Own source	116.9	123.5	128.9	134.5	140.9	146.5	153.4	160.1	166.6	172.9
revenue	-10.1	5.6.	4.4	4.3	4.8	4.0	4.7	4.4	4.1	3.8
Transfers from	1,167.6	1,250.0	1,322.6	1,396.6	1,461.6	1,531.1	1,604.1	1,678.4	1,754.8	1,833.3
Government of Canada	6.3	7.1	5.8	5.6	4.7	4.8	4.8	4.6	4.5	4.5
Total ave anditures	1,211.0	1,277.1	1,346.3	1,414.4	1,478.7	1,547.2	1,619.5	1,693.0	1,768.6	1,846.2
Total expenditures	6.4	5.5	5.4	5.1	4.7	4.8	4.9	4.7	4.6	4.5

Source: CBoC, 2010

Note: The unshaded rows present the dollar amounts and the shaded rows the percent change from the year before.

### 3.2.3 Social Context

The social context in Nunavut challenges hamlet, regional, territorial and federal governing institutions. Nunavut lags most of the rest of Canada with regard to most socio-economic indicators and there are concerns that strengths — particularly those related to societal values that provide some social security through sharing for example — are being eroded. Poor wellbeing of many Inuit is a function of poverty, hunger, changing diets, substance abuse, smoking and poor housing as well as consequent domestic violence, suicide and crime.

These problems have been discussed over time and at length by governments, academia, the media and Nunavummiut. Policies, strategies, plans, programs and projects have been proposed and implemented. While progress is impressive in some areas, the socio-economic indicators continue to show sharp divides between Nunavut and the rest of Canada. This section presents available data to outline the challenges and trends – information pertinent to the assessment of the potential for both negative impact and benefit from the Kiggavik Project.

# 3.2.3.1 Population and Demographics

Nunavut's population, of 33,413 people by July 2011 (GNBS, 2011b), is distributed among 26 communities in the three regions of Kivalliq, Kitikmeot and Qikiqtaaluk, with over half the total population in Qikiqtaaluk. Population grew rapidly over the 1980s and early 1990s, approaching 3% annually on average. This growth was largely attributable to high fertility rates which were double those of Canada as a whole. Growth rates then slowed substantially during the 2000s, to below 2%

annually, and are expected to fall further in the coming decade. GNBS (2011b) forecasts population growth at 1.3% in 2010, falling to 1.1% by 2026.<sup>14</sup>

In the absence of significant net out migration, which is not occurring in Nunavut (GNBS, 2011b), slower population growth implies a gradual increase in the median age. In 2006, Nunavut's median age was 23.1 years, as compared to a median age in Canada of 39.5 years. Despite an expected increase in the median age, Nunavut will continue to have a young population relative to the rest of Canada for years to come.

Data that permits comparing demographic characteristics of Nunavut to Canada are most recently available from 2006 (Statscan, 2007a, see Table 3.2-13). As at the time of the 2006 census, Nunavut's population was 85% aboriginal, 99% of whom were Inuit and most of whom had Inuktitut as a mother tongue. The average household size was 4.2, as compared to 3.5 in Canada, and 20% of houses were in need of major repair, as compared to less than 2% in Canada. Single parent households represented 25% of all households, as compared to 15% in Canada, and incomes of these households were very low, less than half that of all families. The male/female ratio was 1.05 in Nunavut as compared to 0.96 in Canada<sup>15</sup>. Mobility rates were low by Canadian standards.

Table 3.2-13 Demographic Characteristics, 2006

	Kivalliq	Kitikmeot	Qikiqtaaluk	Nunavut
Population in 2006	8,348	5,361	15,765	29,474
Population in 2001	7,557	4,816	14,372	26,745
2001 to 2006 population change (%)	10.5	11.3	9.7	10.2
Average household size	4.0	3.9	3.5	3.7
Median age of the population	21.1	22.1	24.5	23.1
Dwellings requiring major repair (%)	24.8	24.1	16.8	20.2
Percent of female lone-parent families	27.1	22.9	19.8	27.6

<sup>&</sup>lt;sup>14</sup> These rates are lower than the forecasts of the Conference Board of Canada, who are forecasting growth rates of 1.5% and higher until 2015. See Table 3.2-7 in Section 3.2.2.4.

<sup>&</sup>lt;sup>15</sup> A ratio >1 indicates men outnumber women, and <1 that women outnumber men.

Table 3.2-13 Demographic Characteristics, 2006

	Kivalliq	Kitikmeot	Qikiqtaaluk	Nunavut
Median income in 2005, all families	42,368	45,875	54,699	49,270
Median income in 2005, lone parent families	21,248	20,704	24,064	22,576
Mother tongue other English or French (%)	81.0	44.3	77.1	72.2
Moved hamlet/city in the last year (%)	4.9	5.8	7.3	6.3
Moved hamlet/city in the last 5 years (%)	12.8	13.4	19.5	16.5
Aboriginal identity population (%)	90.4	89.7	80.5	85.0
Source: Statscan, 2007a	•	•	•	•

The figures for each of the three regions in the table above show evidence of regional disparity, most obviously between Qikiqtaaluk and the other two regions. Kivalliq and Kitikmeot could in some respects be considered more disadvantaged relative to Qikiqtaaluk, for example in terms of income and housing. Forty percent of Qikiqtaaluk's population lives in Iqaluit, with its more developed economy and larger non Inuit population. This has a strong effect on the regional averages in the table above. The evidence is that Qikiqtaaluk's smaller communities share many of the characteristics of communities in Kivalliq and Kitikmeot (Baffinland, 2011).

## 3.2.3.2 Education and Employment

Nunavut adult education achievement levels are well below Canadian averages. In 2006, more than 55% of the 15 years and over population had not graduated from high school and only 9% had a university degree. Comparable numbers for Canada were 24% and 17% respectively. Taking into account that women are much less likely than men to pursue trade certification, there was some balance in the educational achievement of men and women. Of more concern is that educational achievement may have declined over time. While the younger people in the 15 to 24 years age group would not have been expected to finish high school, this cannot fully account for the differences in educational achievement between this age group and the older ones – 80% of the youngest age group had not completed high school as compared to 46% of people 25 years and older. (See Table 3.2-14.)

The numbers for the regions again demonstrate disparities between Qikiqtaaluk and the other two regions. The trend to fewer people graduating from high school with time is clearer (in both Kivalliq and Kitikmeot the highest percentages of high school graduates were in the oldest age group and the lowest percentages in the youngest age group). There is also evidence that women's achievement fell short of men's in these two regions while it was better than men's in Qikiqtaaluk.

Poor educational achievement has been attributable to very many causes, many of which continue to persist despite the availability of high schools in all communities, and of a post secondary institution, Nunavut Arctic College (NAC), with campuses in the larger Nunavut communities. However, there is very recent evidence that poor high school graduation rates are improving. NAC reported to the Nunavut Mining Symposium in 2011 that high school graduation rates had increased from 149 in 2000 to 228 in 2010 – growth of over 50% (NAC, 2011). In Kivalliq graduation rates had almost doubled over the same period – major developments in the mining sector, underway for some time, may have been a motivating factor.

Table 3.2-14 Educational Achievement by Region, Age Group and Gender, 2006

		Kivalli	9		Kitikme	ot	(	Qikiqtaa	luk		Nunavı	ut
	Total	Male	Female	Total	Male	Female	Total	Male	Female	Total	Male	Female
Total population 15 years and over												
No certificate, diploma or degree	64.6	63.5	65.7	61.4	58.5	64.5	52.3	51.8	52.8	57.3	56.1	58.6
High school certificate or equivalent	10.1	9.0	11.0	7.7	8.5	6.7	12.4	12.0	12.8	10.9	10.6	11.2
Apprenticeship or trades certificate or diploma	6.4	10.2	2.5	10.9	15.5	6.1	5.9	9.1	2.6	7.0	10.5	3.2
Post secondary certificate or diploma below bachelor level	12.7	11.7	13.7	13.1	12.4	14.0	18.2	16.7	19.9	15.8	14.6	17.1
University certificate, diploma or degree	6.4	5.6	7.1	6.7	5.1	8.1	11.1	10.3	12.0	9.0	8.1	10.0
Population aged 15 to 24												
No certificate, diploma or degree	85.8	88.3	83.9	85.7	84.0	86.5	74.3	76.6	71.8	79.9	81.3	78.3
High school certificate or equivalent	10.5	9.2	11.8	8.6	8.5	8.7	17.1	15.5	18.6	13.6	12.6	14.7
Apprenticeship or trades certificate or diploma	0.6	1.2	1.2	3.3	4.7	1.9	1.9	2.0	1.8	1.9	2.3	1.5
Post secondary certificate or diploma below bachelor level	2.5	1.2	3.1	2.4	1.9	1.9	5.3	5.0	5.7	3.7	3.0	4.6
University certificate, diploma or degree	0.0	0.0	0.0	0.0	0.0	0.0	1.4	1.3	1.4	0.9	0.9	1.1
Population aged 25 to 34												
No certificate, diploma or degree	54.7	55.4	53.7	49.0	47.3	50.0	41.2	43.4	39.1	46.0	47.3	44.9
High school certificate or equivalent	12.8	9.9	15.4	10.7	12.2	7.9	15.1	14.8	15.3	13.7	13.1	14.4
Apprenticeship or trades certificate or diploma	7.4	12.4	2.4	13.4	18.9	9.2	6.2	10.2	2.7	7.7	12.0	3.5
Post secondary certificate or diploma below bachelor level	16.9	16.5	17.1	16.1	14.9	17.1	22.4	20.7	26.1	20.4	18.2	22.4
University certificate, diploma or degree	9.1	6.6	11.4	10.7	8.1	14.5	14.1	11.3	16.9	12.2	9.3	14.8

Table 3.2-14 Educational Achievement by Region, Age Group and Gender, 2006

		Kivalliq			Kitikmeot		(	Qikiqtaaluk		Nunavut		
	Total	Male	Female	Total	Male	Female	Total	Male	Female	Total	Male	Female
Population aged 35 to 64												
No certificate, diploma or degree	52.1	47.5	56.3	47.2	42.5	52.3	42.8	39.3	46.8	46.0	42.0	50.2
High school certificate or equivalent	8.9	9.0	8.9	6.3	7.8	5.4	8.9	9.2	8.6	8.5	8.8	8.0
Apprenticeship or trades certificate or diploma	10.6	17.0	4.2	15.6	22.2	8.7	8.3	12.8	3.2	10.2	15.5	4.5
Post secondary certificate or diploma below bachelor level	18.8	17.0	20.6	21.2	20.3	23.5	24.2	22.8	25.9	22.2	20.9	23.7
University certificate, diploma or degree	9.9	9.4	10.3	9.6	8.5	11.4	15.7	15.6	15.8	13.1	12.7	13.5
Source: Statscan, 2007a	•	•	•			•		•	•			

Table 3.2-15 presents 2006 employment and income data, broken down by region and gender. Nunavut's labour force participation rate in 2006 was only slightly lower than Canada's, at 65.3% as compared to 66.8%. Men had a higher participation rate than women. However the unemployment rate of 15.6% was much higher than in Canada. Men had higher unemployment rates than women, in the order of 5% higher. More recent data from GNBS (2011a) indicate that these figures for participation (65.5%) and unemployment (15.0%) rates and gender disparities persisted through 2010 and 2011.

Median annual incomes in Nunavut, at \$20,982 were lower than in Canada, at \$26,850 although median earnings from full time/full year employment were \$58,088, about 40% higher than in Canada. High wages for work in the formal sector reflect the much higher cost of living in Nunavut that must be compensated by employers. Unlike in Canada overall where there is a 20% differential between earnings of men and women, there is little difference in Nunavut – the exception was Kivalliq, where men earned 17% more than women on average (there was little mining activity in Kivalliq in 2006, so this is not the explanation). The percentage of total income that came from government transfers, at about 11%, was comparable between Nunavut and Canada.

The regional differences are again clear – Qiliktaaluk had higher labour force participation, lower unemployment, higher earnings and incomes and less dependence on government transfers than either Kivalliq or Kitikmeot. Employment gender differences persisted in all three regions however – women were less likely to be in the labour force, but more likely to find employment once they entered. Women were also more dependent on government transfers than men, likely in most part attributable to the high incidence of female headed lone parent households.

 Table 3.2-15
 Employment and Income Indicators

	Kivalliq				Kitikmeot			Qikiqtaalu	ık	Nunavut		
	Total	Male	Female	Total	Male	Female	Total	Male	Female	Total	Male	Female
Participation rate	61.7	63.7	59.5	63.0	66.9	59.3	67.9	70.4	65.3	65.3	67.9	62.6
Unemployment rate	15.7	18.9	12.3	20.2	22.4	17.6	14.0	16.0	11.7	15.6	17.8	13.0
Average wage for full time/full year work	50,104	50,159	50,033	56,864	60,000	50,815	60,060	60,111	60,006	58,088	59,915	56,005
Median earnings, people 15 years and over	23,232	24,040	21,909	20,041	23,984	16,969	30,079	32,090	30,010	26,848	29,235	24,973
Median income, people 15 years and over	17,440	16,832	17,760	18,944	20,971	16,928	24,518	26,176	22,816	20,982	22,552	20,047
Composition of total inco	me											
Earnings, as % of total income	84.1	88.9	78.9	83.8	88.3	78.7	88.2	90.9	84.7	86.5	90.0	82.3
Government transfers, as % of total income	14.2	9.2	19.6	14.1	9.5	19.9	9.3	6.1	13.2	11.2	7.4	15.8
Other money as % of total income	1.8	2.0	1.6	2.0	2.3	1.7	2.5	2.9	2.0	2.3	2.6	1.9
Source: Statscan, 2007a	•	•	•	•	•	•	•	•	•	•	•	•

### 3.2.3.3 Health

Health is broadly defined as a state of complete physical, mental and social wellbeing, not merely the absence of disease or infirmity. The determinants of health are broad, and include socio-economic parameters such as income, education, environment, social support networks and culture. A series of workshops with Inuit women in Nunavut in 2005 (Healy, 2006) defined the following eleven social determinants of Inuit health:

- acculturation (cultural change as a result of intercultural contact)
- productivity (including harvesting, sewing, paid and voluntary work, etc.)
- income distribution
- housing
- education
- food security and nutrition
- health care services
- quality of early life
- addictions
- social safety nets
- environment.

These determinants are somewhat different from those defined by the Public Health Agency of Canada (PHAC, 2003) for the health for the Canadian population as a whole. The Inuit determinants do not include gender or personal health practices as do the Canadian determinants but do include food security, housing and addictions, not included among the Canadian determinants. More interesting perhaps, whereas the Canadian determinants include income and social status as one determinant and employment and working conditions as another, the Inuit determinants are framed in the language of productivity and of income distribution.

Inuit Tapiriit Kanatami (ITK, 2010) prepared a report on Inuit health, comparing available data for the four regions of Inuit Nunangat and for Canada over the periods 1994 to 1998 and 1999 to 2003. Over the 1999 to 2003 years, total mortality, infant mortality, cancer mortality and suicides in Nunavut were two, three, four and eight times higher than in Canada and life expectancy was more than twelve years less. Further, ITK's comparison with data from each of the two periods indicated

that total mortality, cancer mortality and suicides rates had gone up in Nunavut and down in Canada and that life expectancy had gone down in Nunavut and up in Canada. The gaps between the health of the Inuit and that of people in the rest of Canada were in fact widening. Only rates of infant mortality had improved in Nunavut – however they were still much higher than in the rest of Canada.

The Public Health Agency of Canada has more recent health data for provinces and territories <sup>16</sup>, from the years 2007 and 2008 (see Table 3.2-16). Some positive outcomes are evident. Rates of mortality, heart disease and suicide had declines over the period 2000 to 2007 (PHAC, 2010b, 2010c). Rates were still higher than Canadian averages but gaps were closing rather than widening.

Table 3.2-16 Selected Death and Disease Incidences (rate/100,000 people, age adjusted)

	Nu	navut	Ca	nada
	2000	2007/8	2000	2007/8
Deaths (2007)		•		
all causes	1,159	996	616	540
all cancers	302	340	180	166
lung cancer	195	202	64	58
major cardiovascular disease	230	187	209	152
diabetes	0	0	19	17
suicide	83	56	11	10
Diseases (2008)		•		
chlamydia	2,567	4,251	150	250
gonorrhoea	347	1,154	20	38
tuberculosis	170	174	6	5
Source: PHAC, 2010a and b	·	•	•	•

The ITK looked specifically at health in Inuit regions, three of which are contained within other provinces/territories with majority non Inuit populations. PHAC data are reported by province/territory, thus approximately characterize Inuit health only in Nunavut, where 85% of the population is Inuit.

Cardiovascular related death rates approximate those in the rest of Canada. Although no diabetes deaths were reported, diabetes in Nunavut's population is thought to be a high risk in face of changing diets and activity levels, as evidenced by diabetes education and prevention programs. Sexually transmitted infection (STI) rates have rapidly increased and are very high – the most common are chlamydia and gonorrhea. The first HIV diagnosis in Nunavut occurred in 2002 and although the disease has been rarely diagnosed since then, high STI rates elevate concerns about HIV becoming more prevalent.

There is very little data on some other health issues that are considered to be challenging in Nunavut. Outbreaks of infectious diseases in Nunavut are distressingly common, including respiratory syncytial virus, community acquired methicillin-resistant Staphylococcus aureus and, most recently, tuberculosis (Macdonald et al, 2011). Alcohol consumption is thought to be higher in Nunavut than in the rest of Canada, including among pregnant women — fetal alcohol syndrome/effects can result. Drug abuse levels are considered high. Levels of smoking have been reported to be three to four times the Canadian averages (Henderson, 2007). High lung cancer and respiratory illness rates, the latter among children as well, are attributed to heavy smoking and/or exposure to second hand smoke. Mental health is challenging to diagnose and treat with the lack of facilities in Nunavut.

There are more data available on traffic accidents and injuries. Snow machines and all terrain vehicles, in high use within and between communities, are more dangerous than cars. Traditional activity on the land also creates potential for accident and injury given the environmental conditions. However people report increasing use of safety equipment to mitigate the risk.

Table 3.2-17 presents Transport Canada's data for fatality and injury rates for road accidents as rates i) per 100,000 population; and ii) per billion vehicle km. It is noted that because Nunavut's population has been less than 30,000 for most of the period 2004 to 2008 covered in the table, a rate of 3.4 fatalities per 100,000 population is equivalent to one fatality and a rate of 12.6 is equivalent to four fatalities. Similarly, one fatality translates to a rate of 33.7 fatalities per billion km driven and four fatalities to a rate of 132.5 per billion km. There are few roads in Nunavut so distances driven are on average short.

In Canada fatalities and injuries have consistently declined, on both population and km driven bases, over the period 2004 to 2008. In Nunavut, rates per 100,000 population are variable, no trend is evident, and with the exception of 2008 with its four fatalities, fatality and injury rates have been lower than in Canada. However, on a km driven basis, rates of both fatalities and injuries can be much higher in Nunavut than in Canada.

Nutrition is an input to and foundation for health and development – better nutrition means stronger immune systems and less illness, and healthy children learn better. In an investigation of household and children's food security, it was found that less than a third of households, and fewer than half of

children regularly had enough food on a daily basis (see Table 3.2-18). Lack of food security is a function of poverty, but may also be linked to choices made with regard to expenditure of disposable income.

Table 3.2-17 Transport Canada Motor Vehicle Traffic Collision Statistics

	luriodiation	Per 100,00	0 Population	Per Billion Vehicle-Kilometers				
	Jurisdiction	Fatalities Injuries		Fatalities	Injuries			
	Canada	7.3	536.6	7.4	549.2			
2008	Nunavut	12.6	129.7	132.5	1,357.6			
2007	Canada	8.4	589.7	8.3	584.4			
2007	Nunavut	0.0	48.0	0.0	461.5			
	Canada	8.9	604.0	8.9	604.2			
2006	Nunavut	0.0	214.0	0.0	n/a			
2005	Canada	9.1	652.7	9.3	668.0			
2005	Nunavut	6.7	240.1	n/a	n/a			
2004	Canada	8.5	664.7	8.8	680.8			
2004	Nunavut	3.4	222.6	33.7	2,222.2			
Source: Transport Canada, 2011								

Table 3.2-18 Food Security, 2007/2008

	Overall Household Food Security (%)	Child Food Security (%)
Food secure	30.4	43.9
Food insecure	69.6	56.1
moderately insecure	35.3	31.0
severely insecure	34.4	25.1
Source: Egeland et al, 2010		

Poor health status is despite high per capita spending on health in Nunavut, about twice the Canadian average. High health costs are due to high demands and needs for health services, but also to expenses associated with servicing small, remote populations reachable only by air. All

communities have health centers staffed with nurses and counselors, however typically doctors, mental health professionals, medical specialists and dentists serve communities on a fly in basis and many patients, including the seriously ill, many pregnant women and substance abusers, must be transferred to southern Canada for treatment.

Community wellbeing is also a function of public security. Crime levels in Nunavut are high. Total crime and violent crime rates were 389 and 94 per 1,000 people in Nunavut in 2009, about six and fourteen times the Canadian rates (see Table 3.2-19). Kivalliq is distinguished by its low crime rates relative to the rest of Nunavut.

Table 3.2-19 Crime Rates (per 1,000 people)

	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
Total crime rate										
Kivalliq	140	193	174	201	248	205	183	194	203	226
Kitikmeot	258	284	358	451	455	395	455	399	399	434
Qikiqtaaluk	238	287	345	408	414	423	352	348	436	461
Nunavut	214	260	300	358	375	356	323	313	363	389
Violent crime rate										
Kivalliq	56	64	69	62	68	58	57	53	55	60
Kitikmeot	76	88	115	145	142	123	113	96	114	123
Qikiqtaaluk	91	100	95	110	103	104	90	109	114	102
Nunavut	79	88	91	103	100	94	85	91	97	94
Source: GNBS, 2011c										

Government is responsible to provide affordable (social) housing to Inuit in cases of need. In 2010, 51% of houses were social housing, 22% were privately owned and almost all of the rest were staff houses provided by public and private sector employers (GNBS, 2011d, see Table 3.2-20). Housing conditions are however poor and many of Nunavut's education, health and wellbeing weaknesses are attributed at least in part to poor housing conditions – 49% of houses are overcrowded and/or in need of major repair. People are Qikiqtaaluk have better housing than in the other two regions. The Government of Nunavut estimates unmet demand for housing at over 3,580 units, equivalent to over 40% of current housing stock.

Table 3.2-20 Housing Characteristics

	Kivalliq		Kitikmeot		Qikiqtaaluk		Nunavut	
	Number	%	Number	%	Number	%	Number	%
Total Dwellings	2,310	n/a	1,450	n/a	4,800	n/a	8,560	n/a
Public housing	1,360	60	900	63	2,150	45	4,400	52
Dwellings crowded and/or require major repairs	1,240	56	820	58	1,970	44	4,030	49
Households dissatisfied with condition of dwelling	900	40	540	39	1,630	35	3,070	37
Groups of people who would move (demand)	1,030	44	790	41	1,760	37	3,580	40
Internet available in the house	1,430	63	760	53	2,830	59	5,020	59
Source: GNBS, 2011d	•		•		•		•	

## 3.2.3.4 Non Inuit Population

Reference has been made to the differences between Qikiqtaaluk and the other two regions, noting that this is at least in part due to the effects of Iqaluit on the Qikiqtaaluk figures. Part of this is the effect of the higher proportions of non Inuit in Qikiqtaaluk, with their starkly different socio-economic parameters as compared to the Inuit population. The table below provides some data on these differences. Statistics Canada does not publish data on non Inuit populations; however manipulation of data for Nunavut as a whole and for its Aboriginal population (which was 99% Inuit in 2006) allows the back calculation of some data for the non Inuit population. Selections from these data are presented in the Table 3.2-21.

Whereas Statistics Canada reports many additional data than reported in the table, for both communities and for Aboriginal populations, many of these data are not comparable for reasons of different methodologies and of different data interests for different Canadian subpopulations. Further, data presented by Statistics Canada as 'median' cannot be back calculated.

Table 3.2-21 Selected Socio-economic Indicators for Nunavut Aboriginal and Non Aboriginal Populations

	Total	Aboriginal	Non Aboriginal
Total population	29,475	24,915	4,410
Population 15 years and over, %	66.1	62.3	89.8
Male/female ratio	1.05	1.02	1.26
Population 25 to 64 with no certificate, diploma or degree (%)	46.0	59.3	7.6
Median earnings	26,848	17,959	n/a
Median earnings for full time, full year work	58,088	46,020	n/a
People with earnings working full time, %	48.4	40.3	71.5
Participation rate, %	65.3	59.1	90.4
Unemployment rate, %	15.6	20.1	3.5
Same town, 1 year, %	93.7	96.1	80.1
Same town, 5 years, %	83.5	90.2	48.7
Same Province, 1 year %	95.1	99.0	82.8
Same Province, 5 year %	90.2	97.3	53.4
Source: Statscan, 2007a, 2007b			

In 2006, the non Inuit population represented 15% of the total population of Nunavut, 20% in Qikiqtaaluk Region and 40% in Iqaluit. The non Inuit as a group are a younger population than in Canada more generally, just over 10% are children as compared to over 35% of the Inuit and less than 2% are 65 years and over. The non Inuit are thus overwhelmingly of working age and have a very unusually high participation rate (93.7% in mid 2011 as compared to a rate in Canada of about 65%). There are also many more men in the non Inuit population than would be expected in a well established residential population. The non Inuit are also more mobile than the Inuit. Twenty percent had arrived at their current address from elsewhere in Nunavut or, much more commonly elsewhere in Canada, within the previous year, and over 50% had arrived within the previous five years.

Over 90% on non Inuit have post secondary credentials and they almost all work. Non Inuit have an unemployment rate below 4% (which is effectively no unemployment as 4% is considered a 'natural' rate of unemployment – made up of people who are between jobs or on some type of leave, for example). Although median earnings for non Inuit cannot be back calculated, that the 15% non Inuit population can raise median earnings of the total population relative to the Inuit population by 50% is a strong indication of the earning power of non Inuit. Part of this difference is a result of more non

Inuit being in the labour force. However even for people employed full time/full year, non Inuit raise median earnings by 20%.

Although there are of course many exceptions, the age distribution, gender balance, mobility, education achievement and labour force characteristics of the non Inuit as a group suggest that many have come to Nunavut to work, rather than to settle down, raise families and grow old.

# 4 Kivalliq Region and Its Seven Communities

# 4.1 Baseline Methodology

The baseline methodology for the local study area, Kivalliq and its seven communities included the following components:

- consultations with people in each community, as well as with representatives of local, regional and territorial government organizations and other stakeholders, to define key issues
- literature review and secondary data collection
- identification of data gaps, and design and implementation of a primary data collection program to fill those gaps
- integration with IQ
- data entry, analysis and reporting.

### 4.1.1 Consultation and Definition of Issues

(AREVA will include a report on engagement and IQ in the draft EIS, which will provide more information than is included in this summary section.)

Consultations undertaken prior to end 2010 enabled the development of a preliminary list of issues that would need to be addressed in the socio-economic impact assessment. These issues were used to develop, and refine, the socio-economic baseline data collection program for Kivalliq, to ensure that the baseline included the information needed to adequately assess the potential for Project effects.

People's issues can evolve with time and are therefore subject to change. Additionally, AREVA's experience elsewhere in northern Canada, ongoing regulator input, and lessons learned from other mining projects in Nunavut can suggest issues additional to those raised by communities themselves. For purposes of the socio-economic data collection program, issues taken into consideration included the following:

The seven communities in Kivalliq have limited employment opportunities. People expect
the Kiggavik Project to create employment opportunities across the region. Youth
employment is given particular emphasis.

- People recognize the importance of training, both to prepare for employment and to advance once employed. Training is regarded as not only AREVA's obligation but also an obligation of government.
- Business opportunities are also expected. Business activity creates additional jobs and income to that generated by direct employment by the Project and is a source of employment that may be preferred by people whose personal circumstances make rotational employment a difficult choice.
- There may be some potential for migration in response to the economic stimulus that Project will represent, as well as in response to the Project's work force management. Migration in turn can have multiple effects, both positive and negative, on socio-economic conditions.
- There are concerns that sufficient benefits are retained in Nunavut, and do not flow outside the territory. There are also concerns that large projects benefit some but not others and that economic benefits of projects are not always distributed according to the potential for negative effects.
- While rapid increases in employment benefit many, subsequent effects on local businesses and service providers – who must compete in the labour market for workers – include rapid turnover of staff, difficulties in identifying replacement staff, increased training costs and lost productivity.
- Large projects have potential for environmental effects on land, water, wildlife, fish, marine mammals and other natural resources. There are three socio-economic aspects to this i) many people still depend on such resources for at least a part of their livelihoods; ii) traditional use of such resources is central to people's sense of identity and wellbeing; and iii) environmental conservation is a fundamental Inuit cultural value.
- Related to the bullet above, people's concerns about environmental effects are heightened on two grounds – Kiggavik is a uranium project and climate change is observably underway.
- Any environmental effects should be considered not only in terms of traditional use of the land and resources for household consumption, but also in terms of commercial uses including commercial harvesting and tourism. The Project may also have implications for the further development of the mining sector. These three sectors are priority economic development sectors in both Nunavut and Kivalliq.
- While participation in the wage based component of the economy is critical to the
  economic and social wellbeing of Inuit, this needs to accommodate continued land based
  economic activity. Wage based employment should not be at the expense of retention, at
  the community level, of traditional activity, language, skills, knowledge or values.
- While people look forward to increased incomes and many individuals and families will benefit in terms of household economies and health, there is some concern that rotational work and new disposable income can lead to poor personal choices, such as substance abuse, gambling and inappropriate sexual activity. In turn, these choices can be associated with poor parenting, domestic violence, family breakdown, crime and suicide, which can affect not only individual and family wellbeing, but also potentially community wellbeing.

- Social and physical infrastructure and services are often ill equipped to deal with any
  increased demand as a result of a large project. There are many potential linkages. As
  examples, changed behaviors can put pressures on health and policing services,
  population growth can result in more crowded housing, and the use of any community
  infrastructure by a project can mean reduced availability for community needs.
- Related to the above, there is an expectation that some Project infrastructure could be of benefit to nearby communities. There is high interest for example in public use of a Project access road. Docking facilities are also expected to benefit communities where these are built.
- Institutional capacity and governance are issues. For example, there are concerns about the oversight capacity of Nunavut's institutions of government relative to the Project with regard to, for example, the monitoring of AREVA environmental and social performance.
- Concerns about the health and safety of people (including workers) and emergency response planning, which are general to large projects, are more acute because or perceived risks to human health related to uranium mining.
- The construction of a road between Baker Lake and the Project raises an opportunity for improved access to land and its resources, and consequent changes to the intensity, seasonality and geographic distribution of harvesting.
- Road construction may also have implications for traffic and road safety.
- Project effects on all heritage resources need to be considered, including on archaeological sites but also any effects on other sites of cultural value.
- The Project is expected to have a positive economic effect not only on the economy of Kivallig and its seven communities but also on the economy of Nunavut.
- The Project will affect the fiscal position of the Government of Nunavut, both through generation of revenues but also potentially from costs that may be imposed by Project activities and their effects on demand for infrastructure and services. There will also be fiscal benefits to Nunavut Tunngavik Incorporated (NTI).
- The effects of temporary closure, decommissioning and post decommissioning need to be considered in the assessment. Economic and environmental effects are of primary concern however the disposition of Project assets at decommissioning (including for example the access road, docking facilities, air strip and accommodation complex) is also of interest.
- Cumulative effects are of significant interest, especially in Baker Lake and Chesterfield Inlet, given that Meadowbank is in operation, that other large projects are in the development stage and that many other exploration projects, including for uranium, are underway across the region.
- There is a requirement to take full account of traditional knowledge in the assessment of Project effects, and the development and implementation of mitigation and benefit enhancement measures and monitoring programs.
- Engagement with governments at all levels, as well as with people in communities, will be
  required throughout the development and implementation of the Project. There is also an
  expectation of participation by people in Project decisions that may affect them.

Engagement requires that people have the information they need to engage from an informed position. People have commented during various engagement events on the lack of information on the Project, EA approval processes and the uranium mining industry. There has also been concern about accessibility to information for unilingual Inuktitut speakers.

Table 4.1-1 presents a tabulation of formal consultation event results, to provide an indication of the priority to which communities have given to different issues. It is emphasized that the table is indicative only. The various consultation events have had different objectives, presented different information and posed different questions of participants. There are language and interpretation issues in assigning comments to a small number of categories. Also, people's comments, questions and concerns shift with time as more information becomes available. These and other factors influence people's input. Nevertheless, the large number of statements considered in the analysis, over 1,600, suggests the total results are approximately representative.

Table 4.1-1 Issues and Concerns from Community Engagement Events (%age of comments)

	2009, Valued Component Inquiry	2009, Survey on Main Interests	2009, Open House Comments	2010 Valued Component Inquiry	2010, Open House Comments	AREVA Blog	NIRB's Guideline Consultations	All Input
	n=564	n=157	n=175	n=875	n=356	n=26	n=299	n=2,452
Wildlife	36	21	9	27	10	27	26	25
Environment	30	12	13	25	12	15	17	21
Employment, training and business	9	35	26	13	19	19	7	15
Uranium and project	nr	nr	26	nr	22	31	16	7
Public health	12	9	7	7	13	4	7	9
EIS process	3	0	10	0	16	4	16	6
Social	7	12	2	17	1	0	1	9
Infrastructure and services	2	11	2	7	4	0	7	5
Benefits	nr	na	5	4	4	0	3	3
Heritage	2	na	1	0	0	0	1	1
Total	100	100	100	100	100	100	100	100

Source: Derived from review of AREVA's records of the results of various engagement events and from NIRB 2010 Notes:

Table 4.1-1 Issues and Concerns from Community Engagement Events (%age of comments)

2009, Valued Component Inquiry	2009, Survey on Main Interests	2009, Open House Comments	2010 Valued Component Inquiry	2010, Open House Comments	AREVA Blog	NIRB's Guideline Consultations	All Input
n=564	n=157	n=175	n=875	n=356	n=26	n=299	n=2,452

N=number of comments

Volume 3 Engagement and IQ Report provides more detail on the engagement events that head the columns in the above table. The 2009 valued component inquiry is also described in more detail in Section 4.3 Valued Components, below.

Nr indicates that an attribute was not relevant to a particular engagement event. Na indicates that data are not available.

### Broadly, points to note are:

- Wildlife (caribou, fish and marine mammals primarily) and environment (air and water primarily) together accounted for 44% of input. The concerns derive largely from dependence on natural resources for livelihoods and cultural identity issues and reflect some apprehensions about uranium.
- There was stronger interest in employment and business opportunities initially, but input in these regards has decreased over time. The contents of comments suggest that as of late 2010 people had good information on constraints to local hiring, on the need for preparation for employment and on when jobs and business opportunities are likely to become available but still had questions regarding AREVA's hiring procedures and working conditions.
- The 'uranium and project' category for purposes of Table 4.1-2 includes primarily questions about the project and about uranium, rather than concerns. Most concerns about uranium were framed in terms of wildlife, environment and public health.
- The Nunavut Land Claim Agreement provides for significant empowerment of Inuit in decision making. However there is some lack of understanding of government processes to ensure participation in decision making, some distrust of both government and its associated institutions, and some skepticism regarding objectivity of information disclosed by both government and AREVA. This is reflected in the high percentage of input about the EA process.
- The 'social' category for purposes of Table 4.1-2 includes primarily concerns about potential effects of the Project on individual and community wellbeing. Overall, Project effects on wellbeing, infrastructure and services and heritage resources were of less concern to people, and there was little input on potential benefits, aside from employment, business and training.

Overall, input suggests that whereas there is still some lack of knowledge and some
uncertainty about uranium mining in Nunavut, people in Kivalliq are receptive to
continuing the EA process for the Project, provided they can be confident about
environmental performance, will see employment, training and business opportunities,
can be better informed and are able to participate in decision making.

## 4.1.2 Literature Review and Secondary Data Collection

The socio-economic baseline study used a number of secondary data sources, as described in the methodology section for the Nunavut study area. In addition, reports and papers prepared by government, academics and consultants, which look specifically at key issues as defined in the previous section, were reviewed. For example, there is some reporting available on the socio-economic effects of mining projects in Nunavut and NWT, on the effects of rotational work on families and communities, on the adaptability of people to climate change, and on the potential for cumulative effects of multiple resource extraction projects.

## 4.1.3 Primary Data Collection

The review of the literature and secondary data sources referenced above indicated significant data gaps, related largely to timeliness and completeness of available data. The most obvious example is the census data, which was collected in 2006. Not only are these data out of date for all communities, they were collected before the construction of Meadowbank was well underway. Thus changes in Baker Lake as a result of the large employment and business benefits resulting from Meadowbank are not reflected – changes of particular interest insofar as they would inform an assessment of impacts of a second large mining project.

Therefore this secondary information was supplemented with a primary data collection program. The data collection was done under the terms of a research license from the Nunavut Research Institute (see Attachment A).

Primary data collection enabled some qualitative updating of socio-economic conditions as well as a better understanding of conditions and trends than census data are able to convey. The data collection program was implemented over the period March 2009 to April 2010. The planning of the program took into account the following considerations specific to the local study area:

- Differential potential for impact: Baker Lake and Chesterfield Inlet have more potential to experience negative Project effects and therefore data needs are different for these two communities.
- Experience of Meadowbank: Given that Baker Lake and Chesterfield Inlet are both Kiggavik's and Meadowbank's closest, and most affected, communities, there was an good opportunity to capture lessons learned.

- Issues of confidentiality: Research methods were needed to assure both the Nunavut Research Institute and participating community members that confidentiality would be fully respected.
- Language: Segments of the local study area population are not comfortable in English.
   Research methods were needed to facilitate good communication of information between community participants and those non Inuktitut speaking members of the research team.
- Relationship between IQ and socio-economics: IQ and socio-economics are closely related and interdependent in the content that each focuses on. More importantly, people speak to both socio-economic and IQ in the course of their participation in data collection events, thus there is value in shared effort between IQ and socio-economic investigators. It is noted in this regard that engagement results also provide information of value to a socio-economic baseline.
- Heterogeneity within and between communities: Each of the seven communities in Kivalliq has its distinct history, experiences and characteristics. In addition, there are differences in needs and views between people, including between genders, generations, people with different livelihood strategies and people with different life experiences.

Accordingly, primary data were collected using a mix of methods, to achieve efficiencies while allowing for triangulation<sup>18</sup> of data. Data collection methods were designed to be participatory and inclusive. Methods included informant interviews, focus group discussions and a household survey in Baker Lake. In addition, results of IQ interviews and engagement events were reviewed for data of value to understanding community baseline conditions.

Data collection was not always to the same level of detail, content or completeness for each community. Propensity to experience impacts, community perceptions of issues, community interest in participation and logistics were all factors affecting the distribution of interviews and focus group discussions in different communities. The table below shows what primary data collection events were done in which communities.

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<sup>&</sup>lt;sup>18</sup> Triangulation refers to the integration of two or more research methodologies. Typically, quantitative data from questionnaires is combined with qualitative data from focus group discussions, key informant interviews and observation. Triangulation puts the data into perspective and gives an added measure of validity to the study.

Table 4.1-2 Data Collection Events by Community

	Arviat	Baker Lake	Chesterfiel d Inlet	Coral Harbou r	Ranki n Inlet	Repuls e Bay	Whal e Cove	Tota I
Interviews								
Elders (IQ interviews)		18	11					29
Health and social services	3	1	1	1	3		2	11
Education	2	1	1	1	3		1	9
Hamlet government	2		1					3
Police	1	1	1		1		1	5
SAOs/ EDOs	1	1	1		1	1	2	7
Other	2	1	1		3	1		8
Focus groups								
Rotational workers		1						1
Women		2	1		1			4
Young adults		1	1	1	1	1	1	6
HTOs	1	1		1	1	1		5
Elders	1	1	1	1	1	1	1	7
Total interviews	11	23	17	2	11	2	6	72
Total focus groups	2	6	3	3	4	3	2	23
Household survey (Baker Lake)		89						89

It is noted that the above table does not include a number of other sources of primary data used to construct the socio-economic baseline. Follow up meetings to confirm results of data collection and telephone interviews were also done. AREVA has carried out consultations in all Kivalliq communities and the results provided some interesting insights. As well, AREVA has had ongoing meetings with co management organizations, regional associations, private sector companies and community government representatives that have generated additional information for purposes of this baseline.

#### 4.1.3.1 Informant interviews

Informant interviews were done across Kivalliq communities. Informants are people with specific sector and/or geographic expertise. Most informants were representatives of government and people employed in delivery of government services, however informants included religious leaders, representatives of the private sector, artists and others.

Informant interviews try to encourage people to talk about what they know, including probing to discover where an informant may be particularly well informed in an unexpected area. The results not only complement, from a different perspective, the data generated by other data collection methods, but also provide information, including quantitative data, on community attributes that cannot be provided by other methods (for example, school enrolment levels, health service priorities, public security, institutional capacity and local development plans).

### 4.1.3.2 Focus Group Discussions

Focus group discussions bring people of common experience together to discuss specific topics. Focus groups, usually of six to eight participants, were primarily directed towards people who may not be as well represented to a mining project proponent as others. Women and youth would be examples of people who may experience Kiggavik differently than potential employees or suppliers, but are not always full participants in formal engagement events. Focus groups also are directed at groups of people with specialized knowledge, for example hunters and elders. In addition, the experiences of rotational workers and their families were considered of particular interest.

Focus groups provide qualitative data, from people describing their knowledge, histories, and expectations in response to directed discussion topics, or spontaneously. Semi quantitative data can come from discussion and consensus on the part of focus group participants on 'normal' values, or ranges of values, that pertain to 'most' people. This can be a fairly efficient means to collect details on, for example, traditional activity, employment experiences and intergenerational relations. Focus group results are particularly helpful in understanding socio-economic dynamics and trends. Focus group practitioners used guides in order to facilitate discussions, however it is not always possible or indeed useful, to direct the discussion overly.

Focus groups were organized with the assistance of a representative in each community, who helped identify participants and provided logistical support for the discussion, including translation services where this was preferred. Topics covered included access to services and housing, health, women's roles, dependency on country foods, barriers to employment, harvesting patterns and intra family relationships.

### 4.1.3.3 Household Survey

Baker Lake, as the closest community to Meadowbank, has seen changes in employment levels and business activity in association with first construction and now operations of the Meadowbank Project. Although still early in the process of adaptation to Meadowbank, Baker Lake thus offers an opportunity to investigate some socio-economic changes that might be attributed to that project.

Informant interviews and focus group discussion results provide some qualitative information on the experience of Meadowbank in Baker Lake. However, given the concerns about the relationships between formal sector employment and traditional activity, AREVA undertook a household survey to get some quantitative data in two specific areas: i) consumption of country foods; and ii) hunting and fishing patterns and associated values.

Two previous studies provided benchmarks against which current practices could be compared. The Centre for Indigenous People's Nutrition and Environment (Kuhnlein et al, 2000), at McGill University, collected data on diets over the period 1998/99. The Nunavut Wildlife Management Board (NWMB) collected data on harvesting over the period 1996/2001 and published the results in 2004. Both studies experienced methodological issues but overall can be considered to have established approximate baselines from about ten years ago.

Using snowball sampling, <sup>19</sup> six locally recruited enumerators interviewed 189 representatives of 89 households in Baker Lake, representing about 23% of the adult population about 20% of households. Questionnaire respondents were either heads of household, or other adults over 18 years of age and able to provide the required information. Explanations of the household survey and the use the results would be put to were provided. Respondents were also assured that participation in the survey was voluntary and that results at the household level would be kept confidential. There was a single instance of a refusal to participate.

The enumerators used a questionnaire (modeled on the questionnaires used in the two studies). The two previous studies had much broader objectives than the AREVA survey, which used a questionnaire that replicated to the extent practical only some of the questions in each. The scope of

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<sup>19</sup> Snowball sampling depends on interviewed households identifying other households to interview. Various sampling techniques have both advantages and disadvantages. Snowball sampling may be less representative than random sampling for example, however this disadvantage is somewhat mitigated by increasing the sample size, in this case to 20%.

the AREVA survey was thus much more limited – for example each of the two previous studies investigated more topics, covered all of Nunavut, and included multiyear data collection. The intent was not to update the two previous studies, but only to update certain selected results of those studies. The AREVA questionnaire (see Attachment B) thus focused on:

- the frequency of eating country food
- country food preferences
- values associated with country food and harvesting
- opportunities for buying country food
- harvest levels of commonly harvested species
- constraints to hunting and fishing
- sharing of harvests
- passing on of traditional skills to children
- employment status.

# 4.1.4 Integration of IQ and Engagement Results

Socio-economic work is inherently consultative. Socio-economic and IQ primary data collection in Kivalliq was done solely through contact with people, and the population of Kivalliq is over 90% Inuit. Although socio-economic data collection, IQ data collection and engagement are conceptually different and have different objectives, each engages affected people and all result in the expression of views about issues, descriptions of lives lived and experiences of, in this case, Meadowbank and its effects.

In addition, AREVA's website, Project office in Baker Lake, frequent senior staff presence across Nunavut and Kivalliq and wide dissemination of the coordinates of staff responsible for the Project have provided multiple avenues for proactive contact by Inuit, government and stakeholders with concerns, comments and questions.

Accordingly, in addition to the socio-economic data, both IQ and engagement results were reviewed for comments of relevance to the socio-economic baseline. The results of IQ data collection and of the various forms of engagement have influenced the socio-economic baseline by:

- guiding the development and then refinement of primary data collection program for the baseline – for example the clear concerns about potential effects on traditional land and resources motivated a data collection event to capture changes in this regard in Baker Lake over the last decade
- providing a context for the interpretation secondary data
- providing much of the content of the baseline

There are two additional points to make with regard to the socio-economics, IQ and consultation. The first is related to language. Whereas most in the younger generations were very able to talk about the land and its resources, and Inuit values and characteristics, there were important data to be collected from unilingual Inuktitut speakers. Therefore, care was taken during socio-economic and IQ data collection events to ensure that people were able to speak in Inuktitut where this was their choice, either directly to Inuit data collectors or through translators. Translators were also available at all formal engagement events. Nevertheless, there are vocabulary and other translations issues that can lead to misunderstandings.

The second point is that people, including Inuit, vary widely in their perspectives. Differences in practices, knowledge and values between individuals, generations, genders and communities not only occur, they can be quite large. Although most socio-economic data are presented as average or median values for, usually, communities, regions and Nunavut as a whole, it is the combination of socio-economic, IQ and engagement results that allow diversity to be captured.

# 4.1.5 Data Entry and Analysis

Socio-economic primary data were collected by a team of three qualified social scientists, working with assistants and translators in each community and with enumerators recruited in Baker Lake to deliver the household survey questionnaires.

Informants and focus group participants were advised that there was no obligation to participate and no obligation to speak to any particular subject. They were also advised that they were free to leave at any time and that neither their names nor any direct quotes would be reproduced in public EIS documents. No tape recordings were made. Confidentiality agreements were signed by all focus group participants. Questionnaires were prefaced by a confidentiality agreement that was read to respondents by enumerators, and signed. All participants in primary data collection events were given a stipend and signed for receipt of the stipend.

Hand written notes were taken during interviews and focus groups. These were summarized as an electronic record. This summary is attached as Attachment C. Where maps were drawn during focus groups the data were entered onto digital maps. (These maps were reviewed by communities after their preparation and will be included in the IQ report that will be submitted as part of the draft EIS.) Questionnaires were filled in by enumerators by hand at the time of delivery to each household. Questionnaire data were subsequently entered into electronic spreadsheets. Data collected through the household survey are summarized in Section 4.2.8.3 of this report.

Handwritten notes, maps, confidentiality agreements, original questionnaires and stipend receipt sheets are held by Golder Associates Ltd. in Calgary.

# 4.1.5.1 Quality Control

Primary data collection quality control procedures included:

- preparation for focus groups, in discussion with local assistants, to establish translation requirements, representative participation in groups and appropriateness of subjects for discussion
- presence of at least two focus group facilitators at each discussion, in addition to assistants, to cross check understanding of discussion results
- training of enumerators to ensure that they adequately understood the Project, the objectives of data collection and the methods to be used to collect the data from households
- piloting of questionnaires, and subsequent adjustment to questions where necessary
- nightly review of questionnaire results to ensure that data were being effectively collected
- community review of baseline reporting prior to submission of the EIS.

#### 4.1.5.2 Data Limitations

Kiggavik does not expect to move into its construction phase until 2017, and into its operations phase until 2021. This baseline makes best efforts to describe socio-economic conditions as they are in Kivalliq in 2010/2011 and comes to some conclusions about trends, as background to the assessment of potential Project effects. However, in a context of high population growth, rapid socio-economic change, government policy reviews and new programs in various states of implementation, and uncertainty of what developments there will be in the mining sector (arguably one of the biggest drivers of change in Nunavut) over the coming six years, baseline conditions will be quite different in 2017. This is considered to be the major limitation on this baseline insofar as it is the basis for an assessment of potential impacts of Kiggavik. It is noted in this regard that AREVA expects to undertake a new socio-economic baseline study before any construction begins.

There are some additional limitations to note, both for the secondary data and, despite quality control procedures, for the primary data:

- Community level data are extensively reported by Statistics Canada, but these data were collected in 2006. The Nunavut Bureau of Statistics has more recent data, in some cases for 2009 and 2010, but most of these are reported only at the level of the territory as a whole.
- There is significant population heterogeneity, both between communities and within communities. Representativeness of participants in focus group discussions was not necessarily always complete, given that groups were small. This is to some extent mitigated by the number of focus groups done in total, as well as by triangulating the results of informant interviews, IQ, consultation results and information made available to

- AREVA staff in the course of ongoing meetings with people, businesses, hamlet governments, HTOs and regional associations.
- Although questionnaire data are more quantitative, people answer questions in a context
  of their own understanding, knowledge and concerns. Also, some of the questions
  depended on recall of a variety of events that took place over time and/or on people's
  impressions of what average patterns of life are. Such recall and impressions cannot be
  precisely accurate. This is somewhat mitigated by the large sample size and by cleaning
  the data.
- Participants in interviews and focus group discussions were assured that they would not be quoted or otherwise identified in the public presentation of information provided. Interpretation of publicly available data depends on an understanding of the socioeconomic context. This in turn depends on an environment of confidence and trust between data collectors and participants such that people feel as free as possible to share their experiences and insights. Particularly in small communities, the ascribing of views to specific individuals and/or the publishing of data that is considered by at least some to be confidential is inappropriate.

The data, information and analysis of socio-economic conditions in the seven Kivalliq communities is nevertheless considered broadly reliable at the time of writing, particularly in aggregate and taking into consideration community review of its contents. However care is taken in the baseline that follows, and the impact assessment that necessarily uses this baseline, not to over interpret the data.

### 4.2 Results

### 4.2.1 Government

Communities are incorporated as hamlets, and elect both a mayor and council and representatives to HTOs. Hamlet governments have small staffs, responsible for the delivery of a range of municipal services, such as water supply, recreation programs, community planning and community infrastructure operation and maintenance. Aside from cost recovery for some of these services, hamlets are dependent on the GN for revenues.

HTOs have responsibilities for wildlife management and related tasks, such as participation in wildlife research projects and delivery of NTI programs for hunters. Capacity to meet responsibilities, on the part of both hamlet governments and HTOs, has in some instances has been constrained.

There is no regional government. However GN has within its organization directors responsible for delivering territorial programs and services at the regional level and NTI is represented at the regional level by the Kivalliq Inuit Association. As well, institutions of public government boards have members from each of the three regions.

# 4.2.2 Community Profiles

Each of Kivalliq's seven communities is unique, although they share -- in varying degrees -- many socio-economic characteristics. Subsequent sections discuss socio-economic conditions and provide community level data where this is possible. Community profiles are provided here to try to capture what clearly differentiates each community from the others.

#### 4.2.2.1 Arviat

Arviat (meaning place of the bowhead whale) is the second largest community in Kivalliq, and the most southern community in Nunavut. Historically, Inuit had congregated in Arviat to hunt marine mammals but in the 1950s inland people (nland Padlei) were settled there and learned to hunt marine mammals from seashore people. Elders report that even after settlement, families went out on the land for many months of the year, and would travel long distances to hunt and fish, until children started attending the residential school in Chesterfield Inlet, when people started to go out on the land less. Hunters say that most people no longer travel far.

Arviat had a population of 2,331 in 2010. Population has grown by 16.7% year since 2001 – fairly slowly by Kivalliq standards. The population however is one of the youngest among Kivalliq communities and is expected to grow at a faster rate than average, barring out migration, for the foreseeable future.

People in Arviat frequently refer to their strong history of support and desire for education. This is embedded in the Arviat Community Economic Development Plan, which sees a trained and educated workforce, responsive to current labour market needs, as a priority. Arviat has been proactive in working with Agnico Eagle, exploration companies and Nunavut Arctic College to implement training programs to prepare people for work in the mining sector. For example, the diamond driller's training program will begin in September 2011 and Meadowbank now employs more people from Arviat than from any other community except Baker Lake.

Unemployment and a shortage of housing are two of Arviat's preoccupations. The unemployment problem was referred to by almost all participants in interviews and focus groups discussions. Arviat has the lowest labour force participation rate in Kivalliq, which is attributed to the lack of opportunities discouraging people from looking for work rather than a lack of interest in working. The housing shortage (there were reportedly 600 names on the waiting list for social housing) has particularly negative consequences on public health -- there are too frequent outbreaks of methicillin resistant staphylococcus aureus infections.

Arviat has made some progress towards integrating the land based and wage based component of their economy, with incomes being generated from traditional activities. Pelts are sold to the Northern Store, Eskimo Point Lumber Supply and the Co-op. Kiluk Ltd. emphasizes design, employs

seamstresses to make hand crafted clothing and is looking to expand its product base. Artists sell carvings made of soapstone, caribou antler and ivory, as well as wall hangings and paintings. More than half of the people in Arviat produce arts and crafts products. There are also outfitters, primarily for hunting caribou.

Arviat's community economic development plan for the period 2008 to 2012 has five priorities: i) health, wellness, education and training; ii) infrastructure and transportation development; iii) small business and commercial development; iv) renewable and non renewable resource management; and v) the public sector. Infrastructure needs include a new hamlet office, bigger recreational facilities and an expanded community freezer to store country foods and support the expansion of fish processing.

#### 4.2.2.2 Baker Lake

Baker Lake (or Qamanittuaq, denoting its location at the mouth of the Thelon) is the Kivalliq community closest to the Kiggavik Project. It is the only inland community in Nunavut, and was established as a residential settlement at the time the government brought the Inuit into settlements – previously there had been only trading, missionary and police posts. Baker Lake was settled at this time by both inland and coastal Inuit.

In 2010 Baker Lake had a population of 1,950. The population had grown since 2001 by 22.5%. This is a growth rate than for Kivalliq Region as a whole, but annual figures do not suggest that this can be attributed to Meadowbank – Baker Lake's population did not grow as quickly over the period 2007 to 2010 as did most other communities.

Meadowbank is now in operation and there have been an increasing number of mineral exploration companies operating out of Baker Lake over the recent past, including AREVA. These activities have generated significant changes in the hamlet, particularly in employment, incomes, business activity and outlook of people. Recent changes in Baker Lake have included dramatically increased high school graduation rates (perhaps in part in response to expanded employment opportunities associated with mining activity); increased returns to businesses, particularly in hospitality, transport and expediting; and competition for qualified staff. The unemployment rate is believed to be very low, including by Canadian standards.

Baker Lake's community development plan outlines the community's multiple natural and cultural assets, including abundant nearby wildlife and fish; the Thelon and Kazan heritage rivers (both of which flow into Baker Lake); proximity to parks and reserves (Innujarvik Territorial Park, Ukkusiksalik National Park and the Thelon Wildlife Sanctuary); a longstanding and internationally renowned artistic tradition; and mineral resources. Tourism, arts and crafts and mining are therefore priority sectors for employment creation, to be supported through foundation investments in education and training, assistance to small businesses and economic infrastructure. Recognizing that economic

development rests on community wellness, the plan also identifies needs in the areas of community infrastructure and wellness.

### 4.2.2.3 Chesterfield Inlet

Chesterfield Inlet (or Igluligaardjuq, meaning place with a few houses) is the smallest and slowest growing community in Kivalliq, with a population of 386 in 2010 that had grown by 6.6% since 2001. Most of this figure for the decade is attributable to growth of 5.5% in 2010 alone – Chesterfield Inlet has had negative population growth in some years over the last decade.

Chesterfield Inlet is also one of the oldest communities in the eastern Canadian Arctic. In the mid 1800s to the early 1900s Chesterfield Inlet was regularly visited by whalers who overwintered nearby. Inuit hunted for the whalers and worked manning their boats. People from other parts came to Chesterfield Inlet, seeking work from whalers and opportunities to trade goods. Until the 1950s, the community was the major centre north of Churchill – a Roman Catholic mission and hospital were established in 1912. The hamlet was the Hudson Bay Company's main northern supply centre, the site of the largest RCMP barracks, and had the first residential school in Nunavut.

The community is considered by people who live there to be quiet and more traditional than others in Kivalliq. Arctic sports are popular – James Tautu of Chesterfield currently holds the 2010 Arctic Games gold medal for kneel jumping, a traditional Inuit sport where athletes start on their knees and then jump as far as they can to land on two feet. Many people make ulus and harpoon edges. Most people, including women, hunt and fish. Adult children are expected to support their extended families. Substance abuse, domestic violence and crime rates are also reported to be low (although this is difficult to confirm from available statistics).

Median incomes in Chesterfield are high, second only to those in Rankin Inlet. This might be unexpected in such a small community however Chesterfield Inlet has a proportionately large number of government employees, delivering the health, education and other services in this community as they elsewhere.

Chesterfield Inlet's community development plan prioritizes the development of infrastructure, including the extension of roads both to support of the mining sector (Shear Minerals is exploring nearby) and to make it easier for people to reach their cabins on the land. Other infrastructure priorities include the development of a community water treatment plant and extending the airport runway so that Chesterfield can be used as a transportation hub for the Kivalliq region. The plan also prioritizes; i) the provision of affordable housing; ii) education and training initiatives; iii) small business development; iv) strengthening manufacturing and processing capabilities of country foods; v) encouraging arts, crafts and tourism; and vi) augmenting social and health care services.

#### 4.2.2.4 Coral Harbour

Coral Harbour (or Sallit, meaning large flat islands) is on Southampton Island. Coral Harbour had a population in 2010 of 861, which had increased by 15.9% since 2001 – slower population growth than the regional average.

Coral Harbour is remote, and remains very dependent on harvesting for livelihoods. Although, as in the rest of Kivalliq, caribou is most commonly hunted, people in Coral Harbour harvest seal and arctic fox in numbers proportionately higher than seen in most other Kivalliq communities. Trapping is a more important source of income than elsewhere -- the number of arctic fox harvested was thought to be in the order of 1,500 to 2,000 per year by 2001, compared to harvests in the low hundreds in other communities. Snow goose and ptarmigan harvests are in the thousands and the bird hunt is reported to be more popular than fishing, but fish are also taken in the thousands. Polar bear and walrus are also important. The abundant wildlife on the island also provide tourism opportunities although the polar bear hunt has suffered as a result of the ban on polar bear trophies in the United States.

Traditional arts and crafts are also produced. Coral Harbour is renowned for its carvers of soapstone and limestone. Artist, Lizzie Angootealuk was one of four Inuit artists invited to exhibit her Inuit dolls at the Scott Polar Research Institute Museum in Cambridge, UK. International exposure of traditional Inuit arts is a priority for economic development planning in Coral Harbour.

Income statistics for Coral Harbour indicate that this community, and Repulse Bay, are worse off than elsewhere in Kivalliq, however this is mitigated to some extent by the high levels of harvest.

#### 4.2.2.5 Rankin Inlet

Rankin Inlet (or Kangiqliniq, meaning deep inlet) is the largest community in Kivalliq and the regional hub. The population was 2,704 in 2010, and had grown by 18.3% since 2001. Most of this growth has occurred since 2006. As a regional centre, Rankin Inlet has probably seen the most population effects of the mining interests across Kivalliq.

Rankin Inlet was in fact originally established as a mining town. The North Rankin Nickel Mine operated from 1957 to 1962. The mine built the first housing in Rankin Inlet, for workers from elsewhere in Nunavut. In the 1970s the Government of the Northwest Territories moved its administrative offices from Churchill to Rankin Inlet. Rankin Inlet thus developed somewhat differently from other Kivalliq communities. A number of private businesses emerged and Rankin Inlet became the administrative, transportation and medical services center for Kivalliq. It has Nunavut's first birthing centre and a new medical facility which serves as the regional hospital.

Rankin Inlet has Kivalliq's largest non aboriginal population, at 16% of the total, and people are more likely to speak English. Incomes here are higher than elsewhere in Kivalliq, and most socio-economic indicators are better – crime rates have been a notable exception. Land based activity is not as prevalent as in other Kivalliq communities – there are fewer hunters on a per capita basis and harvests are proportionately smaller. Some people report feeling that the 'south is moving in too fast', that there is less of a community feel as the population grows and that Inuit identity is being challenged.

The community also has more recreational facilities than often found elsewhere, not only a hockey rink, but also a fitness center, curling arena, baseball diamond, outdoor beach volleyball court, soccer field, swimming pool and a nine hole golf course. Rankin Inlet is also home to the Kivalliq Inuit Association, has two Nunavut Arctic College campuses with the recent opening of the trades training school in 2010, and a number of business associations and organizations.

Population growth is driving town infrastructure needs. Economic development priorities include supporting the development of the mining sector and supporting arts and crafts.

# 4.2.2.6 Repulse Bay

Repulse Bay (or Naujaat, meaning seagull nesting place) is the most northern of the Kivalliq communities. It is named after a cliff five kilometers north of the community, where seagulls migrating from the south each year make their nests. In 2010 the population was 855, 33.6% higher than in 2001. Repulse Bay is by far the fastest growing community in Kivalliq.

Elders say that Repulse Bay was not really established as a community until the school opened in 1968. Housing was brought in at that time. Others say that people were attracted to the whalers coming down from Southampton Island looking for safe harbour. The area is full of interesting history of which people are proud. John Rae had a house here, two whalers are buried on Harbour Island and there are inscriptions on stone. Michael Arvaarluk Kusugak, winner of the Vickey Metcalf Award for Children's Literature in 2008 and noted author is originally from Repulse Bay.

Repulse Bay is, like Coral Harbour, remote from the rest of Kivalliq and shares many of the same characteristics with regard to the dependence of harvesting and low incomes. Repulse Bay hunting, fishing and plant gathering rates in 2006 were the highest in Kivalliq although trapping rates were slightly lower than Coral Harbour in that year. There is thus high dependence not only on caribou, but also narwhal (whose tusks are sold), beluga and fur bearing mammals including arctic fox, wolf and wolverine.

People generally say they are reluctant to move elsewhere. Most people in Repulse Bay were born there and have stayed, contributing in some respect to high population growth. Rapid population

growth has in turn contributed to overcrowding, and needs for infrastructure – in 2010 a new community centre was opened and a new health centre was under construction.

People in focus groups said that they consider their culture and in particular, their diet, to be very different from that in Baker Lake and that this would stop them from moving there. This is corroborated by the 2006 Canadian census that found that the majority (85%) of people living in Repulse Bay were born there and have remained in the community.

#### 4.2.2.7 Whale Cove

Whale Cove (or Tikirarjuaq, meaning long point) had a population of 392 in 2010, an increase of 22.5% over 2001.

Whale Cove is often described as relatively traditional. However some people say that the lack of employment opportunities in the community, and therefore lack of cash, is resulting in a decrease in hunting because families cannot afford expensive gear. At the same time, the hamlet notes that they are challenged to fill openings in hamlet operations. Although there is small fish processing facility, commercial fishing is not generally practiced – people say this is because fishing does not earn them much.

The five year Whale Cove Community Economic Development Plan (2008 to 2012) emphasizes equitable and participatory community development processes. Sectors of importance for development in Whale Cove are: i) community health and wellness; ii) education and training; iii) infrastructure and transportation; iv) arts and crafts; v) small business development; vi) establishing an enabling environment for the exploitation of renewable and non-renewable resources; and vii) reinforcing the capacity of the public sector.

# 4.2.3 Economy

### 4.2.3.1 Economic Development Policy

GN drives economic development policy in Nunavut. Kivalliq does however have an approved land use plan that is intended to provide a framework within which development is to take place (NPC, 2000). The plan recognizes that most of the Kivalliq private sector economy is, and will continue to be, based on use of land and natural resources and that the greatest economic development potential will likely be in the mining sector. It therefore sets out conditions for mining projects – broadly that there should be no significant environmental effects and that benefit of mining should accrue to Kivalliq communities as well as to Canada.

The plan indicates that a balance between the potentially incompatible land uses of mining and tourism is desirable to achieve economic development. The emphasis is on combining community participation, environmental protection, economic wellbeing (including opportunities to earn wage income) and maintenance of the integrity of traditional culture in land use implications of specific development proposals. The land use plan for Kivalliq also emphasizes the desire of people to develop employment opportunities for youth.

There are also economic development plans prepared at the community level and all communities have economic development officers. The plans set out community priorities for economic, social and cultural development, as input into GN allocation of resources, including capital expenditures. The development of the plans is intended to be highly participatory, to ensure that community priorities are broadly reflective of different groups of interests within a community. The planning process is also intended to motivate reflection about community strengths and weaknesses, and encourage self reliance, partnerships and learning. As noted in Section 4.2.3 many of these plans have common elements – the recognition that health and community wellbeing are integral to successful economic development, that mining and arts and crafts are priority sectors, and the education, training and infrastructure development are prerequisites to achieve goals.

# 4.2.3.2 Mining

Mining development is expected be the largest economic driver in Kivalliq in the coming years. Uranium deposits in western Kivalliq and the greenstone belt (gold and base metals) in central Kivalliq are thought to contain resources comparable to those of the largest mining regions in southern Canada. Mining will very likely provide more employment and business opportunities than any other foreseeable economic activity over the near to medium term. The mining sector also generally funds its own training and infrastructure needs, implying less dependence on territorial resources to enable development. Mining job experience, training and some infrastructure are also of potential value to other economic activity. IIBA's associated with large mining projects generate funds for community development priorities.

Kivalliq has the only operating mine (Meadowbank) in Nunavut as at mid 2011, although a small gold mine in Kitikmeot is under construction (Hope Bay). Kivalliq is also home to two of the three mining projects under active environmental review (Kiggavik and Meliadine – the third project is Mary River in Qikiqtaaluk). Of Nunavut's 85 exploration projects listed in Table 3.2-9, almost 40% (33 projects) are in Kivalliq Region. There is at least one project near each of the seven communities, but two thirds (21 projects) have Baker Lake as the closest community. Twelve of the 33 projects, a third, are uranium exploration projects, all located west and south of Baker Lake. Gold and diamonds account for another 14 exploration projects.

Although mining's potential has barely started to be realized, the evidence is that many of the expected benefits can be achieved, in comparably short time frames. The development and now

operation of Meadowbank has employed more than the forecast number of Inuit. Meadowbank has motivated the development of a number of joint ventures between Inuit and southern firms, enabling Inuit businesses to participate in the project, expand, hire and gain important experience in the mining sector. There is also anecdotal evidence that the opportunities offered by Meadowbank, and expected other mining projects, has increased incomes, decreased unemployment rates and motivated improved educational achievement in Kivalliq, most dramatically in Baker Lake.

### 4.2.3.3 Tourism

Tourism is also a priority sector for development, although progress has been somewhat slower than in the mining sector. Kivalliq is home to the Kazan and Thelon watersheds, two of the longest undisturbed river systems in the Arctic. The unspoiled wilderness character as well as the wildlife and archaeological sites along the Thelon and Kazan Rivers are attractions to outdoor enthusiasts. Most canoeists organize trips through wilderness outfitters and tour operators, most based outside Nunavut – in Whitehorse, Fort Smith, Winnipeg and La Ronge. A recent study investigating the level of canoeing on the Kazan and Thelon rivers indicates low but constant use (GeoVector, 2008). However, the study also notes that canoeists bring little in the way of economic benefits to Kivalliq (or other Arctic) communities, other than a short hotel stay at the end of a trip.

Sport hunting is also important. Polar bears, musk oxen, wolves, caribou and wolverines are all sought after animals in the commercial sport hunting sector. Local outfitters have led hunting and fishing expeditions and there are a number of independent hunters who have guided trips.

Outfitting and guiding hunters is thought to be a more promising activity than outfitting and guiding canoeing, involving more individuals from communities and generating larger financial returns. Dowsley (2010) reported, based on research done in the early 2000s that an outfitted sport hunt for polar bear brought in an average of \$19,000 to Inuit outfitters. However, recent restrictions on polar bear tags in combination with the ban on the import of polar bear trophies in the US are said to have had a negative effect on outfitting businesses, particularly in Arviat and Coral Harbour.

In the past, guiding could be arranged comparatively informally – customers could contact an HTO to make arrangements and the HTO would identify someone who had the appropriate training and experience, including safety training. However, new requirements for insurance, high startup costs and the need to market in order to expand have become barriers to expansion of independent outfitting and guiding by Inuit, and have resulted in some loss of interest. Some HTOs members report that there is little incentive to invest the necessary significant sums in face of market uncertainties.

Cruise ships and adventure tourists visit Nunavut and there is some expectation of increasing interest in light of climate changes and potential effects on wildlife. Most interest has been in the high Arctic and numbers of visitors remain small – a big increase in tourism in Kivalliq will require a

concerted effort to invest in tourist infrastructure and services (including opportunities to experience traditional culture), to further develop the arts and crafts sector and to promote Kivalliq's attractions. In a fiscal environment of many other economic and social demands on government resources, strong public and private sector partnerships will be needed to advance.

#### 4.2.3.4 Business

Until recently, there has been limited business development in Kivalliq. All communities share the same problems with regard to business – small markets in Nunavut, long distances to other markets and shortages of investment funds and skilled human resources. Most businesses have been small, catering to consumption needs in Nunavut. Commercial harvesting and fishing activity, with some exceptions, is focused in Kitikmeot and Qikiqtaaluk although Kivalliq Arctic Foods buys caribou and fish from communities for processing for export markets.

The Nunavut Development Corporation (NDC) was established at the time of the NLCA, with a mandate to develop Nunavut business in order to create income opportunities for Nunavummiut. NDC has focused on developing external markets for country food, clothing and arts and crafts. In Kivalliq, Kivalliq Arctic Foods, Ivalu Ltd (both in Rankin Inlet), Whale Cove Fisheries, Jessie Oonark Ltd. (Baker Lake) and Kiluk Designs (Arviat) produce a range of goods for export and for sale to visitors to these communities. This has created some employment – calculated at about 25 full time equivalent jobs in 2010. However sales remain small, totalling less than \$1.5 million in 2010 (about half of which was made by Kivalliq Arctic Foods), and financial viability of these companies has not yet been achieved. Each still required subsidies from NDC to operate, and some, despite subsidies, lost money (NDC, 2010).

Sakku Investment Corporation, in Rankin Inlet, is the business and economic development arm of the KIA. It is an Inuit birthright for Profit Corporation, owned in trust by the Inuit of the Kivalliq Region. Sakku is preferentially contracted by GN, in the interests of increased Inuit content in government operations. Sakku owns two companies (real estate in Rankin Inlet, and drugs and medical product supply) and is part owner of a third, M and T Enterprises (freight handling, hauling, storage and construction). Sakku also partners, with other companies in Nunavut and often with southern companies supplying the construction and mining industries. Sakku sees increasing opportunities in the areas of expediting, camp operation, drilling, fuel supply, environmental monitoring, training and air transportation, largely expected in relation to mining. Partners include other regional birthright corporations, Dyno Noble, Helicopter Transport Services, Toromont, Stantec and the Royal Bank.

NTI qualifies businesses for preferential contracting (on the basis of their Inuit control or majority ownership) by government and private sector project proponents (see Table 4.2-1). Over half of the 70 Kivalliq NTI registered businesses are in Rankin Inlet.

Table 4.2-1 NTI Listed Businesses in Kivalliq

Arviat	Rankin Inlet
Arviat Inuit Enterprises	Adjuk Healthcare
Larry & Sons Construction	Aglu Consulting & Training
Northern Networks Ltd.	Arctic Expression
Panainaaq Construction Ltd.	Curley Construction
Qitik Inc.	Ed's Electrical Services Ltd
Illnik Electric	Electrix Ltd.
Igloo Nunavut o/b 5226 Nunavut Ltd.	Ikajuqtigiit Ltd.
Arviat Inuit Enterprises	Ilagiiktut Ltd.
DAPA Enterprises Inc.	Inukshuk Construction Ltd.
Eskimo Point Lumber/Airport Services Ltd.	Kakivak Construction Ltd.
Henik Lake Adventures Ltd.	Kanaknaq Investments Ltd.
Arctic Traders operated by Qitik Inc.	Kangiqliniq Development Limited
Baker Lake	Kissarvik Co-operative Ltd.
Peter's Expediting Ltd.	Kivallingmiut Aviation Inc.
Power House Electric	Kivalliq Expediting & Storage Inc.
Tangmaarvik Inland Camp Services Inc.	Kivalliq Services Ltd
Nunamiut Lodge	M & T Enterprises Ltd.
Nunamiut Company Ltd.	Nahanni Nunavut Construction Ltd.
Baker Lake Contracting & Supplies Ltd.	Nanuk Enterprises Ltd
BLCS Development Limited	Northern Allied Travel Inc.
Kanguujaq Ltd	Nunami Helicopter Transport Corporation
5235 Nunavut Ltd	Nunavut Insurance Brokers Ltd.
Chesterfield Inlet	Oomilik Enterprises Ltd.
Pimakslirvik Corporation	Piruqsaijit Ltd.
Chesterfield Inlet Holding Corporation	Qagvik Enterprises Ltd.
Aulajuq Limited	Qamanittuaq Developments Corporation Ltd.
Coral Harbour	Qunngaataq & Associates
Tuniq Lumber & Supply	Sakku Drugs Ltd.
Sudliq Developments Ltd.	Sakku First Aviation Ltd

Table 4.2-1 NTI Listed Businesses in Kivalliq

R&A Vehicle Rentals	Sakku Investment Corporation
Leonie's Place Ltd.	Sam's General Contracting
Kivalliq Electrical Services	Sarliaq Holdings Ltd.
Whale Cove	Siniktarvik Hotel & Conference Center
Issatik Co-operative Ltd.	Steve Sayles Contracting
	Toromont Arctic Ltd Rankin Inlet
	Turaarvik Inns North
	Umingmak Supply (2007) Ltd.

Source: NTI, 2011

Note: No businesses in Repulse Bay were listed.

Meadowbank has created an important opportunity for expansion of NTI registered businesses in Kivalliq. Agnico Eagle has expended over \$300 million to NTI registered companies from the beginning of construction in 2007 until mid 2011, about 20% of total expenditures. Recent figures for 2011 alone see the percentage of expenditures to NTI registered companies approaching 30%, over 90% of this to companies in Kivalliq Region, primarily in Rankin Inlet and Baker Lake (AEM, 2011).

In addition, there are non Inuit owned businesses operating in Kivalliq, including airline, bank, and media branch offices, as well many small retail and service businesses catering to consumption needs of people in each of the Kivalliq communities.

Kivalliq's regional Chamber of Commerce represents more than 80 companies and sole proprietors, from all Kivalliq communities. The Chamber also works to support projects that would provide important boosts to business in Kivalliq, including the proposed road between Rankin Inlet and Northern Manitoba, and hydro developments which would tie in to the Manitoba power grid.

### 4.2.3.5 Land Based Economic Activity

Activity on the land provides food and other subsistence resources, maintains Inuit culture and generates cash income (through for example, sale of natural and arts and crafts products). The land based sector of the economy is described in the Keewatin Regional Land Use Plan as being ". . . generally based on non monetary exchange, private ownership of modes of production . . . and transactions which provide for subsistence and do not increase profits or accumulate capital for its own sake" (NPC 2000).

Although six of Kivalliq's seven communities are located on the shores of Hudson Bay and people hunt marine mammals and fish, there is a high dependence for livelihoods across the region on land resources as well, particularly caribou, the primary staple food in Kivalliq.

In Kivalliq, caribou are taken largely from the Qamanirjuaq herd although hunters from Baker Lake also hunt the Beverly herd (Intergroup, 2008). BQCMB's baseline for herd sizes dates from 1994, when the populations of the Qamanirjuaq and Beverly herds were 496,000 and 276,000 respectively (BQCMB 2011). There is some uncertainty as to what current numbers are but surveys are underway.

Musk oxen are a valued resource, particularly in Baker Lake. Seal are harvested widely, and walrus is harvested in more northern parts of the Kivalliq. In Arviat and Whale Cove, hunters have traditionally harvested beluga. HTOs report that although numbers of beluga are thought to be very high, quotas may be introduced because there are also an increasing numbers of hunters.

Traditional knowledge studies have been done to establish geographic ranges of current (and previous) harvesting. Indications from Baker Lake suggest that the immediate area of the Kiggavik mine site is not a frequently used harvesting area although fishing has been important in the larger lakes around the mine site in the past. Occasional hunting and trapping do occur – caribou migrate nearby. The high cost of hunting at far distances and the absence of easy access minimize current use of the mine site area.

There is also use of both waters and lands along the Project's marine transportation route. People depend on caribou and seals harvested in these areas, and they also gather eggs along the shoreline.

Detailed community level information regarding participation in harvesting is available from the Nunavut Wildlife Harvest Survey (NWMB 2004). Conducted between 1996 and 2001, this survey remains the most recent and comprehensive study of subsistence harvesting throughout Nunavut (including hunting, trapping, and fishing of mammals, birds and fish, but not including plant gathering or commercial harvesting).

For the purposes of the survey, a hunter was defined as someone who was an NLCA beneficiary, who was 16 years of age or older at the time of the survey, and who participated in hunting, fishing, or trapping of animals at any time during the year. Hunters were classified either as intensive, active or occasional<sup>20</sup> hunters. Table 4.2-2 summarizes the number of hunters registered in the study by community and year. In most communities, most hunters were occasional and very few (as a proportion of the Inuit population) were intensive. Baker Lake, Rankin Inlet and Arviat, the three largest and more economically diversified communities, have the highest percentages of occasional hunters, while the smaller communities have high proportions of active hunters in addition to occasional ones. Coral Harbour is the exception, with an equal number of occasional and active hunters.

Table 4.2-2 Registered Hunters by Community and Year

	1	996/97		1	997/98		1	998/99		1	999/00		2000/01		
	0	Α	ı	0	Α	I	0	Α	ı	0	Α	I	0	Α	ı
Arviat	309	64	6	309	65	6	312	69	6	315	74	6	312	74	7
Baker Lake	264	62	1	263	60	1	252	62	2	240	60	2	234	63	2
Chesterfield Inlet	40	21	11	45	23	11	46	23	11	43	24	10	47	29	9
Coral Harbour	113	110	33	112	111	31	124	110	32	105	108	31	94	104	28
Rankin Inlet	238	86	55	240	80	52	235	80	52	228	82	54	226	83	53
Repulse Bay	108	55	6	105	52	6	103	48	6	103	43	6	96	44	6
Whale Cove	32	16	2	32	16	2	31	16	0	32	18	0	30	18	1
Total	1,104	414	114	1,106	407	109	1,103	408	109	1,066	409	109	1,039	415	106

An intensive hunter is one who repeatedly and regularly engages in all or nearly all of the various types of hunting activities during the annual cycle, and who always has country food in the household; an active hunter is one who regularly engages in some of the major harvesting activities during the annual cycle (e.g. ice-edge seal hunting, char fishing, or caribou hunting)., participation in the activity may be short but intense and time commitment is more than day-trips or an occasional weekend; an occasional hunter is one who occasionally, but not regularly, participates in hunting activities (e.g. a day or two of caribou hunting or waterfowl hunting, or rod-and-reel fishing every now and then), and participation is usually short-term, such as day-trips or weekend outings (NWMB 2004).

Table 4.2-2 Registered Hunters by Community and Year

	1996/97			1997/98		1998/99			1999/00			2000/01			
	0	Α	ı	O A I			0	Α	ı	0	Α	ı	0	Α	-
Percent	67.6	25.4	7.0	68.2 25.1 6.7 68.1 25.2 6.7 67.3 25.8 6.9 66.6 26.6								6.8			
Source: NWN	Source: NWMB 2004 Note: O=occasional, A=active and I=intensive hunters														

Overall, the numbers show some stability over the period 1996 to 2001. However, Statistics Canada data for 2001 and 2006 (see Table 4.2-3) suggest substantial increases in the numbers of people harvesting in at least five of Kivalliq's communities (Statscan, 2002b, 2007b). In each of Arviat, Baker Lake, Coral Harbour, Rankin Inlet and Repulse Bay, more people reported each of hunting, fishing, gathering and trapping in 2006 than in 2001. (This is despite the data suggesting that for Nunavut overall, there was had been a slight decrease in harvesting.)

Table 4.2-3 Traditional Activity, 2001 and 2006 (% age of the 15 years and over population)

	Ar۱	/iat		ker ike		terfiel nlet		oral bour		nkin let		ulse ay	Wh Co	ale	Nun	avut
	200 6	200 1	200 6	200 1	2006	2001	200 6	200 1	200 6	200 1	200 6	200 1	200 6	200 1	200 6	200 1
Hunted	81	64	68	53	n/a	63	71	65	67	45	82	72	n/a	59	72	58
Fished	80	70	77	62	n/a	79	81	73	71	66	85	78	n/a	71	76	67
Gathere d wild plants	86	57	87	55	n/a	79	76	43	81	49	78	75	n/a	47	79	51
Trapped	42	15	44	8	n/a	n/a	53	16	n/a	n/a	46	25	n/a	n/a	30	9

Source: Statscan, 2002b and 2007b

Note: Data are not available for Kivalliq Region, nor for smaller communities (Chesterfield Inlet and Whale Cove) in 2006.

As noted in Section 3.2.2.3, estimates of the value of harvesting are incomplete. In order to get an order of magnitude estimate of the contribution of harvesting to household food security in Kivalliq communities, data were used from different sources and years to derive the values in the Table 4.2-4. The table provides estimates of the value of harvests of the five most harvested species, and in the last column expresses these as a percentage of funds required to purchase what Indian and Northern Affairs Canada considers to be an adequate diet in individual communities in Kivalliq. Parameters used were:

- Annual average harvests, 1996/1997 to 2000/2001 (NWMB, 2004)
- Estimated edible weights (Ashley, 2002)
- Community populations in 2001, one of the years for which we have harvest data (Statscan, 2002a)
- Net value per kg of edible harvests, that is value minus harvesting costs (Intergroup, 2008)
- Grocery costs for a family of four in 2010 (INAC, 2010a).

**Table 4.2-4** Market Value per Person of Selected Harvests (\$)

	Caribou	Ring Seal	Char/Trout	Beluga	Total	% of Total				
Arviat	1,974	73	184	1,231	3,462	64				
Baker Lake	1,852	0	181	0	2,033	36				
Chesterfield Inlet	2,136	95	473	561	3,265	58				
Coral Harbour	2,323	301	563	1,422	4,609	80				
Rankin Inlet	531	27	94	590	1,242	23				
Repulse Bay	1,369	243	525	426	2,563	46				
Whale Cove	1,982	51	515	1,483	4,032	76				
Source: Derived from data as listed in bullets above.										

It is emphasized that the table is indicative only. Numbers would fall if average harvesting levels per person in 1996 to 2001 have declined significantly since that time for example, or if the 2008 net value per kg at \$25 is too high.<sup>21</sup> In general however, the results are probably conservative - only five species are included whereas, for example, Coral Harbour's harvests of many thousands of geese and eggs in 1996 to 2001, Repulse Bay's significant harvests of walrus and narwhal, and Arviat's cod harvests are not included in the derivations.

Irrespective, the numbers in the last column in the table are very high. With the exception of Rankin Inlet and Baker Lake, and taking into account that more minor harvests are not included,

<sup>21</sup> Intergroup set this value for caribou based on the prices of high and low grade meat in selected communities. This price is used for all

species in the table. Although some fish may be priced lower, prices have also risen since 2008.

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communities harvesting levels are sufficient to substitute for about half or more of what total food costs would be if all food was store bought. Baker Lake may in fact not be an exception - community comments on the NWMB harvest study suggested the figures for caribou and fish were significantly underestimated and AREVA's data for 2010 suggest that caribou harvests were in the order to 5,000 animals that year.

This is not to claim that half of diets come from traditional food. Harvesting replaces high value food, specifically meat.

The table below provides an indication of the percentage of consumed solid food that is traditional. Overall the percentage is about a third and is clearly much higher among older generations (Kuhnlein et al, 2000). Both Kuhnlein and Myers et al (2005) noted a trend among younger people to consume less traditional food.

Solid Diet from Traditional Foods by Weight<sup>22</sup> (%) Table 4.2-5

			Total	
	20-40	41-60	61+	Total
Female	22.8	42.6	45.3	30.9
Male	30.5	49.5	60.4	38.5
Total	26.7	45.8	52.3	34.6
Sample size	199	78	38	315

CINE also notes that for the three communities in Kivalliq for which they have data (Baker Lake, Chesterfield Inlet and Rankin Inlet) caribou alone accounts for about 30% of protein intake during the fall and about 20% during the winter. Country foods are also of course good sources of nutrients that contribute to physical health.

<sup>&</sup>lt;sup>22</sup> As calculations are on the basis of grams/per day/person, water based drinks (which account for most consumption by weight and may have no calories are not included). By far the largest consumption of drinks is of coffee and tea, however including soda pop and fruit juices in the above table would reduce percentages.

Harvesting is not just about subsistence (also see Section 4.2.7, Community Wellbeing). There are also important cultural dimensions in the relationship Inuit have to the land and its resources beyond its exploitation for subsistence. Through the harvest, distribution and consumption of wildlife, Inuit identity and social relationships are affirmed. Harvest, distribution and consumption of country foods are also fundamental to the reproduction of Inuit society and culture. Traditionally, sharing surplus harvest was part of a system of reciprocity or insurance against potential future misfortune. Sharing is reinforced by the belief that animals are sentient beings, are aware of human behavior and motives, and act accordingly. If a harvest is not shared, a hunter's future success may be jeopardized (Bennet and Rowley, 2004).

In some communities in Kivalliq, such as Chesterfield Inlet, the commitment to sharing is upheld by a strong social injunction against selling of harvested food. Surplus harvest is first to be shared with family and then with elders and widows in the community. If there is additional surplus, the hunter may make an announcement on community radio saying that food is available for those who want it.

Harvesting also affirms social roles, particularly the value assigned to men as providers of food to families and communities and to elders as custodians of knowledge. Although women participate in hunting trips and also fish, it is less common for women to go hunt and trap, and they typically do not go out alone. There are exceptions -- interviews with women revealed that some will hunt seals from floe edges and occasionally hunt caribou.

There are also have been important income dimensions to harvesting – tourism, pelt sales, and arts and crafts all generate income based on land and resource use, as do commercial harvesting of caribou, musk oxen and fish for sale outside Nunavut. Pelts are sold by individuals to their HTOs and sent south, typically to Thunder Bay, for auction. The price a hunter gets fluctuates according to supply and demand as well as the quality of the pelt. Arts and crafts are also marketed, some times more informally. For less well known artists, community stores sell carvings by photographing them and sending the pictures south to potential galleries and other buyers. Artists will also sell to travellers staying at hotels and to local businesses.

Some of these income streams have fallen in recent years however. Environmental advocacy in the United States and Europe have reduced the markets for polar bear hunt guiding and seal pelts. Arts and craft production is constrained by high cost of materials and tools, including soapstone which artists report is increasingly hard, and expensive, to source.

The interests of hunters and trappers at a community level are represented by HTOs. In addition, a number of harvester support programs are administered by NTI with HTO participation. For example, the Community Harvest Program provides financial assistance to hunters to supply country foods to people without many means to access this themselves. The program is a good example of an adaptive use of a new institution to ensure that traditional sharing systems are maintained. The program provides cash to a community while at the same time the harvest is given away.

HTOs are also involved in wider harvest distribution systems. If an HTO in one community has excess caribou for example, it may trade with another HTO that has an excess of seal or other resource. Because country foods are often broadly distributed, contamination in one area can affect many people. The origin of the country food is something people pay considerable attention to.

The major challenge for many harvesters is reported to be how to earn the money needed to harvest and still have the time to go out and do it. NTI's harvester support programs are intended to help address this challenge with subsidies for equipment, ammunition and fuel. Nevertheless, costs are high to go out on the land for those without much income. HTO members in Rankin Inlet suggested that a weekend of hunting costs about \$400 in order to pay for gas and gear. Interview results suggest that those who can afford to hunt regularly are typically working at full time jobs and wives of rotational workers in Baker Lake felt that their husbands go out on the land more often now that they have steady employment. Most hunters now carry GPSs and satellite phones on health and safety grounds. Maintaining traditional activity comes at a price.

# 4.2.4 Population

Kivalliq Region's population is estimated to have grown from 7,944 to 9,479 people between 2001 and 2009, for an average annual growth rate of 1.9%. This is slower population growth than the 2.2% growth rate than between 1996 and 2000. Rankin Inlet, Arviat and Baker Lake are the largest communities, all with populations over 1,500. The remaining four communities have populations between 300 and 800. The fastest growing communities were Repulse Bay (3.2% average annual growth between the end of 2000 and the end of 2010) and Baker Lake and Whale Cove (2.2%). Chesterfield Inlet was the slowest growing community over the decade, growing only 6.6% in ten years.

As Table 4.2-6 shows, growth rates between communities and within communities over time vary substantially. Kivalliq as a whole has grown slightly faster than Nunavut. As is the case for Nunavut as a whole, the birth rate is the primary determinant of population growth in some Kivalliq communities, for example, in Arviat. Arviat had very high population growth rates until 2001, averaging over 4% annually between 1996 and 2001. Growth rates subsequently fell dramatically, to average less than 2% annually, however the population was expected to start growing rapidly again, as children born before 2001 start having children. By 2010, population growth in Arviat was again over 4%.

Table 4.2-6 Kivalliq Population

	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	Change 2001 to 2010
Population nu	ımbers		I								l
Arviat	1,997	2,026	2,055	2,096	2,140	2,144	2,177	2,215	2,246	2,331	334
Baker Lake	1,592	1,631	1,654	1,717	1,761	1,807	1,841	1,866	1,905	1,950	358
Chesterfield Inlet	362	365	357	348	352	347	357	362	366	386	24
Coral Harbour	743	748	763	784	780	802	820	832	847	861	118
Rankin Inlet	2,290	2,308	2,365	2,395	2,415	2,469	2,521	2,573	2,630	2,704	414
Repulse Bay	640	657	680	719	749	782	801	813	830	855	215
Whale Cove	320	329	343	355	363	367	372	376	390	392	72
Kivalliq	7,944	8,064	8,217	8,414	8,560	8,718	8,889	9,037	9,214	9,479	1535
Nunavut	28,134	28,819	29,320	29,854	30,328	30,799	31,272	31,595	32,194	33,220	5086
Percent Chan	ge										
Arviat	4.6	1.5	1.4	2.0	2.1	0.2	1.5	1.7	1.4	3.8	16.7
Baker Lake	1.7	2.4	1.4	3.8	2.6	2.6	1.9	1.4	2.1	2.4	22.5
Chesterfield Inlet	1.4	0.8	-2.2	-2.5	1.1	-1.4	2.9	1.4	1.1	5.5	6.6
Coral Harbour	2.6	0.7	2.0	2.8	-0.5	2.8	2.2	1.5	1.8	1.7	15.9
Rankin Inlet	1.1	0.8	2.5	1.3	0.8	2.2	2.1	2.1	2.2	2.8	18.3
Repulse Bay	2.9	2.7	3.5	5.7	4.2	4.4	2.4	1.5	2.1	3.0	33.6
Whale Cove	-0.6	2.8	4.3	3.5	2.3	1.1	1.4	1.1	3.7	0.5	22.5
Kivalliq	2.3	1.5	1.9	2.4	1.7	1.8	2.0	1.7	2.0	2.9	19.3
Nunavut	2.3	2.4	1.7	1.8	1.6	1.6	1.5	1.0	1.9	3.2	18.3
Source: GNBS	5, 2011			_	_	_		_	_		

In Chesterfield Inlet on the other hand, there have been years when population has gotten smaller, which can only be explained by out migration. Interviews and focus groups discussions suggest that where the opportunity arises, people have chosen to move out of smaller communities, for any

number of reasons. Rotational employment and increased employment in mining service centres such as Baker Lake and Rankin Inlet provide opportunities for people to move.

Whereas Baker Lake's population was not growing especially quickly during the construction of Meadowbank, the data show comparably faster growth in 2009 and again in 2010. Rankin Inlet has also seen much faster growth in 2010. Part of this is very likely attributable to in migration in response to development of the mining sector in the western part of Kivalliq. Population projections based on demographic structure (and expected birth rates) did not indicate that Baker Lake or Rankin Inlet would grow this fast (see below).

Projected population growth rates to the year 2036 are presented in Table 4.2-7. GNBS cautions that i) the figures are not forecasts, but represent population growth on the basis of current population age distribution and on existing trends in births, deaths and net migration; and ii) accuracy decreases with for smaller populations and over longer time horizons. Accordingly, they advise 'extreme caution' in interpreting the figures.

Table 4.2-7 Population Projections

	2006	2011	2016	2021	2026	2031	2036
Population number	- 1	•	1	•	•	1	-1
Arviat	2,144	2,339	2,571	2,841	3,136	3,439	3,747
Baker Lake	1,807	1,963	2,120	2,294	2,474	2,657	2,851
Chesterfield Inlet	347	383	419	455	490	522	568
Coral Harbour	802	870	958	1,056	1,153	1,253	1,363
Rankin Inlet	2,469	2,730	2,949	3,193	3,441	3,700	3,972
Repulse Bay	782	875	960	1,045	1,131	1,228	1,335
Whale Cove	367	400	433	467	494	525	563
Kivalliq	8,718	9,560	10,410	11,351	12,319	13,324	14,399
Percent change							•
Arviat	na	1.8	2.0	2.1	2.1	1.9	1.8
Baker Lake	na	1.7	1.6	1.6	1.6	1.5	1.5
Chesterfield Inlet	na	2.1	1.9	1.7	1.5	1.3	1.8
Coral Harbour	na	1.7	2.0	2.0	1.8	1.7	1.8
Rankin Inlet	na	2.1	1.6	1.7	1.6	1.5	1.5
Repulse Bay	na	2.4	1.9	1.8	1.6	1.7	1.7
Whale Cove	na	1.8	1.7	1.6	1.2	1.3	1.4

Table 4.2-7 Population Projections

	2006	2011	2016	2021	2026	2031	2036
Kivalliq	na	1.9	1.8	1.8	1.7	1.6	1.6
Source: GNBS, 2011b							

Nevertheless, on current trends, population growth rates are broadly expected to decrease over time over the region as a whole, from 1.9% annually in 2011 to 1.6% after 2026. As noted above, Arviat is expected to continue to grow more quickly than it has over the last decade, as are Chesterfield Inlet and Coral Harbour. Baker Lake, Rankin Inlet and Whale Cove are projected to grow more slowly than other Kivalliq communities.

It may be noted that the projections in the above table range between 1.2% and 2.4%, and thus are not as variable between communities, or within communities over time, as the actual data for the previous 15 years are as presented in Table 4.2-6 (these range from -2.5% to +5.7%). Much of the explanation lies in the very difficult to estimate migratory movements – the projections assume a net loss of 236 people per year over the entire period 2011 to 2036 and assign a percentage of this to each community based on its population.

While mobility in Nunavut is comparatively low relative to the rest of Canada (see below), in small communities even a decision on the part of one or two families to relocate can have an big effect on a population in percentage terms – for example if two families of five people each left Chesterfield Inlet in 2011 this would represent a population decrease in the order of 2.6%. Further, as noted earlier, there is some evidence of movement into Baker Lake and Rankin Inlet in response to the location in these two hamlets of most businesses servicing the mining sector, and labour mobility in response.

Other selected demographic statistics are presented Table 4.2-8 below. The population of Kivalliq is young, with a median age of 21.1 in 2006, slightly higher than the median age of 20.3 in 2001 and two years lower than that of Nunavut as a whole. Kivalliq has the highest fertility rate of the three regions, as 3.2 births per woman in 2006 as compared to 2.9 in the other regions (GNBS, 2011b). The young population in Kivalliq presents the same challenges as for Nunavut as a whole, but can become a driver of economic growth in the region, provided the young can be provided the tools and incentives they will need to contribute to Kivalliq's economic development potential.

Table 4.2-8 Selected Demographic Statistics, 2006

	Arviat	Baker Lake	Chesterfield Inlet	Coral Harbour	Rankin Inlet	Repulse Bay	Whale Cove	Kivalliq	Nunavut
Population in 2006	2,060	1,728	332	769	2,358	748	353	8,348	29,474
Median age of the population	19.5	22.0	24.0	18.9	23.9	18.9	19.1	21.1	23.1
Male/female ratio	0.95	1.08	1.00	1.00	1.00	1.07	1.12	1.01	1.05
Average household size	4.5	3.8	3.2	3.9	3.6	5.6	3.9	4.0	3.7
Lone parent families (%)	29.1	29.6	29.4	26.5	25.7	20.6	31.3	27.1	27.6
Median income in 2005, all families (\$)	37,248	39,360	51,072	38,144	66,133	28,224	36,736	42,368	49,270
Median income in 2005, lone parent families (\$)	17,984	21,312	21,376	21,632	27,296	10,592	24,384	21,248	22,576
Aboriginal identify population (%)	93.2	90.7	90.8	95.5	83.7	95.3	95.8	90.4	85.0
Mother tongue English (%)	6.6	34.6	14.1	5.9	28.6	6.0	2.9	18.6	26.5
Mother tongue other (%)	93.0	65.4	87.5	94.8	70.7	93.3	97.1	81.0	72.2
Lived at same address 1 year ago (%)	94.1	88.5	91.9	88.7	83.0	90.3	83.8	88.3	84.3
Lived at same address 5 years ago (%)	75.7	68.4	62.1	64.9	56.7	67.5	51.7	65.4	57.8

Source: Statscan, 2007a

Note: Mother tongue 'other' is almost exclusively Inuktitut

The Kivalliq Aboriginal identity population was 90.4% of the total in 2006, about 5% higher than in Nunavut overall. About 81% of people had a language other than English as a mother tongue – in the context of Nunavut almost all of these would have Inuktitut as the mother tongue. Less than 2% of the population had knowledge of French.

There are not many obviously large differences in the data for different communities, with the exception that Rankin Inlet has a lower percentage of Inuit residents, and higher incomes. Baker Lake is exceptional insofar as 35% of people report English as their mother tongue. Mobility is lower than in Nunavut as a whole, that is more people had stayed at the same address in Kivalliq than in

Nunavut, and mobility is lower than in Canada more generally (comparable figures for Canada are 85.9% at the same address as one year previously and 59.1% five years previously). This is likely a reflection of lack of housing options in Kivalliq as compared to Canada however, rather than a lack of overall mobility (see below). People do not easily change addresses in an environment where 50% of families are in social housing.

Data for Aboriginal language trends are presented in Table 4.2-9. There has been some decrease in Inuktitut as the language first learned and still understood in Baker Lake, but overall people in all other Kivalliq communities had fairly steadily maintained Inuktitut as a mother tongue over the decade 1996 to 2006. There have however been larger decreases in speaking of Inuktitut in the home, especially in Baker Lake and Chesterfield Inlet. This would normally imply that many of the youngest of Kivalliq residents, children born after 2006, are seeing more exposure to English than to Inuktitut in the home.

Table 4.2-9 Aboriginal Language Trends (%age of Aboriginal population)

	Arviat	Baker Lake	Chesterfield Inlet	Coral Harbour	Rankin Inlet	Repulse Bay	Whale Cove					
First learned and still understood*												
1996	98	87	98	100	83	96	93					
2001	98	75	95	96	75	98	97					
2006	98	70	93	97	81	97	100					
Aboriginal language spo	Aboriginal language spoken at home**											
1996	96	53	87	95	65	95	88					
2001	98	81	94	99	81	98	97					
2006	95	29	57	84	53	87	93					
Knowledge of Aborigina	ıl language											
1996	100	96	100	100	94	99	100					
2001	99	93	100	99	90	99	98					
2006	100	89	98	98	93	97	99					

Source: Statscan 2007b, 2002b

Notes:

<sup>\*</sup> In 2006 data are for 'mother tongue'

<sup>\*\*</sup> In 2006 the data are for 'most spoken at home'

Data on perceptions of Aboriginal language use are in Table 4.2-10. Again, with the possible (and partial) exception of Baker Lake, there is strong commitment to Inuktitut and most people feel they speak well. The numbers on access to services in Inuktitut are however very low and justice in Inuktitut is particularly lacking in the more remote communities of Coral Harbour and Repulse Bay. GN is acutely aware of the ongoing need to staff social service delivery with non Inuit in the absence of trained Inuit, and is aggressively trying to redress this. Developing capacity in these areas will take time however, and in the interim the need to deal with health, education and police in English may be a contributing factor to language loss.

Table 4.2-10 Aboriginal Language Use (%age of Aboriginal population over 15

	Arviat	Baker Lake	Coral Harbour	Rankin Inlet	Repulse Bay
Able to speak Aboriginal language very or relatively well	97	77	93	89	90
Access to services in Aboriginal lang	uage				
health	26	25	30	26	27
justice	22	22	9	23	10
social/employment	26	26	30	25	30
Importance to keep, learn or re learn	Aboriginal langı	ıage			
very	91	83	87	80	85
somewhat	7	na	9	15	13
Source: Statscan, 2007b					

There is also some perception among older interview and focus group participants, particularly in Baker Lake and Rankin Inlet, that as there is more contact with people from the south, including through employment, people use Inuktitut less and eventually it could be lost. Many young adults however believe that their culture is strong and won't disappear because of southern influences.

Statistics Canada data on migration data are presented in Table 4.2-11. There are no data made publicly available at the regional or community level – these are only reported at the national and territorial level. However, the Nunavut level data are of some interest, remembering that at least as of 2006 mobility in Kivalliq was lower than in Nunavut overall.

Table 4.2-11 Migration

	Nui	navut	Can	ada
	I year	5 year	l year	5 year
Total population	28,665	26,050	30,897,210	29,922,355
Number		•		
Total in migrants	1,820	4,270	1,808,835	5,579,410
intraprovincial	815	1,735	1,221,560	3,566,795
interprovincial	955	2,425	289,745	852,580
external	55	105	297,525	1,160,040
Total out migrants	1,945	4,505	1,511,300	4,419,370
intraprovincial	815	1,740	1,221,560	3,566,790
interprovincial	1,135	2,770	289,745	852,500
Percentage of total population	1	•		
Total in migrants	6.3	16.4	5.9	18.6
intraprovincial	2.8	6.7	4.0	11.9
interprovincial	3.3	9.3	0.9	2.8
external	0.2	0.4	1.0	3.9
Total out migrants	6.8	17.3	4.9	14.8
intraprovincial	2.8	6.7	4.0	11.9
interprovincial	4.0	10.6	0.9	2.8

The data for Nunavut indicate net out migration, whereas the data for Canada show net in migration. Movement is more likely to be in and out of the territory than within the territory as compared to Canada – that is, a higher percentage of people in Nunavut move into and out of Nunavut as opposed to within Nunavut, whereas in Canada movement is much more likely to be within a

province or territory. One year mobility in Nunavut is higher than in Canada overall, however five year mobility is less.<sup>23</sup> Higher interprovincial and short term mobility are a reflection of numbers of southern workers on shorter term contracts.

However Inuit would also be appearing to leave the territory. Table 4.2-12 present data on the relative proportions of Inuit in different parts of Canada. Despite high population growth and birth rates, Nunavut was home to a smaller percentage of Inuit in Canada in 2006 than in 2001, while the rest of Canada has seen its Inuit population increase by a third. This is general to Inuit populations in the north, with the exception of Quebec. Statistics Canada found that in 2006, the urban centres outside Inuit Nunangat with the largest Inuit populations were Ottawa (725 people), Yellowknife (640), Edmonton (590), Montréal (570) and Winnipeg (355) (Statscan, 2011). However these concentrations of Inuit represent less than 50% of Inuit in the rest of Canada.

Table 4.2-12 Inuit Population Change by Region

	20	001	20	06	2001 to 2006
	Number	%	Number	%	% Change
Nunavut	22,560	50.1	24,640	48.8	9.2
Northwest Territories	3,910	8.7	4,165	8.3	6.5
Quebec	9,535	21.2	10,950	21.7	14.8
Labrador and Newfoundland	4,555	10.1	4,715	9.3	3.5
Total	40,560	90.0	44,470	88.1	9.6
Rest of Canada	4,510	10.0	6,010	11.9	33.3
Canada	45,070	100.0	50,480	100.0	12.0

### 4.2.5 Education

Available community level data on educational achievement is from national census data (see Table 4.2-13 for 2006 data). These data indicated some negative trends, trends that anecdotal evidence

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<sup>&</sup>lt;sup>23</sup> These data are slightly different from those reported in Table 4.3-8 for reasons of different methodologies used in the calculations.

suggests have reversed themselves in at least some Kivalliq communities more recently. The data however are indicative of the challenges that are still faced in providing the educations children will need if they are to have livelihood options, and do characterize the educational achievement of older people.

**Table 4.2-13** Education, 2006

		Arviat		Ва	ker La	ke	Ches	terfield	l Inlet	Cor	al Hark	our	Ra	nkin Ir	let
	All	М	F	All	М	F	All	М	F	All	М	F	AII	М	F
Total population	15 yea	rs and	over	I.				I.		I.	I.			I.	
No certificate, diploma or degree	70.9	70.7	70.2	66.4	64.1	68.9	59.5	57.1	59.1	66.3	63.6	70.2	53.4	52.8	53.9
High school certificate or equivalent	9.3	8.9	9.7	10.3	10.3	10.4	9.5	9.5	9.1	7.6	6.8	6.4	14.4	11.3	17.5
Apprenticeship or trades certificate or diploma	4.0	6.5	1.6	6.7	10.3	2.8	4.8	9.5	0.0	10.9	18.2	4.3	6.7	11.3	1.3
College, CEGEP or other non-university certificate or diploma	8.5	7.3	9.7	10.3	9.4	10.4	19.0	14.3	22.7	8.7	9.1	8.5	13.7	12.6	14.9
University certificate or diploma below the bachelor level	2.0	1.6	1.6	0.0	0.0	0.0	0.0	0.0	0.0	3.3	4.5	4.3	2.9	3.1	2.6
University certificate; diploma or degree	5.7	5.7	6.5	6.3	5.1	7.5	4.8	0.0	9.1	3.3	4.5	4.3	8.9	8.2	9.7
Total population	aged 1	5 to 24	ļ												
No certificate, diploma or degree	86.4	87.5	85.4	93.9	94.4	93.3	75.0	80.0	83.3	83.9	85.7	77.8	77.6	81.4	69.8
High school certificate or equivalent	11.1	10.0	12.2	6.1	5.6	6.7	16.7	40.0	33.3	9.7	14.3	11.1	17.6	16.3	20.9
Apprenticeship or trades certificate or	0.0	0.0	0.0	0.0	0.0	0.0	16.7	0.0	33.3	0.0	0.0	0.0	0.0	0.0	0.0

Table 4.2-13 Education, 2006

		Arviat		Ва	ker La	ke	Ches	terfield	l Inlet	Cor	al Hark	our	Ra	nkin In	let
	All	М	F	All	М	F	AII	М	F	All	М	F	All	М	F
diploma															
College, CEGEP or other non-university certificate or diploma	2.5	0.0	4.9	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	4.7	0.0	7.0
University certificate or diploma below the bachelor level	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
University certificate; diploma or degree	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	2.4	0.0	4.7
Total population	aged 2	25 to 34	ļ												
No certificate, diploma or degree	60.3	66.7	56.3	63.0	56.5	66.7	45.5	40.0	50.0	50.0	45.5	50.0	40.5	44.7	40.0
High school certificate or equivalent	12.7	10.0	15.6	8.7	8.7	12.5	0.0	40.0	0.0	10.0	0.0	20.0	18.9	13.2	22.9
Apprenticeship or trades certificate or diploma	4.8	6.7	6.3	8.7	13.0	0.0	18.2	40.0	0.0	15.0	27.3	0.0	5.4	10.5	0.0
College, CEGEP or other non-university certificate or diploma	12.7	10.0	12.5	8.7	13.0	8.3	27.3	0.0	33.3	10.0	18.2	20.0	17.6	18.4	20.0
University certificate or diploma below the bachelor level	3.2	0.0	6.3	0.0	0.0	0.0	0.0	0.0	0.0	10.0	0.0	0.0	5.4	7.9	5.7
University certificate; diploma or degree	9.5	10.0	6.3	8.7	8.7	12.5	0.0	0.0	0.0	0.0	0.0	20.0	10.8	7.9	14.3
Total population	aged 3	5 to 64													

Table 4.2-13 Education, 2006

		Arviat		Ва	ker La	ke	Ches	terfield	l Inlet	Cor	al Hark	our	Ra	nkin In	let
	AII	М	F	All	М	F	AII	М	F	AII	М	F	All	М	F
No certificate, diploma or degree	62.1	59.6	63.8	46.4	43.1	51.1	58.8	44.4	55.6	56.8	52.9	63.2	41.8	38.9	46.4
High school certificate or equivalent	6.3	8.5	4.3	13.4	15.7	11.1	11.8	0.0	0.0	5.4	0.0	0.0	11.3	8.3	13.0
Apprenticeship or trades certificate or diploma	7.4	12.8	4.3	10.3	15.7	6.7	0.0	22.2	0.0	13.5	23.5	10.5	12.1	19.4	2.9
College, CEGEP or other non-university certificate or diploma	12.6	12.8	12.8	17.5	15.7	22.2	23.5	22.2	33.3	10.8	11.8	15.8	18.4	16.7	20.3
University certificate or diploma below the bachelor level	3.2	0.0	4.3	2.1	0.0	0.0	0.0	0.0	0.0	8.1	11.8	10.5	2.8	2.8	2.9
University certificate; diploma or degree	8.4	8.5	10.6	9.3	7.8	8.9	11.8	0.0	22.2	5.4	11.8	10.5	13.5	13.9	14.5

Table 4-2-13 Education, 2006 (continued)

	Repulse Bay			W	hale Co	ve		Kivalliq		Nunavut		
	All	М	F	All	М	F	All	М	F	All	М	F
Total population 15 years and over												
No certificate, diploma or degree	80.0	78.3	79.5	73.8	76.2	76.2	61.4	63.5	65.7	57.3	56.1	58.6
High school certificate or equivalent	2.2	0.0	4.5	4.8	0.0	9.5	7.7	9.0	11.0	10.9	10.6	11.2
Apprenticeship or trades certificate or diploma	7.8	10.9	4.5	7.1	9.5	0.0	10.9	10.2	2.5	7.0	10.5	3.2
College, CEGEP or other non-university	5.6	6.5	4.5	9.5	9.5	9.5	12.4	9.8	11.8	14.2	13.1	15.3

Table 4-2-13 Education, 2006 (continued)

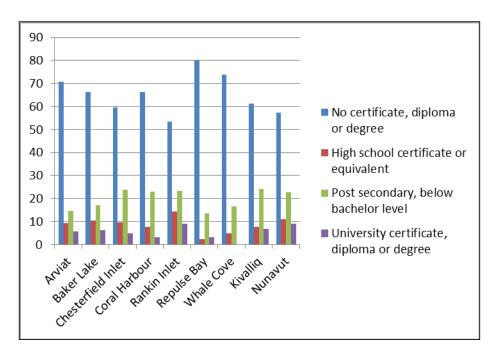
	Re	epulse B	ay	W	hale Co	ve		Kivalliq			Nunavu	t
	All	М	F	All	М	F	All	М	F	All	М	F
certificate or diploma												
University certificate or diploma below the bachelor level	0.0	4.3	0.0	0.0	0.0	0.0	0.7	1.9	1.9	1.6	1.5	1.8
University certificate; diploma or degree	3.3	4.3	4.5	0.0	0.0	0.0	6.7	5.6	7.1	9.0	8.1	10.0
Total population aged 15	5 to 24											
No certificate, diploma or degree	97.1	100.0	100.0	85.7	85.7	100.0	85.8	88.3	83.9	79.9	81.3	78.3
High school certificate or equivalent	0.0	0.0	0.0	0.0	0.0	0.0	10.5	9.2	11.8	13.6	12.6	14.7
Apprenticeship or trades certificate or diploma	0.0	0.0	0.0	0.0	0.0	0.0	0.6	1.2	1.2	1.9	2.3	1.5
College, CEGEP or other non-university certificate or diploma	5.7	11.1	0.0	0.0	0.0	0.0	2.5	1.2	3.1	3.7	3.0	4.2
University certificate or diploma below the bachelor level	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.2	0.0	0.4
University certificate; diploma or degree	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.9	0.9	1.1
Total population aged 25	5 to 34											
No certificate, diploma or degree	80.0	72.7	80.0	55.6	75.0	33.3	54.7	55.4	53.7	46.0	47.3	44.9
High school certificate or equivalent	0.0	0.0	0.0	0.0	0.0	0.0	12.8	9.9	15.4	13.7	13.1	14.4
Apprenticeship or trades certificate or diploma	10.0	18.2	0.0	22.2	0.0	0.0	7.4	12.4	2.4	7.7	12.0	3.5
College, CEGEP or other non-university certificate or diploma	10.0	0.0	0.0	22.2	0.0	33.3	14.7	13.2	13.8	18.2	16.4	20.0
University certificate or diploma below the bachelor level	10.0	0.0	0.0	0.0	0.0	0.0	2.9	3.3	3.3	2.2	1.8	2.4
University certificate; diploma or degree	10.0	0.0	0.0	22.2	0.0	0.0	9.1	6.6	11.4	12.2	9.3	14.8
Total population aged 35	5 to 64											

Table 4-2-13 Education, 2006 (continued)

	Re	pulse E	Bay	w	hale Co	ve		Kivalliq		Nunavut		
	All	М	F	All	М	F	All	М	F	All	М	F
No certificate, diploma or degree	62.5	58.8	66.7	72.2	66.7	66.7	52.1	47.5	56.3	46.0	42.0	50.2
High school certificate or equivalent	6.3	11.8	0.0	0.0	0.0	0.0	8.9	9.0	8.9	8.5	8.8	8.0
Apprenticeship or trades certificate or diploma	15.6	17.6	0.0	11.1	0.0	22.2	10.6	17.0	4.2	10.2	15.5	4.5
College, CEGEP or other non-university certificate or diploma	12.5	0.0	13.3	11.1	0.0	0.0	16.3	14.8	17.8	19.8	18.6	21.1
University certificate or diploma below the bachelor level	6.3	0.0	0.0	0.0	0.0	0.0	2.5	2.2	2.8	2.4	2.3	2.6
University certificate; diploma or degree	6.3	0.0	0.0	11.1	22.2	0.0	9.9	9.4	10.3	13.1	12.7	13.5
Source: Stategan 2007a												

Source: Statscan, 2007a

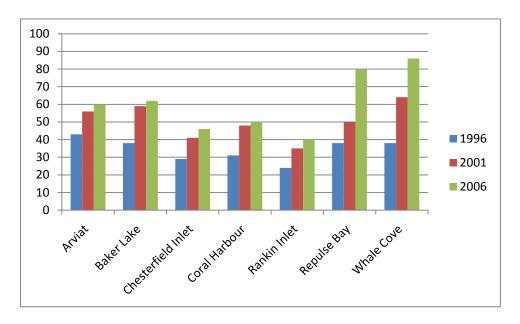
Educational achievement in Kivalliq was low relative to the rest of Canada in 2006, but also, in each of the seven communities with the exception of in Rankin Inlet, relative to Nunavut as a whole. Kivalliq people were more likely to have no certificate, diploma or degree than elsewhere in Nunavut more generally and less likely to have a university credential (see Figure 4.2-1).



Source: Statscan, 2007a

Figure 4.2-1 Educational Achievement (%age of population 15 years and over)

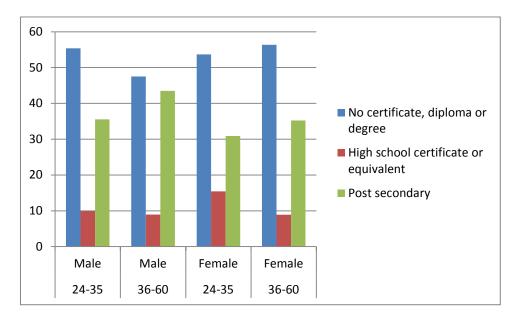
There was also evidence that educational achievement deteriorated over the period 1996 to 2006. Statscan changed age cohort reporting for each census, thus the data are not strictly comparable. Data from 1996 are for the over 25 population; from 2002 for 24 to 35 year olds; and from 2007 for 20 to 35 year olds. However, if educational achievement were improving with time, one would expect younger populations to have better education than older ones, that is, the data should have gotten better forward from 1996. Figure 4.2-2 shows just the reverse – with time, larger percentages of the population in each community did not complete high school. Data for older age groups in 2001 and 2006 also show an increase of people with no high school, from 43% in 2001 to 52% in 2006 for Kivalliq as a whole.



Source: Statscan 1997, 2002a and 2007a

Figure 4.2-2 Less than High School Education (%age of population)

There was however positive change in one respect. Figure 4.2-3 compares the gender distribution of educational achievement for younger and older age cohorts in 2006, for Kivalliq as a whole. The gender gap has been closing. Whereas younger males were less educated than older males (more had no high school and fewer had postsecondary education), younger females are graduating from high school and postsecondary schools at an increasing rate over older females. This is not to suggest that female achievement does not need to improve – as of 2006 in Kivalliq over 50% of females over the age of 24 had not graduated, and less than 10% of 15 to 24 years olds had graduated (although some in this latter age groups can be expected to – 15 year olds are not expected to have finished high school). But it does suggest that the deterioration in educational achievement has been particularly serious for boys. It also supports what some people in focus groups brought up – that it is harder for boys to get through school.



Source: Statscan, 2007a

Figure 4.2-3 Educational Achievement by Gender (%age of the population)

It is noted however that there are some signs that graduation rates are improving. NAC (2011) has figures that show an increase in graduation rates in Kivalliq from 42 children in 1999 to 83 in 2010, representing a doubling (that is an increase very much faster than can be attributed to population growth). Eighty three graduates in Kivalliq is about 50% of 18 year olds in Kivalliq in 2010. Not all graduates would have been 18 years old, and some of this good performance may represent catch up by older students, however it is a very encouraging sign.

Given that the data in the Figure 4.2-3 show that performance actually deteriorated between 1996 and 2006, most of this improvement in graduations is likely to have happened more recently. As an example at a community level, Baker Lake did not have a single graduate between 2000 and 2004 but educators report that there have fairly consistently been 8 and more graduates annually since 2006. Most high school educators in Kivalliq now expect that up to half their registered students will graduate over the coming years.

The challenges facing getting children through high school are varied and different people have very different perspectives. Given recent evidence that educational outcomes are improving, but are still not stellar, it is perhaps expected that there is still some ambivalence among Inuit about a need for education. People also frequently note that either support, or lack of support, of families has an important effect on whether or not children stay in school (see Box 4.2-1).

#### Box 4.2-1 Education

- We have not finished high school or gotten any kind of certificate. This makes us feel inadequate and lack confidence (young adults).
- We didn't finish high school because of sleeping in and having children (young adults).
- I am happy my grandparents forced me to finish high school, and now I know how I will deal with my own kids.
- White people have brought material possessions to Kivalliq, and now they are trying to bring jobs that will give money to people to buy things. So people have to get papers, which is not the traditional way. It is a trap and we lose identity.
- We are grateful to our elders for teaching us things without having to go to school to get papers. Learning by experience, by doing things, is better than learning in school from teachers and books (elders).
- Perhaps the problem with the young is that they know too much, have too much education (elders).
- Young parents encourage their kids to get an education but grandparents do not and a lot
  of kids are raised by grandparents.
- We want to see Inuit people working, not just southerners. We encourage youth to stay in school (elders).
- The school here did not have teachers that were motivated and the good students were not challenged.
- People seem to be more interested in school and training because they see more employment opportunities.
- There is an Inuit learning style, which is more hands on.
- There are more kids starting to graduate from high school, but there have to be jobs for these kids.
- More parents are encouraging their kids to stay in school and there are more opportunities for them so they are motivated.
- Women are more likely to graduate from high school, so it is young men that really need educational help.
- It seems that since the high school was built, more people are going to school.
- Mines are sources of employment and encourage people to stay in school, to get training.
- We feel that the schools are pretty good and that our kids enjoy going to school (women).
- We feel that our success in finding employment opportunities is linked to graduating from high school, and timing (young adults).
- We don't understand why even a garbage truck driver needs to show a grade 10 education why does anyone need an education in garbage (elders)?

In comments about education overall, ambivalence and the importance of family were more often expressed than, for example, feeling that schools and teacher were not adequate. There were some

references to Inuit learning styles being more hands on and experiential than typical high school teaching methods. Many people acknowledged that education is probably necessary if the young wish to work (although some wish this were not so), but also see this as a two way street – there is also an appreciation that opportunities to work have to be there to motivate children to go to school.

There is more frustration on the part of educators who generally feel that they need to find means to get more children through high school. Aside from observations that are similar to those noted by Inuit – a need for more family support for education and for self discipline in children – educators speak of challenges around absenteeism, language, curriculum, support systems in schools (notably more student counseling and day care are needed) and teacher retention. Not all of these challenges have obvious solutions in the short term.

It is not that children don't go to school; it is that they drop out. Absenteeism was presented as a major challenge by virtually all educators in Kivalliq communities. Leaving school is a process that usually begins with missing school and subsequently missing assignments and tests. This process often starts in the primary school. Early school leavers in Kivalliq, as elsewhere in Canada, tend to leave school completely in grade 10, when they enter the credit system and cannot continue without passing grades.

The absenteeism is often linked to other social issues such as poor parenting, teenage pregnancy and crowded living conditions, but by and large educators do not feel that alcohol and drug abuse are major factors. However they also note that a stable and committed teaching staff and a curriculum that interests and is appropriate to the learning needs of Inuit children are needed as well.

All interviews with education informants suggested that English is a great challenge for many of their students. Until grade 5, Inuktitut is the language of instruction. Some informants are concerned that the preservation of Inuktitut language skills comes at the expense of ensuring that children learn English well enough to pass grade 10 exams, and function in either the wage economy or postsecondary education. Teachers feel that Inuit students are struggling particularly with comprehension of reading materials. This relates back to Inuit learning styles however it is noted that a hands on approach is only applicable to some learning and may be limiting. Some teachers feel that many of their students are essentially learning English as second language (ESL), but without the ESL support that schools in the south receive to help overcome language difficulties.

Changes to curriculum and teaching frameworks have, it is thought, been more successful at engaging children in school. Consistent with GN and GNDoF foundation documents, schools work to embed and accommodate IQ into curriculum and teaching. Workshops are held with teachers to get and keep them on board with the IQ emphasis. All schools say they are keen to adapt programs to Inuit learning styles which, they agree, are more experientially based. Various adaptations have been adopted to make it easier for children to combine school and the learning of traditional skills and values. Elders are involved in the delivery of some school programs, including in some cases the

teaching of survival skills needed to hunt on the land and ice. In Chesterfield Inlet, as a specific example of one school's initiative, Victor Sammurtak students write their departmental exams in January so that they are free to go out on the land in May. Schools also allow young adults to continue in school until age 21 to give them the time they may need to pass all required courses.

There is some conviction that exchange and entrepreneurial programs that enable children to travel outside Nunavut, to other parts of Canada and to other countries, are also contributing to higher graduation rates. Such programs are thought to build self confidence, encourage mobility and suggest options, all of which motivate children to stay in school. New job opportunities in the mining sector and new options for postsecondary training – such as the new technical school in Rankin Inlet and training programs offered in conjunction with mining project proponents – are also considered motivators.

Additionally, Kivalliq high schools are interested in developing programs that prepare students for the kinds of employment that are found, are expected to be found, or can be developed in Kivalliq. For example, the school in Chesterfield Inlet has developed an experiential program that includes training in building maintenance, safety training and a nationally approved kayak building program. John Arnalukjuak High School in Arviat is hoping to offer courses in electrical and green energy training. Sakku School in Coral Harbour is hoping to offer small engine repair.

Young adults in focus groups noted that expectations of them are quite high. They cite feeling expected to be fluent in Inuktitut and English, maintain their traditional activities, culture and identity, succeed at school and subsequently succeed in the wage economy. Some educators also wondered whether the trends in curriculum might not be ambitious, trying to accomplish too much. They are thus focused on helping those who are in school to stay in school and succeed, rather than those who have dropped out. Day care facilities, to enable young mothers to continue school, and more student counseling to assist students struggling with the pressures, are the two most often cited needs.

A stable and committed teaching staff was cited as being critical to keeping children engaged in school. While staffing levels appear adequate in most cases (although there are exceptions), there is low teacher retention. Keeping teachers is a challenge almost everywhere in Kivalliq. Many complete a two year contract and then return to the south, while others leave before their contracts expire. Low

retention is most often attributed to isolation and lack of preparedness, as well as a high cost of living which is believed to explain both low retention and difficulties in recruiting teachers in the first place. Schools now inform potential hires that single teachers may find it difficult to meet their costs and some schools prefer to hire teaching couples.

Related, teacher benefits package are thought to be part of the problem. However in Nunavik teachers' benefits packages are much more generous<sup>24</sup> but its schools have not fared better than Nunavut's when it comes to keeping teachers. Rankin Inlet's schools have experienced less turnover and informants suggest that this is because the community has less expensive food and good air transport links to the south. Coral Harbour has Inuit teachers making up half of its teaching staff and this has greatly reduced turn over. The GN and GNDoF are acutely aware that the long term solution to teacher retention is to train more Inuit.

As noted earlier, efforts on these and other fronts would appear to be paying off, although this may not yet be obvious in the census data. Not only are schools in Kivalliq graduating twice as many students as a decade ago, educators are encouraged that many of their graduates intend to continue on to postsecondary training. Rankin Inlet and Arviat educators expect about half their graduates to continue their education, most often at Nunavut Arctic College or Red River College in Winnipeg.

This success is attributed not only to curriculum and teaching improvements, but also to people's experience of Meadowbank and expectations of further development in the mining sector in the future. These are small communities, and most students have a relative or know someone who works for Meadowbank, for the many other companies exploring for minerals in Kivalliq, or for expanding businesses supply the mining companies. There are now enough of these workers that children are seeing alternative livelihoods and lifestyles that some of them would like to achieve. Mining companies have also been active in schools, presenting information and programs that suggest to students that employment is achievable. Finally, there are more postsecondary education opportunities in Nunavut, allowing students to further their education, in ways appropriate to their needs and expectations, inside the territory.

For many mining jobs, a high school education, supplemented with shorter term skill training in particular areas such as heavy equipment operations, is sufficient. However the better and higher paying jobs require formal postsecondary training in such areas as trades and professions. Nunavut

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<sup>&</sup>lt;sup>24</sup> For example, rent subsidized housing is available for as little as \$200.00 a month and teachers get two paid trips home per year.

Arctic College serves the Kivalliq Region through its two campuses in Rankin Inlet and its learning centers in the six other Kivalliq communities. The college offers both skills upgrading training, as well as some trades and professional accreditation. NAC's programs include an emphasis on preparing students for employment in the mining sector, with training for camp cooks, office administration and environmental technologists in 2011/2012. Some of the shorter of these programs are offered in NAC's community learning centers.

There has been a concerted effort to provide more advanced training in Nunavut as an alternative to sending students to the south of Canada. Leaving the territory for educational institutions in the south has not been as successful as hoped as students can have a difficult time adjusting (see Box 4.2-2). Students were abandoning postsecondary training in the south, most often as a result of feeling isolated from family and culture. Students also say they feel less prepared than classmates. In Rankin Inlet, the high school has recognized the importance of following up on their graduates who have gone south to study, to provide support as possible.

#### Box 4.2-2 Education outside Nunavut

- You start to feel you are losing your language when you study outside Nunavut.
- Kids find it hard to go away to school because they feel bad because they need to catch
  up and they miss their families and communities. It would be better to train people in their
  communities but sometimes this is not realistic.
- Some kids don't leave for more education because their parents don't want to let them go.
- Kids have a hard time going away to school. They are embarrassed at having to do catch up classes as they are older than their classmates. They miss their communities.
- Young people are reluctant to leave their communities for work and for schooling family and friends are more important.

Whereas NAC's nurse and teacher training programs had required students to go to Dalhousie and Regina respectively to complete their educations, students are now able to complete all their training in Nunavut. The recent opening of the technical trades training Centre in Rankin Inlet now makes possible full apprenticeship programs for electricians, plumbers, housing maintainers and oil burner mechanics in Nunavut. Expansion of the centre's offerings, and the opening of a similar centre in Cambridge Bay, will allow apprenticeship programs for heavy equipment technicians, automotive mechanics, millwrights and welders to be offered in Nunavut in the near future.

NAC is also a funding partner of the Kivalliq Mining Training Society, whose goal is to prepare Kivalliq people for 280 permanent jobs in the mining sector. Training is in such areas as heavy equipment operation, trades, general laboring, and administrative and technical support. Other funding partners include the GN, KIA, the Aboriginal Skills Employment Partnership Program of the federal government and Agnico Eagle.

NAC's Kivalliq's campuses and community learning centers are seeing increased demand for training. This demand is also coming for a younger population than it has in the past. Unlike southern training programs that see high dropout rates, NAC staff estimate that their success rate with students is about 70%. NAC is funded by the GN, the federal government and private donors.

## 4.2.6 Health and Community Wellbeing

Health, as defined by the World Health Organization, is a state of complete physical, mental and social wellbeing and not merely the absence of disease or infirmity. Community wellbeing is a function of individual wellbeing. As for Nunavut as a whole, Kivalliq is reported to experience severe health challenges, and in general health indicators are acknowledged to be well below those typical of southern Canada. Additionally, in some respects there is concern that, despite some improvements in some health indicators in both Nunavut and Kivalliq, the gap with the rest of Canada may be widening.

There are very little data publicly reported however. This is largely on confidentiality grounds. For example, although lung cancer and domestic violence rates can be high, in small communities it may be only a very few people who have been diagnosed with cancer or have been arrested for spousal abuse. There is also controversy about the wisdom of widely reporting on some health challenges. Thus most of the content of this section is based on the results of informant interviews and focus groups discussions, and to some extent on data available for Nunavut as a whole.

Under the broad definition of health, there are concerns in Kivalliq about such challenges as chronic (including mental) illness and infectious disease; smoking and alcohol and drug abuse; cultural integrity; family function; violent and non violent crime and housing. These concerns are addressed in this section. Other determinants of health, as listed in Section 3.2.3.3, Health (in Nunavut)<sup>25</sup> are addressed in other sections of this baseline, but are referred to as necessary in this section.

There are also concerns in both Nunavut and Kivalliq about contamination of country foods – including radiation levels in caribou from radioactive fallout that occurred during the period of above ground nuclear testing the 1950s and early 1960s. In response, in 1991 INAC established the

<sup>&</sup>lt;sup>25</sup> For reference, these are acculturation, productivity, income distribution, housing, education, food security and nutrition, health care services, quality of early life, addictions, social safety nets and environment.

Northern Contaminants Program, to 'work towards reducing . . . and eliminating contaminants in traditional/country foods'. The program is ongoing (INAC 2010b).

The only health data available for communities in Kivalliq are reported by Statistics Canada on the basis of the Aboriginal Peoples Survey done in conjunction with the national censuses. Data are available for all communities in 2001 and for the five largest communities in 2006. (See Table 4.2-14.)

Table 4.2-14 Health, Inuit Population 15+, 2001 and 2006

	4000	Aiviat	2.00	Бакег Lake		Coral Harbour	Chesterfield Inlet	100	Kankin inlet		Kepuise bay	Whale Cove	Kivalliq		Munavut
	200 1	200 6	200 1	200 6	200 1	200 6	200 1	200 1	200 6	200 1	200 6	200 1	200 1	200 1	200 6
% who say t	heir he	alth is:													
excellent or very good	81	60	51	45	46	56	37	66	50	53	48	59	62	57	49
good	15	30	28	38	38	29	53	26	33	44	40	24	28	33	35
fair or poor	na	11	20	18	16	16	na	na	16	na	15	18	na	10	16
% who saw	or talke	ed on te	elephon	ne abou	ıt physi	cal, em	otional	or me	ntal hea	alth in p	oast 12	month	s to:		
family doctor or general practitioner	21	43	41	31	38	47	42	29	54	34	33	18	31	34	43
nurse	64	74	72	59	62	87	68	71	70	66	70	65	68	58	70
dentist or orthodontis t	34	49	28	36	30	51	37	44	54	41	50	24	35	39	49
other health profession al	30	53	49	29	43	36	68	54	37	50	40	41	46	38	42
long-term he	ealth co	onditio	ns (diag	gnosed	by a p	rofessio	onal)								
%	31	25	42	26	36	31	32	29	34	26	40	38	36	30	37
Source: Stat	tistics C	anada 2	2002b a	and 200	7b										

Although there are not data Kivalliq as a whole in 2006, the community level data (representing over 90% of Kivalliq's Inuit populations) indicate that overall people in Kivalliq saw their health as better than people in Nunavut did in both 2001 and 2006. However, for people in both Kivalliq and Nunavut, the perception was that health has declined over the five year period. The increased percentage of people with diagnosed chronic illness is likely part of the explanation for Nunavut, however in Kivalliq the community data suggest that there were fewer chronically ill people in 2006 than 2001.

Figures 4.2-4 to 4.2-8 were developed from the data on health perception, behaviours and status in Table 4.2-13 to provide some idea of health trends in the five largest communities in Kivalliq – in 2006, Statistics Canada did not report on Chesterfield Inlet or Whale Cove, for confidentiality reasons. It will be seen there are few clear patterns, other than that in most (but never all) communities, perceptions of very good to excellent health declined, and both visits to doctors and chronic illnesses increased, as is the case for Kivalliq on average. There are however no consistent relationships between any of these factors. For example, perceptions of poorer health do not consistently lead to more visits to doctors.

Arviat saw the largest perceived decrease in health condition, as well as the largest increase in visits to doctors – twice the percentage of people saw a doctor in the previous twelve months in 2006 over 2001. As population also grew over this period, more than twice as many people saw a doctor – a heavy increase in demand on health services over a short period. To note however is that despite this, people in Arviat still describe their health as very good to excellent much more than in the other communities.

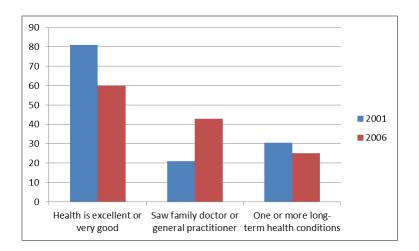


Figure 4.2-4 Arviat Health, %age of Population 15+, 2001 and 2006

In Baker Lake, perceptions of excellent to very good health are low relative to other communities except Repulse Bay. However Baker Lake is also the only community that reported a substantial

drop in visits to doctors. Perhaps as a result, diagnosed chronic illness fell faster than in any other community.

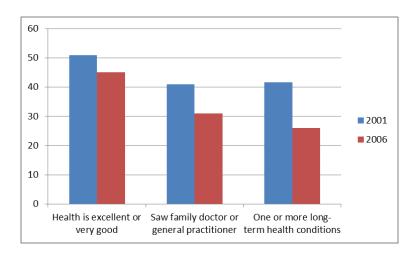


Figure 4.2-5 Baker Lake Health, %age of Population 15+, 2001 and 2006

Coral Harbour results include that this is the only community where more people felt their health was very good to excellent in 2006 than in 2001. Visits to doctors increased, and chronic illness fell, but the changes are not as dramatic as in at least some other communities.

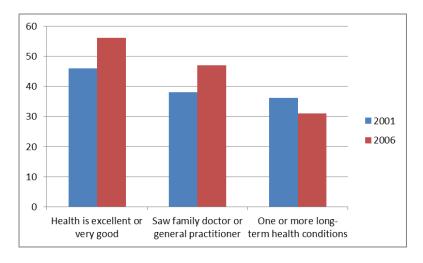


Figure 4.2-6 Coral Harbour Health, %age of Population 15+, 2001 and 2006

In Rankin Inlet, like Arviat, there was an unusually large drop in perceptions of very good to excellent health, and an unusually high increase in visits to doctors. Chronic illness also increased slightly.

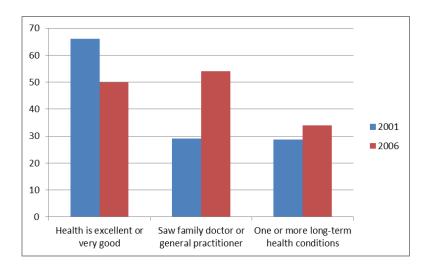


Figure 4.2-7 Rankin Inlet Health, %age of Population 15+, 2001 and 2006

Repulse Bay saw small decreases in perceptions of very good to excellent health and in doctors, but a comparatively large increase in chronic illness. This is the one community where the evidence suggests that chronic illness has increased, rather than there being just more diagnoses of chronic illness.

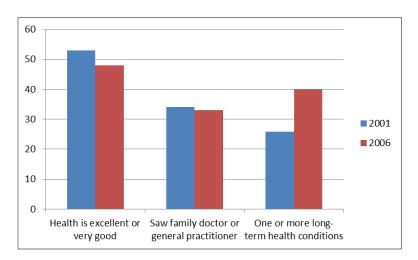


Figure 4.2-8 Repulse Bay Health, %age of Population 15+, 2001 and 2006

Perceptions of health are obviously much more than simply a function of incidence of chronic illness. As well, perceptions of poor health do not necessarily lead to more visits to doctors. Health is perceived much more broadly, more holistically, by most people – the Inuit understanding of health determinants make this clear. Variability between communities with regard to a myriad of factors, including activity on the land, economic opportunity and environmental conditions<sup>26</sup> will produce unexpected variability for three very basic health indicators.

Reference can be made to Section 3.2.3.3 for health trends in Nunavut, most of which – with some variations – can be considered to hold true for Kivalliq. A largely qualitative discussion on health and community wellbeing challenges in Kivalliq and its communities is presented below.

#### 4.2.6.1 Disease

Kivalliq's communities do not differ significantly in terms of the types of common illnesses seen by health care staff. Flu and respiratory problems are most common. Anaemia cases occur, often in young pregnant women, and are sometimes attributed to changes to traditional diets. Seal and polar bear are rich in iron. Instances of vitamin D deficiency are also ascribed to less eating of country food.

Sexually transmitted infections are reported to be of less concern than the figures for Nunavut as a whole would suggest. HIV has not been reported in Kivalliq region, and syphilis not common, but chlamydia is seen frequently.

Infectious disease outbreaks are too frequent. Periodically, there are outbreaks of respiratory syncytial virus and methicillin resistant staphylococcus aureus. Both managing care of the ill and containing the diseases are difficult where the circumstances are overcrowded housing and/or constrained water supply. It was for example suggested that the piped water supply in Rankin Inlet, which ensures availability of water for frequent hand washing at all times, has contributed to limiting outbreaks in this hamlet. Recent outbreaks of tuberculosis have been alarming, also attributed to poor housing standards.

<sup>&</sup>lt;sup>26</sup> For example, people in Baker Lake are worried about the hamlet landfill.

Health care staff reports seeing recent evidence of increasing levels of diabetes and other metabolic disorders. There are abundant data to demonstrate that country food, and the active lifestyle its harvesting implies, are protective factors against diabetes and the life threatening complications of diabetes. People say that particularly for the young, heavily advertised and comparatively cheap fast food – from franchise operations in some communities and from grocery stores – is more accessible than country food. Both health care staff and people give high importance to increasing recreational opportunities for the young to combat sedentary lifestyles, particularly facilities that can be used in winter months.

Health care staff and people are very aware that psychological disorders, if not clinical mental illness, are common. Diagnostic challenges make it difficult for health care staff to talk confidently about incidence. The lack of capacity to diagnose and treat in Kivalliq, or often in Nunavut, is of concern. It is often observed that suicide is not the problem in Kivalliq that it is in Nunavut, this does not mean that rates are not high by Canadian standards (WG-S, 2009) or that suicide prevention programs are not needed. Anecdotal evidence suggests frequent successful and attempted suicides in very recent years in Kivalliq.

Injury rates are also considered to be high. Often alcohol is said to be a factor, however racing snow machines over ramps and rough terrain is a new recreational activity that is increasingly being taken up.

# 4.2.6.2 Alcohol and Drug Abuse

Rapid cultural change is well documented as a determinant of negative social behaviors, for example, alcohol and drug abuse, domestic violence and suicide, in northern communities (Curtis et al., 2005; Bjerregaard, 2001; Shepard and Rode, 1996). In a space of about 50 years, the Inuit have gone from subsistence livelihoods on the land into settlements and residential schools, and have been faced with a need to function in a mixed economy, often using a new language and new technologies.

Gambling might also be considered a negative behavior where it is not well controlled. Leadership in Arviat cancelled bingo in the weeks preceding Christmas in 2009 in the hopes that people would spend more money on gifts for their children. There are however successful gamblers in some communities, people who make their livings playing card.

Abuse of alcohol and drugs has negative effects on all of economic, social, cultural and health outcomes. A prohibition on alcohol has in some instances been shown to be correlated with decreases in other negative social behaviours in the north (Wood and Gruenewald, 2006). Kivalliq communities determine their own alcohol control programs – in all of Kivalliq's communities alcohol is either controlled through various means or banned completely. There however may be an association between difficult access to alcohol and increased use of drugs. Drugs are in principle

easier to transport, including by rotational southern workers at Meadowbank, and are sometimes available over the internet, through Canada Post. Prohibition also often means that alcohol is still available but at a very much steeper price.

RCMP officers across the region note that alcohol has for some time been a contributing factor in most of the instances requiring their intervention. While drugs may lead less often to violence, both alcohol and drug abuse have other effects. Children may not be adequately cared for, there is less money for food, and people including children can be unable to work or go to school the next day. Health care staff report that accidents and injuries are often correlated with alcohol and drug abuse.

People say that substance abuse occurs across all age categories, including children as young as eight years old. It is noted that virtually all of this is reported to be alcohol, marijuana or hashish. No RCMP post spoke of a general increase in the availability or use of other, harder drugs. Although there have been instances of crack, crystal meth and prescription drugs appearing, these drugs are understood to be much less prevalent than in the south of Canada. The RCMP say they are watchful – increasing disposable incomes and the high drug cost differential between northern and southern Canada provide both the market and the incentive to sell for a broader trade in drugs.

There is no consensus on whether or not alcohol and drug abuse has increased in Baker Lake (or other communities) as a consequence of Meadowbank.

# 4.2.6.3 Cultural Integrity

The evolution of Inuit culture in Kivalliq is of consuming interest to all. Of specific interest is the potential effects on culture of widening opportunities in the wage based component of the mixed economy. Research in the north on traditional activities, rooted in subsistence needs, suggests that important intergenerational relationships and roles (Collings, 2005; Wenzel, 1995) and the continuity of ecological knowledge (Nuttall, 1998) are founded on the organization and practice of subsistence living. The practice of traditional culture ensures strong feelings of identity and is a means toward social cohesion. Wenzel concludes that subsistence living is about more than meeting needs for food and shelter – rather it is a powerful ideology that contributes to the structure of society, leadership and moral authority. Finally, traditional activity more recently continues to be an integral part of the social safety net.

Changing patterns of subsistence thus in turn change social relationships, roles, knowledge bases, and livelihood security. Clearly, patterns of subsistence have changed over the last 60 years in Kivalliq. People in the 'settlement generation' of Inuit, born and raised in communities, have a different set of economic constraints than their parents did. The oldest of those born in communities are now in their late 40s, and many were sent to residential schools. Residential schooling had many devastating effects, most related to preventing young Inuit from acquiring important traditional knowledge and skills. Elders in Chesterfield Inlet, for example, felt that children from other

communities -- who were sent to the Nunavut's first residential school which opened in Chesterfield Inlet in 1952 -- were disadvantaged because they had less opportunity to be educated in the ways of hunting by their parents and grandparents.

New technologies – snow machines and outboard motors notably – were introduced in the 1960s. These were adopted for traditional activity on the land but ultimately encouraged reliance on wage employment to pay for and run. In the 1970s and early 1980s, the declines in fur markets – initially a collapse in the market for seal skins and subsequently the steady decline in the market for musk ox pelts – meant that hunting and trapping as a full time economic activity was no longer as possible for as many people, in light of cash needs. This in turn increased people's reliance on social assistance programs for cash (Collings, 2005).

Wage labour and the consumption of mass produced goods are now the daily realities for most Inuit. Traditional activities such as hunting and fishing continue to be important for most people in Kivalliq. Such activities have monetary value insofar as they represent a way to displace spending for food. Collings (2005) observed that Inuit men tend to define their worth based on their ability to provide harvested food to others. Wage employment is not perceived to have the same cultural value, even though wages are increasingly necessary to hunt. Traditional culture thus is a non monetized system of production and exchange in which social as well as economic values are expressed. However country food is rarely sold and does not generate cash – an elder interviewed wryly suggested that 'the Inuit don't need jobs, they need income'.

The cultural imperative to hunt and the financial imperative to earn money to enable hunting would be challenging to reconcile under many circumstances, but more so in an environment of few jobs. This is yet more difficult a situation for young males, whose recent unemployment rates approach 40% (GNBS, 2011a). Additionally, many Inuit much prefer to remain in their own communities --wages are not as valued as living close to family and moving to find employment removes them from familiar hunting territory – thus it is not just if jobs are available but also where they are available that is of relevance.

Community and family ties are sustained by the values of reciprocity and sharing, manifested by regular exchanges, including of goods (country food, but also sharing of equipment for example) and of gestures of emotional support. For example, in Chesterfield Inlet ceremonies are held to honour a young person's first catch. Community wide grieving following death is another manifestation of these community ties. Community feasts, on special occasions and in the event of unusually high harvests, are frequent events in all communities. Focus groups and interview results suggest that the production and exchange of country food have consumption value, but are very importantly cultural activities vital to the survival of Inuit tradition and the wellbeing of people and communities.

Such ties are of enormous benefit, as noted above. However, expectations of reciprocity can be inconsistent with individual goals and in some socio-cultural settings individual goals may be

inappropriate relative to the needs of families and other social obligations. Where social ties dominate personal and public life, individuals can feel that obligations are inhibiting the achievement of personal wellbeing. Both parents and their children spoke of lack of parental commitment in seeing high school graduate leave the community for postsecondary schooling. Young adults spoke of essentially hiding goods in order to keep them or, as a different strategy, turning down employment because of the need to share so much of their wages.

People also noted that family and other social ties that are not community wide can lead to exclusion and segregation. In some Kivalliq communities, hamlet and government jobs are reported to be dominated by a single family or a network of families and friends. Perhaps out of obligations arising from reciprocal relationships, variations on the theme of 'jobs here are passed down' were spoken of. Meeting obligations was entirely functional when people congregated in small fluid groups, were mobile and relied on harvesting. This is in some cases less appropriate in an environment where people are settled, are in large communities as compared to the past, and are operating in an economic context that demands a broader range of specialized skills in its workforce.

The Inuit no longer live on the land and the culture has evolved. As noted above, reactions to this fact are broad ranging. Most people recognize that there is no going back and want to focus on understanding how better to manage change. There is less agreement on what management of change implies in detail with regard to, as examples, wage employment, language of instruction in schools, environmental conservation and community wellbeing. Communities are affected, through widespread negative social behaviours and their consequences, but families are also struggling.

The notion of family among Inuit is said to be broader than just blood relations. Families also have members who are related through personal relationships, whether hunting partners, children taken into care for any number of reasons, or other people who become very close. There is no typical family. There are however, almost universally in all families, elders and youth, and men and women. Challenges in dealing with cultural change seem most strongly evident in newly difficult relationships as compared to a past when generations shared the same world and gender roles were more fixed and achievable.

Many elders are certain in their convictions that the young cannot live as they did in the past and must get educated and find wage employment. There is however significant discomfort with the erosion of traditional culture as this is manifested in growing lack of understanding between the worlds of elders and youth (see Box 4.2-3). Some elders suggested that many of the issues challenging the young, such as boredom, alcohol and drug abuse and low educational achievement, would not be as challenging if traditional values were stronger. The young remain, by and large, remain close to their families and respect their elders. However, while some expressed commitment to traditional culture, others said that traditional skills and values are not as relevant to the challenges in their lives as elders sometimes think they are – that the young need to learn to do things that will help them take up modern day roles and responsibilities.

## Box 4.2-3 Intergenerational Relations

- The big generation gap is between young adults and their grandparents who 'worked harder than anybody' when on the land, not between young adults and their mothers.
- Parents and grandparents are putting more pressure on kids to finish high school now.
- Kids today are recognizing their parents and grandparents cannot fix everything, cannot know everything. Kids turn to technology instead of elders for teaching.
- Youth want to keep their language and traditions, and pass these on to their kids but sometimes there is not enough time or enough money.
- Elders are finding it hard to talk to the young about the new things the young are interested in, which they don't really understand. Parents also have a hard time understanding their kids and need help with parenting.
- Grandparents are active with their grandchildren but some find it hard to speak plainly about problems.
- Some people are caught between traditional parents and modern kids, who really want and depend on a lot of material possessions.
- Youth are feeling pressured because they are supposed to learn English, go to school and get jobs and maintain tradition it is too much.
- Suicides may be getting more frequent as intergenerational relations get more complicated.

Traditional livelihoods also depended on gender roles, although there are many examples of women taking men's places in male roles where this has been necessary. A few people suggested that the exceptionally high rate of male suicide, which in Kivalliq is 10 times that of females (WG-S, 2009), is related to an inability to fulfill what is still widely held as the role of a man – providing. A man can harvest, or he can work at a job, but in a world when the two are interlinked (in the absence of a job harvesting can be less achievable) some are unable to do either. And where a man is unable to do either, he may feel there is little place for him in the family or society.

There is more certainty about the social roles for women, who take care of children. It was suggested that in the context of Kivalliq, having children is the one area that a young women knows she can succeed at and that this may be part of the explanation for the observation that many young girls get pregnant before finishing high school.

Perceptions of gender roles persist. However, as men find it harder to provide and as women are increasingly more successful at school and in employment, stresses can be expected (see Box 4.2-4). Health care and police staff are uncertain whether, where there have been observed increases in domestic violence, these are actual or a result of raising the profile of the issue, inducing more reporting. Both also acknowledge that particularly alcohol is a factor in domestic violence. The frequency with which particularly younger adults spoke of issues related to jealousy is indicative of marital stress. Rotational work has, in some people's views, exacerbated problems for some.

#### Box 4.2-4 Gender

- Women are considered as property. Many believe that it is a woman's role to submit to what men want.
- It is easier for girls than boys to finish high school because boys can't concentrate and are in a hurry to earn money. Boys need more help than girls to get through high school.
- The duty of a father is to pass skills on to sons and a man will only teach his daughters to hunt if he has no sons.
- Women don't trust their men around other women, so it is hard for a man to work where there are other women.
- Men don't want their women working at remote sites and living in camps because there
  are too many other men around.
- Many male suicides are linked to sexual assault of female family members. Suicide is not talked about but everybody within a community knows when someone commits suicide anyway.

Retention of Inuktitut is also fundamental to cultural integrity and thus individual and community wellbeing. Elders in particular are concerned that Inuktitut is being lost and the young are less interested in maintaining Inuktitut as their primary language, or worse, that there will be a loss of bilingualism in favour of English. The data suggest that language retention is better among the Inuit in Nunavut than among most other Aboriginal groups in Canada.

However there are some signs of erosion. There remain fundamental questions about the extent to which English speakers exert economic and political control Nunavut and the extent to which English becomes the dominant language as a consequence. Language can be viewed as a resource that is used, purposefully or not, to entrench the power of one group over another and thus one language over another (Dorais, 1989).

There are a number of drivers affecting use and maintenance of Inuktitut, both positive (language of instruction in primary schools for example) and negative (southern media influences for example). However, English is taking hold in the two important domains of secondary schools and postsecondary education and training school and of work. English does appear to be the dominant language in Baker Lake and Rankin Inlet.

#### 4.2.6.4 Crime

Data on crime rates is in Table 4.2-15. There is high variation between communities and between years, particularly for violent crime. Nevertheless, overall, the rates are many multiples of the Canadian rates, which were 6.1 per 1,000 people for total crime and 1.3 for violent crime in 2009. It is also noted that drug crimes, included in total crime in the table below, are also much higher than in Canada.

Table 4.2-15 Total and Violent Crime Rates (per 1,000 people)

	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
Total Crime					•	•			•		
Arviat	107	121	152	108	96	124	189	183	146	134	158
Baker Lake	84	158	127	177	239	203	151	172	158	150	162
Chesterfield Inlet	n/a	n/a	n/a	n/a	95	98	116	135	157	142	186
Coral Harbour	84	90	104	168	152	272	142	75	137	127	153
Rankin Inlet	194	241	416	293	323	458	351	286	337	353	389
Repulse Bay	n/a	n/a	n/a	148	175	95	52	42	97	144	114
Whale Cove	n/a	n/a	n/a	n/a	67	189	121	125	54	196	268
Kivalliq	108	140	193	174	201	248	205	183	194	203	226
Violent Crime											
Arviat	46	53	59	39	38	30	53	73	55	51	58
Baker Lake	34	80	43	71	83	72	66	66	45	52	46
Chesterfield Inlet	n/a	n/a	n/a	n/a	28	55	34	29	45	42	85
Coral Harbour	34	36	44	63	35	78	49	34	56	55	55
Rankin Inlet	59	82	126	120	87	108	75	64	73	64	66
Repulse Bay	n/a	n/a	n/a	62	60	28	19	14	15	45	53
Whale Cove	n/a	n/a	n/a	n/a	26	68	58	49	32	74	106
Kivalliq	38	56	64	69	62	68	58	57	53	55	60

Source: GNBS, 2011c

Note: 2009 data are not comparable to other years because of a change in reporting standards.

The community level data are too variable to discern patterns however at the level of the region as a whole, an upward trend may be observed in total crime (see Figure 4.2-9). Violent crime is staying flat however. It is noted that Kivalliq's crime rates, and those of six of its communities in all years, are substantially lower than rates for either of the other two regions, or for Nunavut as a whole. The exception is for total crime in Rankin Inlet.

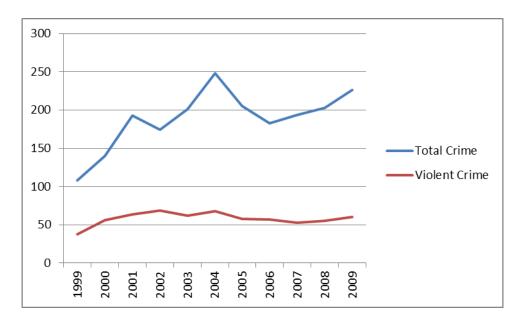


Figure 4.2-9 Crime Rate Trends

Figure 4.2-10 shows average crime rates over the period 1999 to 2009 for each community. As people in communities say, the smaller, more traditional communities are have relatively less crime than Arviat, Baker Lake and particularly Rankin Inlet where total crime is about double of that in Arviat and Baker Lake.

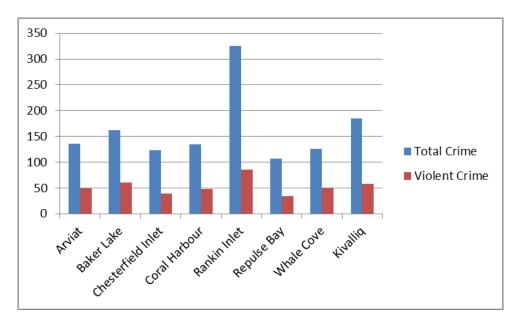


Figure 4.2-10 Average Crime Rates

## 4.2.6.5 Housing

Housing shortages are a widespread and persistent problem in the Nunavut. There is a need for more housing to ease overcrowding, replace substandard housing and accommodate growing populations. The most basic problem is the high cost of construction and maintenance of units. Home ownership was encouraged as early as 1972 by the Northwest Territories Housing Corporation, which was charged with managing housing. But the nature of the northern economy, where wage labour is scarce and often seasonal, makes home ownership out of reach for most people.

So the basic system of housing delivery has remained unchanged – residents apply to the local housing office and are either assigned, or placed on a waiting list for, social housing. Increasingly, waiting lists are the norm. Rent is assessed on ability to pay. High income earners, however notionally able to pay, may have many dependents. Social networks and kin obligations can result in substantial redistribution of income from wage earners to extended family members. There is some dismay that under these circumstances, a member of what might be a very large family can see a rent increase of up to more than tenfold on finding employment.

The quality and availability of housing varies by community. Some, such as Chesterfield Inlet, see their housing situation as good compared to other communities. At the other extreme, Arviat has an acute shortage and crowding problem – a six year wait for a family and a 14 year wait for a single person.

A noted earlier, substandard and/or overcrowded housing has enormous health and wellbeing consequences, as well as effects on children's schooling. There can also be economic effects – the shortage of housing can make it difficult to recruit employees (CBoC, 2001).

Table 4.2-16 presents data on housing in Kivalliq communities. The situation in Kivalliq is somewhat worse than for Nunavut as a whole. In 2010, 59% of houses were social housing, 25% were privately owned and almost all of the rest were staff houses provided by public and private sector employers (GNBS, 2011d). Housing conditions are however poor – 56% of houses are overcrowded and/or in need of major repair. People however are somewhat less dissatisfied with their housing – just over 40% would move if they could.

Table 4.2-16 Housing Characteristics (2009)

				Renters	s (%)		Crowded	Dwellings	D
	Dwellings (no.)	Owners (%)	Social Housing	Staff Housing	Private Housing	Other	and/or in Need of Major Repair (%)	with Temporary Residents (%)	for Housing (no.)
Arviat	490	27	59	12	0	2	64	20	310
Baker Lake	530	23	68	4	4	n/a	53	24	220
Chesterfield Inlet	100	20	70	0	0	0	54	31	50
Coral Harbour	180	22	67	0	6	6	60	34	70
Rankin Inlet	740	31	43	18	4	4	46	37	220
Repulse Bay	170	12	71	12	6	0	76	31	100
Whale Cove	90	22	67	11	0	0	61	43	50
Kivalliq	2,310	25	59	11	3	2	56	30	1,030
Nunavut	8,550	22	51	20	4	3	49	32	3,580

Source: GNBS, 2011d

Note: Data in bold are considered unreliable by GNBS.

The housing situation is particularly bad in Repulse Bay, where there is also the highest dependence on social housing. Arviat's numbers are not as bad as percentages, however the large size of the community means that there is the most demand for housing here, accounting for almost a third of all demand in Kivalliq. Predictably, Rankin Inlet has less social housing, housing in the best condition and the least demand for new housing as a percentage of total units.

The demand for housing can only continue to increase as the population grows and ages – more people will decide they want to live in their own houses rather than with families. Compounding the general lack of housing is the growing need for housing for special needs people such as elders and the disabled.

There is some expectation that with high employment in Baker Lake, demand will increase for privately owned housing. There is no evidence of large demand developing quite yet, however it is clear from focus group discussions that people are considering this option, especially in light of the rent increases that are a consequence of employment. Construction work is not permanent – it may be that as the operations phase of Meadowbank establishes itself, and people become more confident about secure employment over the long term, they will choose to move into private housing. This should free up some social housing. However, high construction costs mean that

private houses in Baker Lake are comparatively expensive and may be out of reach for many with lower paying jobs and non-working dependents.

## 4.2.6.6 Summary

Community wellbeing is a function not only of the subcomponents described above, but of other many other factors as well. It is also evident from engagement results that people's perceptions and experiences of community wellbeing are quite variable. To come to conclusions about overall wellbeing, or even trends, in different communities in Kivalliq, or in Kivalliq as compared to the rest of Nunavut is very difficult. INAC has attempted this (see Table 4.2-17) although many people will find the results quite unsatisfying. Very important determinants of a sense of wellbeing in Nunavut, such as the state of the environment and integrity of traditional culture are not included for example.

Table 4.2-17 Community Wellbeing Index, 2006<sup>27</sup>

				Score	е	
	Population	Income	Education	Housing	Labour Force	Overall Wellbeing
Arviat	2,060	64	26	58	73	55
Baker Lake	1,728	67	30	63	76	59
Chesterfield Inlet	332	75	33	67	84	65
Coral Harbour	769	59	29	77	80	61
Rankin Inlet	2,358	83	40	77	86	71
Repulse Bay	748	52	18	50	68	47
Whale Cove	353	63	21	65	74	56
Iqaluit	6,184	96	55	85	89	81
Source: INAC, 201	1	ı	1		L	1

<sup>&</sup>lt;sup>27</sup> INAC has developed the community well being index as a means of examining the well being of individual Canadian communities. Various indicators of socio-economic well-being (measures of education, housing and labour force activity), were derived from Statistics Canada census data and combined to give each community a well being score.)

## 4.2.7 Work in the Wage Economy

## 4.2.7.1 Employment

Employment data are available at the regional and community levels only from national censuses. Table 4.2-18 below provides some indication of changes in labour force characteristics in Kivalliq between 2001 and 2006. The labour force had grown by about 17% (as compared to population growth of less than 11% over the same period). While unemployment rates had gone down, the participation rate had also decreased, indicating discouragement in looking for work rather than economic improvement between 2001 and 2006.

Table 4.2-18 Kivalliq Employment, 2001 and 2006

	2001	2006
Labour Force	2,775	3,240
Participation Rate	66.9	61.7
Unemployment Rate	18.6	15.7
Labour Force	2,775	3,240
Source: Statscan, 2002a and 2007a		

By 2006, Kivalliq's employment situation appeared similar to that in Nunavut as a whole – unemployment rates were comparable, at 15.7% in Kivalliq and 15.6% in Nunavut. However, participation rates were lower in Kivalliq (and lower than they are now), again a signal that high unemployment had discouraged people from looking for work.

Because the census data are from 2006 they are not expected to accurately reflect the employment situation in Kivalliq as it is in 2011, substantially improved it is thought by the upswing in mining exploration and the construction and operations of Meadowbank. However the data do provide an idea of differences between Kivalliq and the rest of Canada, between communities and between genders that, with some exceptions, likely persist. Full data are in Table 4.2-19.

Table 4.2-19 Employment and Income, 2006

		Arviat		В	aker Lak	æ	Che	sterfield	Inlet	Co	ral Harb	our	Rankin Inlet		
	All	М	F	All	М	F	All	М	F	All	М	F	All	М	F
Participation rate	49.8	52.5	47.6	59.2	61.5	55.1	74.4	71.4	77.3	66.7	71.1	62.5	71.7	72.3	71.4
Unemployme nt rate	13.0	15.6	8.5	18.9	25.0	11.9	15.6	26.7	11.8	19.4	18.8	20.0	10.2	11.3	9.1
Median earnings, persons 15 years and over (\$)	26,04 8	31,16 8	22,97 6	15,01 9	15,32 8	13,98 4	20,03	20,28 8	18,24 0	10,78 4	10,96 5	10,49 6	32,73 6	34,68 8	32,02 6
Median income, persons 15 years and over (\$)	15,20 0	14,68 8	16,09 6	15,90 4	15,23 2	16,51 2	21,18 4	22,84 8	19,64 8	14,02 9	12,48 0	15,10 4	26,38 9	26,17 6	26,88 0
Composition of	of total in	come (1	00%)												
Earnings, as % of total income	81.2	87.6	74.8	79.6	86.0	71.1	82.8	82.8	82.7	74.9	78.1	70.3	90.4	93.6	88.4
Government transfers, as % of total income	17.3	10.7	23.8	19.4	12.4	26.7	12.3	11.6	13.8	21.1	14.8	26.8	7.5	5.0	10.4
Other money as % of total income	1.2	1.3	1.1	1.2	0.8	1.7	5.3	8.1	2.7	3.6	4.3	2.9	1.8	2.0	1.5

Table 4-2-19 Employment and Income, 2006 (continued)

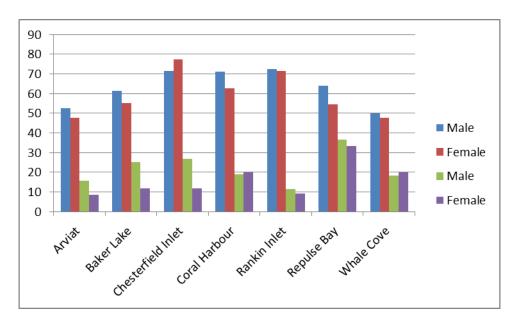
	R	Repulse Bay			Vhale Cov	/e		Kivalliq		Nunavut		
	All	М	F	All	М	F	All	М	F	All	М	F
Participation rate	61.1	63.8	54.5	47.6	50.0	47.6	61.7	63.7	59.5	65.3	67.9	62.6
Unemployment rate	34.5	36.7	33.3	10.0	18.2	20.0	15.7	18.9	12.3	15.6	17.8	13.0
Median earnings, persons 15 years and over (\$)	11,982	11,992	11,840	24,992	21,824	26,048	23,232	24,040	21,909	26,848	29,235	24,973
Median income, persons 15 years and over (\$)	10,912	11,264	10,464	16,352	15,328	19,520	17,440	16,832	17,760	20,982	22,552	20,047
Composition of total income	(100%)	•			•					•	•	
Earnings, as % of total income	71.7	80.8	62.3	80.7	92.8	72.6	84.1	88.9	78.9	86.5	90.0	82.3
Government transfers, as % of total income	26.3	16.7	36.3	17.1	10.4	26.1	14.2	9.2	19.6	11.2	7.4	15.8
Other money as % of total income	1.9	1.8	2.0	0.1	0.1	0.1	1.8	2.0	1.6	2.3	2.6	1.9
Source: Statscan, 2007a	ı	1	ı	ı	1	ı	ı	ı	ı	1	1	1

Table 4.2-20 compares Kivalliq's participation and unemployment rates with Nunavut and Canada. To note is that participation rates are on average lower, but within 4% to 5% of those in Nunavut and Canada and unemployment rates are more than twice as high in both Kivalliq and Nunavut than in Canada. What is more interesting is that overall, women are less likely to be in the labour force in Kivalliq and much more likely to find work once they enter the labour force.

Table 4.2-20 Comparison of Kivalliq's Participation and Unemployment Rates, 2006

	Participation	Unemployment
Kivalliq		
all	61.7	15.7
male	63.7	18.9
female	59.5	12.3
Nunavut		
all	65.3	15.6
male	67.9	17.8
female	62.6	13.0
Canada		
all	66.8	6.6
male	72.3	6.5
female	61.6	6.6
Source: Statscan, 2007a		

Figure 4.2-11 presents similar data at the community level. Whereas on average in Kivalliq participation rates approached rates in Nunavut and in the rest of Canada, there were very large differences in rates between communities. Within Kivalliq rates varied between Chesterfield Inlet at over 70% and Whale Cove at under 50%. There is no obvious difference between communities that are often described as more traditional and those that are not – for example, Chesterfield Inlet had a very high participation rate, higher than Rankin Inlet. Participation rates are therefore considered to be in large part a function of the prospects of finding employment, not simply a function of a desire or need to work. Repulse Bay, with a comparatively high participation rate despite an extraordinarily high unemployment rate, appears to be an exception. However Repulse Bay was one of the two poorest communities in Kivalliq (hence the need to work may play a more important part). Repulse Bay also had a small number of full time/full year jobs – there was one full time job for every six people in the working age population, as compared to a regional average of one job for every three people. Seasonal workers are more likely to be in the labour force, but unemployed.



Note: Columns on the left (blue and brown) are participation rates, and on the right (green and purple) are unemployment rates

Figure 4.2-11 Employment, Gender Differences, 2006

Differences between communities were also much larger than differences between genders. With the exception of Chesterfield Inlet, women were slightly less likely to be in the workforce than men, which is expected.

All communities, including Rankin Inlet, had high unemployment rates compared to Canada with an unemployment rate of 6.6% in 2006. Rates varied from Rankin Inlet's low of 10.2% to Repulse Bay's high of 34.5%. Women's unemployment rates were equally as variable between communities, but with the exception of Whale Cove were less than men's and in some case such as Baker Lake and Chesterfield Inlet, women were half as likely to unemployed as men. It is noted however that recent employment, particularly of men who find rotational mining work more possible, has certainly redressed some of the gender imbalances in employment in the table.

Table 4.2-21 presents data, also from 2006, on types of employment. Less than half the people in Kivalliq who worked in the previous year worked full time for a full year. This is comparable to the number for Nunavut (48.4% worked full year, full time) and only slightly less than for Canada (50.9%). However, again there are larger differences between communities. In Coral Harbour and Repulse Bay just over 30% worked full time, full year) as compared to Arviat and Rankin Inlet where almost 60% did. These figures need to be interpreted in relation to the number of people in the working age population. In Arviat for example 56% of people who worked were in full time, full year jobs, however less than 50% of the working age population worked. In Coral Harbour, the reverse is

the case – few people worked in full year, full time jobs but a lot of people worked. Repulse Bay was particularly challenged – few people worked and of those that did, few worked full year, full time.

Table 4.2-21 Employment by Sector

		People with Earning	ys .	Employment Sector (% of experienced workers)					
	Number	% of 15 Population	% FY/FT	Primary	Secondary	Tertiary			
Arviat	615	49.8	56.1	1.5	6.6	92.0			
Baker Lake	700	62.8	40.0	7.3	8.1	84.6			
Chesterfield Inlet	175	63.6	40.0	0.0	6.5	93.5			
Coral Harbour	310	66.7	30.6	6.9	12.1	81.0			
Rankin Inlet	1,170	74.5	59.4	2.3	7.8	90.0			
Repulse Bay	235	52.2	31.9	6.5	6.5	87.0			
Whale Cove	125	59.5	44.0	10.0	10.0	80.0			
Kivalliq	3,325	63.3	48.4	4.1	4.7	91.2			

Source: Statscan, 2007a

Notes: % FY/FT is the percentage of people with earnings who worked full time, full year.

The table also provides some information on sector of employment. Statistics Canada groups type of employment into ten industries: 'Agriculture and other resources based industries' (which would include mining) makes up the primary sector. 'Construction' and 'manufacturing' make up the secondary sector. Seven other sectors make up the tertiary (or services) sector, one of which is 'other services'. This other services category is undefined, typically accounts for about one third of total employment in Kivalliq communities, and is by far the largest of the seven sectors that make up the service economy. In all Kivalliq communities, the largest fraction of the employed is delivering government, retail and other services. The tertiary sector accounts for 90% of jobs, on average for the region.

With development of the mining sector, people talk a lot about employment. Box 4.2-5 provides some of what was said. Overall, comments focused on the need for employment at least for those who want to work, and the challenges of working in a white environment can imply. The relationship between increased incomes and alcohol and drug abuse were less raised by Inuit in focus groups discussions than they were by interview participants. The range of comments on employment was very broad. Some people need to work and some people want to work. Some are more interested,

some are less interested, and some are not interested in wage employment but most see the tradeoffs. It is clear from some of the comments that people recognize and accept these differences.

#### Box 4.2-5 Employment

- The important thing is for people who want jobs to have jobs.
- People need to think what the future will be like if there are no jobs for youth.
- Two incomes are now needed to live reasonably.
- People usually find out pretty quickly if the work does not suit them, and quit in a couple of days.
- Some people are motivated to work and are accustomed to working and then there are others who are not.
- People need to know that there is someone at the work site that they can trust and rely on to help them the Inuit are not comfortable to talking to strangers about their difficulties.
- Cultural differences cause problems supervisors get suspicious when Inuit smile (which
  is the Inuit way) and speak Inuktitut.
- The employed can afford vehicles, and can afford to build houses out on the land without income getting out to the land is more difficult.
- The Inuit understand that things are changing that they can no longer depend only on the land and that they are 'stuck' in communities.
- Providing for the family now means making money and wages are shared with parents, siblings and other family members.
- The economy has already changed so much that people feel they must get a pay check
  to live reasonably; that they can't really participate the way they want to in community life
  unless they have money.
- Some people have lived with the rest of Canada's denial of Inuit identity and culture their whole lives – it is hard to move from such a powerless place to take advantage of new opportunities.
- Fears about increased alcohol and drugs abuse with employment are overblown, it hasn't
  happened (in Baker Lake and in Rankin Inlet) where most people are very nice people
  who just want to hold down their jobs and go about their business.
- Even if mining companies hire people with no history of substance abuse, some will start using because they have more money.
- People who already have drug or alcohol problems when hired, will likely show escalation in problems. People without drug or alcohol problems when hired are not likely to start.

There was more unanimity on the part of people who were working full year, full time in the mining sector, whether for Agnico Eagle or its suppliers. Their comments are in Box 4.2-6. These are of course people who have been successful at adapting to wage employment, and have as a result stayed employed. As for people more generally, all acknowledged that the experience has not been totally positive and that they have had to make tradeoffs in order to continue working. But they were eloquent in what they feel they have gained.

### **Box 4.2-6** Experience of Employment

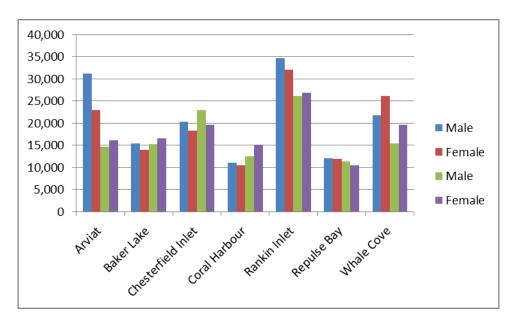
- We feel differently about ourselves from having jobs:
- have been able to earn and save money and spend it wisely
- are happier and less stressed (no bills) and so are spouses and kids
- met lots of new and interesting people (including from the south)
- learning a lot on the job
- known and respected in town
- more self-confident and able to solve problems
- more independent and able to do what is right

## 4.2.7.2 Earnings and Incomes

Table 4.2-21 also includes data on earnings and income. There are more recent data at a community level for incomes in Kivalliq on a yearly basis between 1999 and 2008. These data are culled from tax returns by Statistics Canada, and are reported by GNBS (2011c). Both data sets are of interest for different reasons.

The Statistics Canada data provide a perspective on differences between earnings (money paid in return for labour) and income (which includes not just earnings but all other payments made to individuals, for example government transfers, child support, inheritances, etc.)

Overall, as the data in the table show, Kivalliq people had lower median earnings (10% lower) and income (24% lower) than Nunavut. (In Nunavut, median earnings are the same as in Canada, but incomes are about 20% lower). Figure 4.2-12 shows median earnings and incomes for males and females in Kivalliq communities. Earnings were generally higher than incomes. The calculations of medians use different populations – people who have earnings and people who have incomes respectively. More people have incomes than earnings, and their incomes come predominantly from government transfers, which are lower than earnings generally. This drags down median incomes.



Note: Columns on the left (blue and brown) are earnings, and on the right (green and purple) are incomes. Data are for the year 2005, the full year before the census.

Figure 4.2-12 Median Earnings and Incomes, people 15 years and over, 2005

Again, the differences between communities and genders are much greater than between Kivalliq and elsewhere. Earnings in Rankin Inlet were twice as high as in Coral Harbour and Repulse Bay. Incomes (which factor in earnings) were also highest in Rankin Inlet. With the exception of Whale Cove, men have higher earnings than women but generally lower incomes. This is explained by women's lower earnings and much higher dependence on income support – at the regional level women see twice as much income coming from government transfers as men do.

The tax file data provide some insight into year to year changes in median income over the last decade. The data are in Table 4.2-22. The data confirm that incomes are lowest in Coral Harbour and Repulse Bay, and in Coral Harbour have grown much more slowly than any other community in Kivalliq. It is noted that the data are in constant dollars – the inflation rate in Canada has been about 23% over the decade. Median income in Coral Harbour, as well as in Repulse Bay and Arviat, has risen more slowly than inflation.

Table 4.2-22 Income

	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	Change 1999 to 2008
Median Incom	ie, \$	•	•	II.	1	•	•	II.	II.	1	•
Arviat	15,000	14,100	16,600	16,200	16,700	16,700	19,500	19,100	19,200	17,140	3,040
Baker Lake	14,700	13,900	15,300	15,900	16,700	16,800	17,100	17,800	20,510	19,910	6,010
Chesterfield Inlet	16,400	18,400	19,000	21,300	23,400	21,600	24,100	27,700	30,000	26,150	7,750
Coral Harbour	16,600	14,400	15,300	16,300	18,600	18,600	19,000	20,200	17,720	16,470	2,070
Rankin Inlet	24,300	23,200	26,300	26,800	27,800	28,500	29,400	30,800	31,100	30,760	7,560
Repulse Bay	13,200	11,700	15,000	14,000	15,400	17,400	17,300	17,100	17,660	14,350	2,650
Whale Cove	17,200	16,000	19,000	18,600	19,300	20,400	21,000	23,700	22,630	21,270	5,270
Kivalliq	17,000	16,400	18,200	18,700	19,500	19,900	21,000	22,000	22,320	20,960	4,560
Nunavut	18,200	18,300	20,600	21,700	22,300	22,900	24,000	24,800	25,630	24,560	6,260
Change %											
Arviat	n/a	-6.0	17.7	-2.4	3.1	0	16.8	-2.1	0.5	-10.7	21.6
Baker Lake	n/a	-5.4	10.1	3.9	5.0	0.6	1.8	4.1	15.2	-2.9	43.2
Chesterfield Inlet	n/a	12.2	3.3	12.1	9.9	-7.7	11.6	14.9	8.3	-12.8	42.1
Coral Harbour	n/a	-13.3	6.3	6.5	14.1	0.0	2.2	6.3	-12.3	-7.1	14.4
Rankin Inlet	n/a	-4.5	13.4	1.9	3.7	2.5	3.2	4.8	1.0	-1.1	32.6
Repulse Bay	n/a	-11.4	28.2	-6.7	10.0	13.0	-0.6	-1.2	3.3	-18.7	22.6
Whale Cove	n/a	-7.0	18.8	-2.1	3.8	5.7	2.9	12.9	-4.5	-6.0	32.9
Kivalliq	n/a	-3.5	11.0	2.7	4.3	2.1	5.5	4.8	1.5	-6.1	27.8
Nunavut	n/a	0.5	12.6	5.3	2.8	2.7	4.8	3.3	3.3	-4.2	34.2
Source: GNBS	, 2011c										

Baker Lake and Chesterfield Inlet however have seen median income grow by over 40% in a decade. Much of Baker Lake's growth can be attributed to Meadowbank – incomes went up by 15.2% in 2008 and declined much less in 2008 than in most other communities in Kivalliq. However

Chesterfield has seen substantial income growth in multiple years over the decade, predating Meadowbank.

Year on year, incomes have fluctuated. The extreme case is Repulse Bay, which has seen median income increase by 28.2% in 2001 and decrease by 18.7% in 2007. No community has seen constant growth, even excluding consideration of 2008, a bad year for all. The small size and undiversified nature of community economies makes them exceptionally vulnerable to shocks, both negative and positive.

Figure 4.2-13 provides a visual impression of median income changes between 1999 and 2008. The Figure is based on three year running means, to effectively even out dramatic year to year changes – strongly negative and positive years are often followed by their opposites. That is, when median income responds to a strong shock, it usually falls back the next year. As the data in the Figure suggest, overall growth has been positive. Even the poor results for 2008 did not undo positive gains in previous years for four communities – Baker Lake, Chesterfield Inlet, Rankin Inlet and Whale Cove.

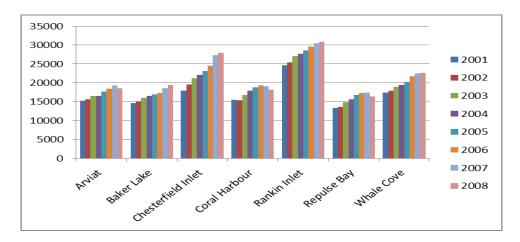


Figure 4.2-13 Median Income

#### 4.2.7.3 Employment and Traditional Activity, Baker Lake

As elsewhere in Nunavut and Kivalliq, the land based economy in Baker Lake is fundamental to people's health and wellbeing. Data predating the construction and operation of Meadowbank indicate that the levels of engagement in land based activities and the contribution of harvests to diet were both high and stable in most communities in Nunavut (NWMB, 2004; Statscan, 2002b and 2007b), including in Baker Lake. In order to determine the extent to which such findings may have changed in Baker Lake, largely in response to Meadowbank, AREVA undertook a small survey

intended to compare various values, practices and preferences with regard to traditional activity (harvesting and food consumption) in 2010. (See Section 4.1.3.3, Methodology)

The results are discussed below. It is noted that although the AREVA survey replicated as closely as possible earlier studies, there were some limitations. As a consequence, not all the data are strictly comparable, and thus results should be taken as indicative rather than necessarily statistically significant. For example, much of the CINE data are only reported at the regional, as opposed to the community, level. Efforts to retrieve the original data base over 2009 and 2010 were not successful. Some comparisons with the CINE data made in this section are therefore not always between Baker Lake in 2010 and 1998/99, but often between Baker Lake in 2010 and Kivalliq Region as a whole in 1998/99. Similarly, the NWMB study looked at harvesting levels of HTO members rather than of a sample of the population of Baker Lake, as the AREVA (and CINE) work did. There is thought to be significant overlap insofar as most harvesters, and virtually all more active harvesters, are HTO members – NWMB estimated that unregistered harvesters represented about 16% of the total and that these were largely occasional harvesters. Nevertheless the sample populations are not identical.

Even taking into account methodological issues and the limitations imposed by various methodologies, study participation rates and reporting of results, there is no conclusive evidence that traditional activity has declined in Baker Lake over the last decade, considering the community as a whole. Traditional activity remains highly valued and the number of hunters appears stable. Consumption levels of caribou and fish remain unchanged, and there is some evidence of increased diversity, in small amounts, of other traditional foods. A comparison of AREVA results, disaggregated between people employed for more than six months and people employed for six months or less in the previous year, shows some evidence of increased participation in traditional activity by the more employed.

#### Values

The CINE (Kuhnlein et al, 2000) methodology included workshops with participants in communities to reach consensus on a list of attributes considered to be relevant to the values assigned to harvesting and consumption of country food. These attributes are listed as statements in the Table 4.2-23, with indications of the percentage of respondents who agreed to each statement, in Baker Lake in 2010 and in Kivalliq more generally in 1998/99. The results, for both data sets, indicate the extent of agreement as to the positive attributes of harvesting. With the exception of statements related to the contribution of harvesting to spirituality and to a lesser extent humility, over 90% of people in Baker Lake agree to the statements. As well, with the exception of the first statement in the table, people in Baker Lake in 2010 were either as likely, or more likely, to agree to the statements than people in Kivalliq as a whole in 1998/99, that is agreement is more pronounced in Baker Lake. While the data do not permit certainty that the value attached to harvesting has not declined in Baker

Lake over the decade it is clear that harvesting is both enormously valued in Baker Lake, and is valued more than in Kivalliq more generally a decade ago.

Table 4.2-23 Percentage of Respondents Agreeing to Statements about Harvesting

	2010 (Baker Lake)	1998/99 (Kivalliq)	Difference
Contributes to physical fitness and good health	96	98	-2
Is a favourite outdoor recreation activity	94	89	5
Provides people with healthy food	100	98	2
Keeps people close to nature	92	87	5
Favours sharing in the community	95	95	0
Saves money	94	94	0
Is an important part of the culture	97	97	0
Is an occasion for adults to teach responsibility to their children	98	93	5
Is one way to practice spirituality	74	57	17
Keeps people humble (not proud or boastful)	82	71	11
Provides education on the natural environment	94	93	1
Contributes to children's education	95	94	1
Provides skills in survival	98	97	1
Provides skills in food preparation at home	99	98	1
Is an opportunity to teach spirituality	75	61	14
Is an opportunity to learn patience	97	83	14
Is a way to strengthen culture	97	89	8

Harvesting

Table 4.2-24 presents the 2010 data on levels of engagement in harvesting. Of 89 households, there was a single instance of no reported harvesting. Every other household either hunted or fished, and most did both. Almost three quarters of respondents reporting hunting, and over 90% of households have at least one member hunting. Most people also fish and almost half collect plants and/or eggs. Few people trap.

Table 4.2-24 Percentage of Respondents Agreeing to Statements about Harvesting

	Engaged (% of	% of which are		Engaged (% of	
	Respondents)	Occasional	Active	Intensive	Households)
Hunting	72	80	18	2	92
Trapping	2	100	0	0	6
Fishing	85	81	16	3	85
Plant Collecting	47	87	10	3	40
Egg Collecting	49	95	5	0	51
Sources: AREVA survey.					•

The definitions of the engagement levels noted in the table are from NWMB (2004) and are the same as noted in Section 4.2.4.4, but are repeated here for reference:

- Occasional: does not engage regularly in harvesting (only a day or two every now and then) participation is usually short term (day trips and weekends);
- Active: regularly engages in a limited number of harvesting activities year round. Activity can be short, but intense. Time commitment is more than day trips/occasional weekend;
- Intensive: repeatedly and regularly engages in almost all types of harvesting activities year round. There is always country food in the household.

Most engagement is reported to be 'occasional' and the balance 'active' with only a very few 'intensive' hunters, fishers or plant collectors. (Intensive hunters, at 2% of all sampled hunters, is equal to three individuals in the sample, equivalent to about 15 individuals in the adult population of Baker Lake). It is noted that 'occasional' should not be interpreted as a low level of commitment to harvesting. During consultations, people frequently spoke of the preference to harvest close to home – family, comfort, health and safety, employment and transport costs are all considerations. The NWMB definitions described above largely are framed in terms of time spent hunting while modern technologies (snow machines and ATVs, GPSs and communication technologies) in fact enable more successful hunting in less time.

Table 4.2-25 compares the 2010 results with those over the five year period investigated in the NWMB study. There is no evidence in the table that either participation or engagement levels in harvesting have decreased over time. On the contrary, given that the NWMB data represent all harvesting activity of only HTO members and the AREVA data represent only hunting in the general adult population, the table suggests that participation in harvesting may have increased over the past decade. With regard to the absolute numbers of harvesters, the evidence is that these numbers have

at least stayed constant. HTO membership was reported to have remained stable over the NWMB study period, at between 300 and 350 people in any given year.

Table 4.2-25 Percentage of HTO Members Harvesting, by Level of Engagement, in Baker Lake

	Occasional	Active	Intensive
1996/97	81	19	0
1997/98	81	19	0
1998/99	80	19	1
1999/00	79	20	1
2000/01	78	21	1
2010 (hunting only)	80	18	2
Sources: AREVA survey for 2010 data;	Kuhnlein et al, 2000 for 1998/99	data.	•

#### Catch Levels

Table 4.2-26 compares harvest (catch) levels in Baker Lake between 2010 and the average over the five year period between 1996 and 2001 as presented by NWMB. The response rates declined over the NWMB study period and people in Baker Lake commented that the harvest estimates reported in the study 'seemed low'. Nevertheless, the data indicate that with the exception of fish, reported harvests may have increased substantially – more than doubling for all species – between the two studies. To the extent that reported harvests between 1996 and 2001 only 'seemed low' to people in Baker Lake, the data suggest that catch levels have likely increased over the last decade<sup>28</sup>.

<sup>&</sup>lt;sup>28</sup> In addition, NWMB considered only HTO members and AREVA considered the adult population of Baker Lake. However, low levels of participation in harvesting by non HTO members would not be expected to account for this doubling of catches.

Table 4.2-26 Estimated Annual Catches (no.)

	Number of Households with Catches	Total Annual Catch (Sample) 2009/2010	Total Annual Catch (Baker Lake) 2009/2010*	Total Annual Catch (Baker Lake) 1996 to 2001
Sea Mammals	2	21	92	4
Caribou	70	1,141	5,020	2,480
Musk Ox	6	8	35	4
Wolverine	15	42	185	12
Wolf	6	48	211	91
Birds	26	159	700	262
Fish	43	886	3,898	5,105

Sources: AREVA survey for 2009/2010 data; NWMB (2004) for 1996 to 2001 data.

Note: \* A correction factor was applied to the catch levels for the AREVA sample (23% of the adult population of Baker Lake) to total community catch levels, to increase the comparability with the NWMB data which were presented as total Baker Lake levels.

# Consumption

The data in Table 4.2-27 also suggest as much or more recent consumption of traditional foods in Baker Lake as compared to 10 years ago. Reported diets include as many or in some cases more harvested sea and land mammals, birds and fish as they did a decade ago. What is particularly noteworthy is that the 2010 data indicate more diversity of traditional food consumption than the CINE data indicated – although caribou, and to a lesser extent fish, continue to be the most often consumed and consumed in the highest quantities, at least some households have added new species to their diets. Further, whereas only 2% of households reported harvesting sea mammals, almost 40% of people reported that they ate at least some sea mammals in 2010. The reported inter and intra community sharing of harvests, as well as some limited commercialization, appears to have enabled diet diversification.

Table 4.2-27 Winter Season Consumption of Traditional Food, in Baker Lake

% of People Eating 2010		Frequency (rating*)		
	% of People Eating 2010	2010	1998/99	
Sea Mammals	39			
Beluga	34	VL	VL	

Table 4.2-27 Winter Season Consumption of Traditional Food, in Baker Lake

	0/ of Bookle Follow 2040	Frequency (rating*)	
	% of People Eating 2010	2010	1998/99
Narwhal	13	VL	VL
Walrus	5	VL	VL
Bowhead	3	VL	0
Ringed Seal	7	VL	VL
Bearded Seal	2	VL	0
Harp Seal	1	VL	VL
Harbour Seal	3	VL	0
Mammals	99		
Polar Bear	1	VL	0
Caribou	99	Н	Н
Musk Ox	10	VL	VL
Birds	14		
Ducks	3	VL	0
Geese	7	VL	VL
Ptarmigans	8	VL	VL
Gulls and Terns	1	VL	0
Fish	78		
Trout	63	L	VL
Whitefish	21	VL	VL
Burbot	2	VL	0
Greyling	5	VL	VL
Char	60	M	L
Shellfish	4	VL	0

Sources: AREVA survey for 2010 data; Kuhnlein et al, 2000 for 1998/99 data.

Note: \* VL = consumed on < 3 days over the three month winter season December to February, L = 3 to 6 days/season, M = 6 to 12 days/season and H = 12 to 24 days/season.

Thus, overall, the available data indicate that both harvesting and consumption of traditional foods remains unchanged (for example, average consumption frequency of caribou in both 2010 and 1998/99 was 1.8 times per week) or has increased (for example, reported catches are higher and there is more consumption of sea mammals). These data represent averages for the community of Baker Lake as a whole. However, in 2010, 40% of people reported that they were eating less traditional food than they did in 1995 whereas only 25% felt that way in 1998/99 (Kuhnlein et al, 2000). It is possible that while some people are eating less traditional food now, some people are eating more, maintaining community level averages over time. It may also be that with increasing support for traditional activity and education on its health benefits, people now perceive that they are not getting as much as they used to get or now would like to get — indeed in 2010, 34% of respondents indicated that they were not eating as much traditional food as they would like to.

To the extent that it appears that overall consumption levels have not decreased over the last decade, the CINE conclusions with regard to the important contribution of traditional foods to household food security, nutrition and cultural wellbeing are still valid. In general, CINE determined that traditional food was the primary source for protein, iron, zinc, potassium and phosphorus and a valuable contribution for vitamin C, omega fatty acids, vitamin A, vitamin E and magnesium for Inuit. Market food contributed the majority of saturated fat, carbohydrate, sodium and calcium. In Baker Lake specifically, traditional food represented on average about 31% of energy consumption over the three summer months and about 18% over the three winter months. The study concluded that 'large quantities and great varieties of these wildlife foods are consumed, and bring about better diet quality, social and cultural benefits, economic benefits and provide the opportunity for physical activity during hunting, fishing and gathering of plant food species . . . [and that] losing these benefits is potentially life threatening in several ways, including impacts on physiological and mental health.'

As noted above about one third of people report that they would like to have more traditional food than they get, despite high participation rates in harvesting, integrity of sharing systems and some options to buy such food<sup>29</sup>. Table 4.2-28 indicates that virtually every harvesting household shares at least some part of their harvests with at least family members living outside the household. As might be expected, sharing with family and secondarily with elders is more likely, and in higher amounts, than with friends and others. However almost half of households share at least a little of their harvests with the general community, perhaps indicating that sharing continues as a strong traditional activity in Baker Lake.

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<sup>&</sup>lt;sup>29</sup> There are no comparative data in the CINE or NWMB reports for the data presented in Tables 4.3- and 4.3-.

Table 4.2-28 Percentage of Households Sharing Traditional Food

	None	Little	Half	Most	
Outside family	13.6	22.7	39.8	23.9	
Friends	22.7	45.5	25.0	6.8	
Outside elders	14.8	39.8	30.7	14.8	
General community	51.2	30.2	9.3	9.3	
Sources: AREVA survey, 2010.					

People also buy traditional food, and would like to buy more, as the data Table 4.2-29 indicate. Almost 60% of respondents indicated that they buy traditional food, and/or would buy if they could. Fish, caribou and sea mammals are most often bought and there is highest unmet demand for sea mammals. Of the people who reported they would like to buy, 60% are currently buying and represent demand for more and different traditional foods. Of the 40% who are not currently buying, foods most often cited as preferred were sea mammals and processed (dried, smoked) caribou and char, suggesting that not just cost but also availability are important obstacles to more purchases. Almost all traditional food is bought from stores in Baker Lake, most often from the Northern Store and the Jessie Oonark Centre. There are few private sales evident – 5% of households reported selling a part of their harvest (and most people reported that this only occurred when somebody really wanted to buy from them) and only 7% of respondents report buying from 'people in town'.

Table 4.2-29 Percentage of Households Buying Traditional Food

	Bought	Would Like to Buy
Caribou	43.2	26.1
Fish	73.9	21.6
Sea Mammals	23.9	29.5
Berries	6.8	1.1
Birds	1.1	1.1
Musk ox	1.1	1.1

Despite very high value assigned to harvesting, and very high participation rates in harvesting, there is unmet demand for country food – people would like to eat more (as noted above, 34% of respondents indicated that they would like to eat more than they are eating, and about 25% are

prepared to buy country food that they are not now buying). This in turn indicates that levels of engagement in harvesting activity are constrained in some way(s). Table 4.2-30 provides data on what people feel are the primary obstacles to more activity on the land, specifically hunting and fishing. The first point to note is that about 40% of households in Baker Lake indicated their harvesting is constrained in some way, a very low percentage relative to the results of about 95% of households reporting constraints for Kivalliq more generally in 1998/99 (Kuhnlein et al, 2000).

Table 4.2-30 Percentage of Households Reporting Constraints to Hunting and Fishing

	2010 (Baker Lake)		1998/99 (Kivalliq)	
	Hunting	Fishing	Hunting	Fishing
No constraints	57	63	4	5
Constraints	43	38	96	95
Of which				•
too expensive	34	30	57	29
too busy	9	7	7	34
changes in wildlife	0	1	0	0
weather	0	0	22	20
health	0	0	3	3
other	0	0	4	8
Sources: AREVA survey for 20	)10 data; Kuhnlein et al (20	00) for 1998/99 data.	•	•

Households at both times were much more likely to identify costs than time as the primary obstacle to hunting, although this tendency is much less pronounced in Baker Lake, in part attributable the comparatively low experience of constraints. There was a single instance of environmental change (changes in the quality of fish) reported as a constraint.

# Relationships with Level of Employment

Although the previous two studies did not include employment status questions, the AREVA study did, in order to investigate relationships between employment status and traditional activity. Table 4.2-31 presents data on country food consumption levels as compared to five years ago of people employed for more than 6 months of the year and people unemployed or employed for less than six months. A higher percentage of the less employed feel they are eating more than they used to, that is, the more employed were more likely to report that they were eating less country food than

previously, These data suggest that there is a negative co relation between employment and consumption of country food.

Table 4.2-31 Employment and Country Food Consumption, Percentage of Respondents

	> 6 months	0 to 6 months			
More	17.1	26.2			
Same	44.7	44.6			
Less	38.2	32.3			
Sources: AREVA survey, 2010.					

However, despite less reported consumption, the data Table 4.2-32 indicate that more employed are more likely to be engaged in harvesting. Also, although there more occasional hunters and fishers among the more employed, they harvest more on average than the less employed. As noted earlier, overall levels of sharing are high in Baker Lake, and overall levels of selling harvests are low, but the more employed are likely to share more and sell less than the less employed. The more employed are also more likely to teach their children to hunt and fish.

Table 4.2-32 Employment and Engagement in Traditional Harvesting, Percentage of Respondents

> 6 months		0 to 6 months		
Hunting	Fishing	Hunting	Fishing	
1.4	13.7	12.7	19.0	
98.6	86.3	87.3	81.0	
75.7	76.7	69.8	63.5	
21.4	8.2	14.3	14.3	
1.4	1.4	3.2	3.2	
14.5 8.4		.4		
7	7.9		5.4	
1.7		0.8		
97	97.1		85.7	
0	.0	8.0		
62.0		42	2.9	
80.3		54	1.0	
	Hunting  1.4  98.6  75.7  21.4  1.4  7  1  97  0  62	Hunting         Fishing           1.4         13.7           98.6         86.3           75.7         76.7           21.4         8.2           1.4         1.4           14.5         7.9           1.7         97.1           0.0         62.0	Hunting         Fishing         Hunting           1.4         13.7         12.7           98.6         86.3         87.3           75.7         76.7         69.8           21.4         8.2         14.3           1.4         1.4         3.2           14.5         8.           7.9         5           1.7         0.           97.1         85           0.0         8.           62.0         42	

Further investigation will be necessary to better understand the differences the data in the table above indicate between the more and the less employed. An obvious interpretation, or speculation, is that the higher cash incomes of the more employed permit the buying of better equipment (which would enable higher catches with less time on the land), engender increased expectations within the family and community for sharing and mitigate any incentive to sell (rather than share) harvests.

#### 4.2.8 Infrastructure and Services

Broadly, the GN is able to provide a range of infrastructure and services to Kivalliq communities that are adequate, in many cases comparable to infrastructure and services available in small communities elsewhere in Canada. However, the breadth and depth of challenges experienced by Nunavut's population, the small numbers of people across an enormous expanse of land and the high cost of staff and transportation are all important constraints.

In addition to GN services, community health, justice and/or wellbeing committees have been established in most communities. Given the acknowledged interrelationships of health, education, income, crime and other socio-economic parameters, most of these committees are multidisciplinary, with broad participation by service delivery staff and community representatives. These committees function at different levels of effectiveness between communities and over time. Communities have also established special purpose self help groups to address their priority issues, such as Alcoholics Anonymous and suicide prevention groups, where facilitators can be identified.

#### 4.2.8.1 Schools

Rankin Inlet, Baker Lake and Arviat have both primary and secondary schools. In each of the smaller communities one school includes all grades from kindergarten to grade 12. Many of these schools are new and have been built taking into account rapid population growth, so none reported overcrowding. The Alberta high school curriculum is followed, with various modifications to accommodate experiential learning opportunities, training in speaking and writing Inuktitut and learning traditional Inuit cultural practices, history and values.

Schools, staffing levels and registration vary with community population. Not all schools are fully staffed at all times given problems with recruitment and retention. Schools, even the largest in Arviat, Baker Lake and Rankin Inlet, do not have full time guidance counsellors. Schools have some Inuit teachers, teaching assistants, student support assistants who help with extracurricular activities and physical education programs. Many also have elder support in delivering IQ related programming.

#### 4.2.8.2 Health Services

All the communities have health centers, managed and staffed by nurses who have telephone support. All communities also have medical evacuation services. Regular fly in specialists, including doctors, physiotherapists, optometrists, psychiatrists and dentists, supplement the care nurses are able to provide. Rankin Inlet, with its new Kivalliq Health Centre is the exception – it has full time doctors.

However for many medical emergencies and complicated health issues, patients must be transferred south, usually to Churchill or Winnipeg. With the exception of mental health services, which are considered by health care staff to be in adequate relative to the types of problems they see, Kivalliq's infrastructure and health services are comparable to those available in small communities elsewhere in Canada.

#### 4.2.8.3 Social Services

Social services include child protection, adoption, family services, income support, residential care and counselling, Social workers and other staff are available in all communities, and appear to be the most stretched in terms of demand among GN service delivery staff. Although violence towards children is rare, neglect does occur too frequently. Social service staff, sometimes with volunteers or other agencies, <sup>30</sup> are involved with parenting, head start, early steps and justice programs. There are severe shortages of day care options and of residential care facilities, for elders, the disabled and victims of domestic violence relative to demand. Counsellors also report being very busy.

#### 4.2.8.4 Police

All communities have RCMP police posts. Most police describe their communities as pro police. People see the police as helpful and seek police out for all kinds of assistance – some, like assistance with tax returns, not police related. Although exceptional events occur, call for policing are largely related to domestic violence and property crimes. Police priorities are described as youth, and alcohol and drugs.

<sup>&</sup>lt;sup>30</sup> As an example, the AQSAARAQ Project in Rankin has been in operation for over 25 years and offers services to people struggling with alcohol or drugs, and their families.

There are no courts in Kivalliq. Rankin Inlet does have a justice of the peace. Trials are conducted on a fly in basis according to community need. Elders often participate in court decisions.

# 4.2.8.5 Religious Services

All communities have a number of Anglican, Roman Catholic, Glad Tidings and/or other churches. Churches are described as not being overly involved in political or social issues, and as operating fairly independently from each other. That is, churches focus more on their teachings. However, there have been exceptional instances when churches have found common cause to battle community problems. Given the number of churches in most communities, church influence on their members is highly variable.

#### 4.2.8.6 Financial Services

There are very limited financial services in Kivalliq. Aside from Rankin Inlet, with its two banks, people in communities must depend on automatic teller machines where these exist, or on the stores that will cash cheques and in some cases will extend credit for groceries and other supplies. Few people have credit cards. Prepaid cards can be obtained for ordering from consumer item suppliers outside Nunavut. However, there is also much informal borrowing. The lack of financial services means that there are few avenues for people to learn to manage money – they do not have ready access to banks, with their advisors, savings programs and credit services. Large employers, including the GN, provide some assistance to their employees, including direct deposit wage payments and written materials.

Cultural expectations, low incomes and lack of financial services imply low savings in Nunavut and this is likely the case for most people. It is noted that Nunavut's personal savings rate, at over 30%, has consistently been the highest among Canada's territories and provinces (the overall rate in Canada in 2009 was just over 4%). As well, the median RRSP contribution in Nunavut is twice the national average. Both these statistics are expected to be largely the result of high savings on the part of the non Inuit population, savings that are by and large exported at the end of contracts. The Nunavut Economic Forum (2004) for example suggests that one constraint to small business develop in Nunavut is the low availability of personal savings.

Lack of financial services, specifically credit, is also challenge for small businesses. Programs in place to assist businesses to borrow capital or operating loans include that of the Nunavut Business Credit Corporation (NBCC) and of GNDoEDT. NBCC provides financing to business based in Nunavut, whether owned by Inuit or non Inuit across all economic sectors. At any given time, the lending portfolio will have about 50 or more loans outstanding, in a total amount of about \$16 million. GNDoEDT supports their sector strategy for arts and crafts through small loans to individuals and organizations active in making things by hand. GNDoEDT also has a small business support program that assists with overhead costs or small capital and operating costs.

#### 4.2.8.7 Local and Regional Transportation

Rankin Inlet is Kivalliq's major transportation link to the rest of Nunavut and the rest of Canada. There are regular flights between Rankin Inlet and each of the other six communities. Canadian North and/or First Air provide jet service between Rankin Inlet and Winnipeg, Iqaluit and Yellowknife, with connections to other Canadian cities. The Rankin Inlet airport in is the only paved and jet capable runway in the Kivalliq. Other communities are served by turboprop aircraft, operated by First Air and by Calm Air. Calm Air also provides service between Kivalliq communities and Manitoba centers, including Churchill and Thompson. There are also smaller regional air carriers and charter services.

Large quantity and weight shipments (for example fuel, construction materials, vehicles and dry goods) to supply communities through the winter months come from Churchill by barge and from Montreal by ship. Large tire vehicles are sometimes used to transport supplies during the winter months between Churchill, Arviat, Rankin Inlet, and Baker Lake.

Canada Post provides mail service on a regular basis to all communities. Three bilngual newspapers, Kivalliq News, Nunavut News North and Nunatsiaq News, publish weekly, are distributed in all communities and can be accessed over the internet. Direct dial telephone and is available in all communities and cell phone service is currently available in Arviat, Baker Lake and Rankin Inlet. Satellite and radio telephones are used to monitor people and families who are travelling or living on the land.

Every Kivalliq community now has internet service (from Qiniq), at least from community centers, but also at home with the purchase of a modem -- overall more than 60% of households had internet in the home (there is little variation between communities) by 2010 (GNBS, 2011d). An initiative developed by Industry Canada called the Community Access Program (CAP) helps to provide people access to the Internet. Under CAP, local schools, libraries, and community centers provide access to the Internet and support on how to make the best use of its services.

CBC Radio North broadcasts from studios in Yellowknife, Inuvik, and Iqaluit, and transmits by satellite to all communities. The Nunavut production centre is in Iqaluit, with programs and stories contributed by bureaus in Rankin Inlet (as well as Cambridge Bay and Kuujjuaq, Quebec). Programs are produced in both Inuktitut and English. Local radio broadcasts are a vital mode of communication for Kivalliq residents. They provide personal announcements, messages, and community news and events.

Television programs are produced and broadcast in Inuktitut, Inuinnaqtun, Inuvialuktun, and English by CBC North and the Inuit Broadcasting Corporation (IBC). IBC headquarters are in Iqaluit. IBC is one of the contributors to the National Aboriginal Television Network that broadcasts throughout the country.

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# Attachment A Research License Documentation

- 1. RESEARCH APPLICATION
- 2. RESEARCH APPLICATION APPENDICES
- 3. RESEARCH LICENSE



# SCIENTIFIC RESEARCH LICENCE APPLICATION SOCIAL SCIENCE AND TRADITIONAL KNOWLEDGE RESEARCH

NRI strongly recommends that applicants review the following documents prior to submitting an application: Scientific Research Licensing Guidelines and Negotiating Research Relationships in Inuit Communities: A Guide for Researchers.

For more information about the Nunavut Research Institute (NRI) please visit our web site www.nri.nu.ca

#### **IMPORTANT**

Please be advised that your application will not be processed until the application form, project summary, participant consent forms and ethical review are submitted.

	participant consent forms and ethica	al review are	e submitted.
	SECTION 1: APPLICANT	INFORM	ATION
1. P	Project Title Socio-economic and Traditional I AREVA Kiggavik Uranium Projec Kivalliq Region		
2.	Applicant's full name and mailing address:		
	Susan Ross, Golder Associates	Phone:	403 299 4663
	940 6 <sup>th</sup> Avenue SW	Fax:	403 299 5606
	Calgary AB T2P 3T1	Email:	siross@golder.com
3.	Field Supervisor's name and mailing address: Same as above	Phone: Fax:	
		Email:	
4.	Other Personnel list (name, position, affiliation)  Mitchell Goodjohn, traditional knowledge specialist, Golder Associates  Santiago Olmos, sociologist, Golder Associates  Hattie Mannik, field researcher, Baker Lake  SECTION 2: AUTHORIZA	TION NE	FDFD
	OLOTION 2. AUTHORIZA	VIIOIV IVE	
1. lı	ndicate <u>all</u> authorizations associated with the projec	t proposal:	:
	Ethics Review – Affiliated private sector companies (AF Ltd.) do not have formal ethics review processes in plac regarding ethics review of research programs and apper research is to be conducted.	e. We have	reviewed relevant documentation
2a.	Have you applied for all authorizations required to o	conduct the	e project proposal activities?



X YES □ NO

**2b.** If so, what is the status of the application? This application is submitted to the Nunavut Research Institute in 2008. No other applications are required to advance the research program for socio-economic and traditional knowledge studies, to our understanding.

#### **SECTION 3: PROJECT PROPOSAL DESCRIPTION** 1. Timing Period of operation, ie. time in field: **July 2008 July 2009** July 2008 July 2009 Proposed term of authorization: to 2. Region Community Region Baker Lake Kivalliq Chesterfield Inlet Kivalliq Rankin Inlet Kivallia Arviat Kivalliq Whale Cove Kivalliq Coral Harbour Kivalliq Repulse Bay Kivalliq

#### 3. Non-Technical Project Summary

Please submit a non-technical description of the project proposal, no more than 500 words, in English and Inuktitut (+Inuinnaqtun, if in the Kitikmeot). The project proposal will be circulated to various reviewing agencies. The project description should outline the following:

The research project description follows. The Inuktitut version is attached as Appendix A

- Project Title: Socio-economic and Traditional Knowledge Studies in Relation to the AREVA Kiggavik
   Uranium Project Environmental Impact Assessment, Kivalliq Region
- Researcher's Name and Affiliation: Susan Ross, Golder Associates Ltd (Golder) under contract to AREVA Resources Canada (AREVA).
- Project Location: All seven communities of Kivalliq Region, Nunavut will be included in the studies. It
  is noted that the detail of investigations may vary by community, depending on the potential for
  AREVA Project effects and the consequent environmental impact assessment information needs.
- Timeframe: July 2008 to July 2009
- Project Description
  - The purpose of the project is to collect socio-economic and traditional knowledge information sufficient to understand community interests in the AREVA Kiggavik Uranium Project, as input to an environmental impact assessment for Project permitting. A summary AREVA Project description is attached as Appendix B
  - The objective of the socio-economic and traditional knowledge studies is to collect baseline data to enhance AREVA's understanding of conditions in communities potentially affected by the Project. The information will be used to assess potential and residual impacts of the AREVA Project on socio-



economic conditions and resource use and to frame impact mitigation and benefit enhancement measures to be implemented by AREVA as conditions for Project approvals.

#### Methodology

- The socio-economic and traditional knowledge studies may include, in addition to reviews of secondary data sources, key informant interviews and focus group discussion in the seven communities in Kivalliq Region of Nunavut. Key informant interviews and focus groups discussions complement official socio-economic data from secondary sources, providing qualitative information on socio-economic dynamics and trends, as well as on community/sub population strengths, weaknesses, opportunities and constraints and on people's concerns and interests with regard to the AREVA Project development. Interviews with people who are knowledgeable about the land and its resources provide information that can be integrated into the environmental impact assessment, in combination with scientific knowledge, such that the quality of the assessment is enhanced.
- Data collection instruments are presented in Appendix C. It is noted that key informant interview and focus group discussion methodologies use guides, or semi structured instruments, rather than questionnaires. These guides are not meant to be strictly adhered to, as it is important to allow people to talk about what they have knowledge of and/or are concerned about. Additionally, different guides are used with different informants and groups, as each may have particular areas of expertise and/or interest. Thus Appendix C presents only generic key informant interview and focus group discussion guides. Final guides will be agreed with individuals and/or communities.
- We have identified the seven Kivalliq Region communities as the study area for the socioeconomic and traditional knowledge investigations because it is expected that all seven will have some material interest in the AREVA Project, because of the potential for project effects, both positive (employment and business opportunities for example) and negative (resource effects for example). Individuals will be selected for interviews based on discussions with communities.

#### Data

- The short term use of the data will be to assess the potential for project impacts, and to frame mitigation/enhancement measures in response to those impacts. The data will also be used as a baseline for monitoring programs, which would be expected to include ongoing data collection throughout the life of the project. It is noted that environmental impact assessments are public documents and their contents are available to any interested party. Given this, confidentiality at both the individual and community level will be guarded and reports will be made available to community leadership for review and comment before submission to regulators and the public domain.
- AREVA and Golder do not intend to make other use of the data. However as noted above, the data and conclusions will be in the public domain.

#### Reporting

- The results of the research, as a copy of the draft report and of a non technical summary (the latter in Inuktitut), will be provided to community leadership before submission to regulators. The environmental impact assessment review process includes the distribution of documentation to all interested parties in Nunavut, who are invited to intervene.
- The research is not expected to result in publication, however data and conclusions will be submitted to regulators and be in the public domain.

#### **SECTION 4: PARTICIPANT CONSENT FORM**

Please attach a copy of the actual consent form that will be used during the proposed study. Consent forms must be in English and Inuktitut (+Inuinnaqtun, if in the Kitikmeot). Components of the participant consent form must include:

project title



- description of project
- researcher's name, address, telephone & fax.
- statement of informant rights "I have been fully informed of the objectives of the project being conducted. I understand these objectives and consent to being interviewed for the project. I understand that steps will be undertaken to ensure that this interview will remain confidential unless I consent to being identified. I also understand that, if I wish to withdraw from the study, I may do so without any repercussions."
- medium of interview: face to face, telephone, audio taped, video taped, photographed
- conditions for release of recorded information.
- printed name of participant, signature of participant, witness signature, date of consent.

The consent form is attached as Appendix D in English and as Appendix E in Inuktitut.

# **SECTION 5: COMMUNITY INVOLVEMENT & REGIONAL BENEFITS**

1. List the community representatives that have been contacted and provide the minutes of the meetings if available:

Community	Name	Organization	Date Contacted
None to date by Golder			

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Golder has not yet contact studies.	ted communities in regard t	o the socio-economic and tr	raditional knowledge
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5. Is there a traditional l	knowledge component to	this research project? If y	es, please explain:
		onmental impact assessme e is included in Appendix C.	



# **SECTION 6: GENERAL QUESTION**

X YES		0
Applicant:		
Signature	Title	Date

#### Appendix A ∩∩% L Δ

#### **Research Project Description -- Inuktitut**

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#### Appendix B

# KIGGAVIK PROJECT SUMMARY May 2008

The Kiggavik Project is a uranium exploration project located approximately 80 km west of Baker Lake. The project is owned by AREVA Resources Canada Inc. (formerly Cogema Resources Canada) in joint venture with Japan Canada Uranium Company Ltd and Daewoo International Corporation. The Project consists of the Kiggavik site to the north and Sissons to the south. This uranium exploration project was started in 1975 by the previous operator, Urangesellschaft Canada Ltd., and several mineral deposits were discovered between 1977 and 1988. AREVA (ARC) became the project operator in 1993, and further exploration was carried out between 1993 and 1997. This project was under care and maintenance until 2007, when exploration activities resumed.

AREVA is continuing a program of diamond drilling and environmental baseline work, which began in 2007, and a socio-economic study, which began in 2009. These will result in an improved understanding of the project site, the known mineral deposits and the socio-economic setting in the region. These programs are needed to gather additional information to determine whether these deposits can be safely and economically extracted and processed, while protecting the environment. In addition, a program of prospecting, geological mapping, and geochemical and geophysical surveys is being carried-out throughout the lease areas to identify potential for additional mineral deposits, and to further evaluate known potential areas.

In 2007, drilling targeted known deposits to gather additional information about the mineral deposits and their setting. In 2008 and 2009 (?), diamond drilling focused on the Kiggavik and Sissons sites at reduced grid spacing, and exploration drilling at areas of potential mineralization.

Environmental baseline work began in 2007 and continued in 2008 and 2009 to update the current database, including surface hydrology, and aquatic and terrestrial components. A prefeasibility study began in 2006 and was completed in late 2007. Based on the pre-feasibility results and good community support in the Kivalliq region it was decided in December 2007 to proceed with an approximately two-year feasibility study and to commence the EA process. In 2008, ARC submited to regulators a detailed project description in order to initiate process clarification and a project environmental review.

AREVA is committed to carrying out its field programs in an environmentally responsible and sustainable manner.

#### 

# Appendix C

#### **Research Instruments**

## **Key Informant Interview Topics – Socio-economics**

Key informants are people with specific sector and/or community expertise (health and education professionals, local government representatives, business interests, etc.). Key informant interviews use semi structured interview instruments which allow departures where an informant is particularly well informed in an unexpected area.

Generic topics, not all relevant to all potential key informants, are listed below. Topics are added or subtracted as appropriate to the key informant.

- Available statistics (health, education, policing, business, etc. as relevant)
- Priority areas of activity, plans
- Current activities
- Budgets/revenue and costs
- Demand for services
- Quality of services
- Labour force availability
- Partnerships/support services
- Constraints and opportunities
- Trends
- Perceptions of the Kiggavik Project as related to area of responsibility

#### Appendix C (cont'd)

#### **Research Instruments**

#### Interview Topics - Traditional Knowledge

People with traditional knowledge about the land and its resources would be interviewed. It is expected that community leadership would assist in the identification of people knowledgeable about areas that may be affected by the Kiggavik Project. The interviews use semi structured interview instruments which allow departures where an informant is particularly well informed in an unexpected area. The interviews will also use maps to assist in specifically locating spatial information.

Topics are added or subtracted as appropriate to the key informant, but it is expected that traditional knowledge informants could be asked to provide information, where relevant, on the following topics:

- Hunting (land and marine) in Kiggavik Project areas
- Migration routes, birthing areas, mineral licks of large species
- Nesting areas for birds
- Trap lines and species trapped
- Fishing and spawning areas
- Harvesting of plants
- Camps, caches and cabins, and use
- Burial, spiritual and archaeological sites
- Locations and boundaries of traditional activities
- Cultural uses of species
- Seasonality
- Observed recent changes in species health, species distribution, water, weather
- Future land and resource use expectations

#### Appendix C (cont'd)

#### **Research Instruments**

#### Focus Group Discussion Guides – Socio-economics

Focus group discussions bring together small groups of like-experienced community members (women, young adults, etc. ) to describe their experiences, histories, and expectations in response to directed discussion topics, or spontaneously. Guides are used to facilitate discussions, however it is not always possible or indeed useful, to direct the discussion overly.

It is noted that the content of a focus group discussion depends on the willingness and interests of a specific group to meet. As the Kiggavik Project moves forward with consultations and environmental surveys, groups other than those listed below may suggest themselves, as will additional topics.

Accordingly, the lists below will be adjusted to the makeup and interests of particular focus groups. For all groups, general issues such as constraints and opportunities, trends, perceptions of the Kiggavik Project may also be discussed.

Topics considered for elders:

- Settlement history
- Change
- Intergenerational relations
- Elder care
- Activities
- Aspirations for themselves and the young

#### Topics considered for women:

- Economic activities
- Household roles
- Household food economy
- Health and reproductive health
- Children's activities
- Social organization
- Seasonal/daily calendars

#### Topics considered for young adults:

- Education
- Employment
- Household roles/intergenerational relations
- Recreational resources/activities
- Political and social participation

Topics for hunters/trappers (note: intent is to complement, not duplicate, traditional knowledge studies):

- Resource use
- Resource marketing
- Associated traditional activities/values
- Inputs
- Seasonal calendars

#### Appendix D

#### **Consent Form -- English**

**Research Project Title**: Socio-economic and/or Traditional Knowledge Studies for the Kiggavik Project Environmental Impact Assessment, Kivalliq Region

**Name of Organizations**: AREVA Resources Canada Inc. (AREVA), and Golder Associates Ltd. (Golder)

#### **Description of the Research Project**:

The purpose of this study is to document socio-economic considerations and/or traditional knowledge in the area of the proposed Kiggavik Project, 80 km west of Baker Lake in Nunavut. The information will be used in the Environmental Impact Assessment for the Kiggavik Project.

We are asking you to participate in the study because you have been identified by the leadership of your community as having knowledge that may be helpful to AREVA in developing means to mitigate negative impacts and enhance benefits should the Kiggavik Project be built. Other people from your community, and other communities in Kivalliq Region, will also be participating in the study.

#### Names of Principal Investigators:

Susan Ross Golder Associates Ltd. 1000, 6<sup>th</sup> Avenue SW Calgary AB T2P 3T1 Tel: 403 299 4663

Fax: 403 299 5606

Email: siross@golder.com

and

Mitchell Goodjohn Golder Associates Ltd. 1000, 6<sup>th</sup> Avenue SW Calgary AB T2P 3T1 Tel: 403 216 8908

Fax: 403 299 5606

Email: mgoodjohn@golder.com

#### **Overview of Procedure:**

Representatives of AREVA and Golder have made presentations in your community on the Kiggavik Project and the environmental, socio-economic and traditional knowledge studies. We have received feedback from your community on the best way to proceed with the studies. The socio-economic and traditional knowledge studies may consist of two parts – discussions with individuals and discussions with groups. During the discussions, we will ask you questions about socio-economic conditions (health, education, families, children, traditional activities, employment etc.) in your community and/or your knowledge of the land and its resources. The

questions will be adapted as necessary so that you are able to talk about what you know but not be required to answer questions that you don't want to answer. The amount of time required for each discussion will be determined by you and will be based on the amount of information that you and others wish to share. Notes will be taken to record the results of discussions. Discussions may be recorded and/or videotaped if you agree. Any audio or video recordings will be securely stored by AREVA and/or Golder and will be copied and returned to you or your community at your request. Photographs may be taken if you agree.

After the discussions a report will be written on the information provided by you and others in your community. The report will sent to you and your community for review and comment, and any necessary changes will be made. The report will not identify the individuals who have provided information. Once the report has been reviewed by you and your community, we will use it in preparing the Environmental Impact Assessment for the Kiggavik Project.

#### **Benefits of Participating in the Study**

- Contribute to making the Environmental Impact Assessment submitted by AREVA more comprehensive in its consideration of potential socio-economic and traditional resource impacts.
- Assist people (including AREVA, the Government of Nunavut, regulators and your community) to better understand and manage the socio-economic and traditional resource impacts (both positive and negative) of the Kiggavik Project.

#### **Possible Risks of Participating in the Study**

• The information in the report, once comments are integrated, may be incorporated into the discussion of the potential for socio-economic and traditional resource impacts in the Environmental Impact Assessment, a document that will be distributed in the public domain. However confidentiality concerns will be respected.

#### CONSENT TO PARTICIPATE IN THE STUDY

I,, give permission to AREVA Resources Canada and	
Golder Associates Ltd. to discuss with me, either individually or as part of a larger group, so	ocio-
economic conditions in my community and/or my traditional knowledge:	
I have been fully informed of the objectives of the research project being conducted. I under	stan

I have been fully informed of the objectives of the research project being conducted. I understand these objectives and consent to being interviewed for the project. I understand that steps will be undertaken to ensure that this interview will remain confidential unless I consent to being identified. I also understand that, if I wish to withdraw from the study, I may do so at any time without any repercussions.

#### Having read the above:

☐ I agree to participate in a discussion on socio-economic conditions in my community and/or my traditional knowledge.

	I would like to be identified by name in having participated in a discussion on socio- economic conditions in my community and/or my traditional knowledge in any reporting on the discussions.
	(If applicable) I agree that my participation in a discussion on socio-economic conditions in my community and/or my traditional knowledge is
	□ Audio recorded
	□ Video recorded
	<ul><li>Photographed</li></ul>
OF	<b>R</b>
	I do not agree to participate in a discussion on socio-economic conditions in my community and/or my traditional knowledge.
SIC	GNED:
	ATE:
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Re	searcher
SIG	GNED:
	ATE:
Wi	itness

#### $\cap \cap ^{\varsigma_b} \Delta$ (Appendix E)

## **ペプロートゲレス® - Δω®**Ως (Consent Form – Inuktitut)

ለር ሲልቴኦጋር ላበ ነና:AREVA Resources Canada Inc. (ላቪኖ), and Golder Associates Ltd. (ነሪጋ)

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「C has de (Mitchell Goodjohn)
「do (Golder Associates Ltd.)
1000, 6<sup>th</sup> Avenue SW
Calgary AB T2P 3T1
>「b ー」 C: (Tel) 403 216 8908
けしては: (Fax) 403 299 5606
「もんてしば(Email): mgoodjohn@golder.com

#### 

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▷<_ኃ∿し (DATE): ቴ⊳ኦ∖ቴ∩⊳Վቴ (Researcher)
مر SIGNED):
المحاث (DATE): Cdo ۱۵۵۵ (Witness))

## Nunavummi Qaujisaqtulirijikkut / Nunavut Research Institute

phone:(867) 979-7279 fax: (867) 979-7109 e-mail: Box 1720, Igaluit, NU X0A 0H0 mosha.cote@arcticcollege.ca

#### SCIENTIFIC RESEARCH LICENSE

LICENSE # 03 055 11R-M

ISSUED TO:

Susan Ross

1421356 Alberta Inc.

PO Box 1845 Antigonish, NS B2G 2B0 Canada 902 870 7152

**TEAM MEMBERS:** 

S.Ross; M. Goodjohn, L. Havers, H.Mannik

AFFILIATION:

1421356 Alberta Inc.

TITLE: Socio-economic and Traditional Knowledge Studies in Relation to the Kiggavik

Project Environmental Impact Assessment, Kivalliq Region

#### **OBJECTIVES OF RESEARCH:**

The purpose of the research project is to collect socio-economic and traditional knowledge information sufficient to understand community interests in the Kiggavik Project, as input to an environmental impact assessment for Kiggavik Project permitting. The Kiggavik Project is a uranium project in the Kivalliq region. A summary Kiggavik Project description is attached as Appendix B, in English and Inuktitut. The objective of the socio-economic and traditional knowledge studies is to collect baseline data to enhance AREVA's understanding of conditions in communities potentially affected by the Kiggavik Project. The information will be used to assess potential and residual impacts of the Kiggavik Project on socio-economic conditions and resource use and to frame impact mitigation and benefit enhancement measures to be implemented by AREVA as conditions for Kiggavik Project approvals.

#### **TERMS & CONDITIONS:**

DATA COLLECTION IN NU:

DATES:

January 01, 2009-December 01, 2011

LOCATION: Arviat, Baker Lake, Chesterfield Inlet, Coral Harbour, Rankin Inlet, Repulse

. Bay, Whale Cove

Scientific Research License 03 055 11R-M expires on December 31, 2011

Issued at Iqaluit, NU on March 17, 2011

Mary Ellen Thomas Science Advisor

## Attachment B Household Questionnaire

#### Traditional Foods Questionnaire

Interviewer's name	Date
Household ID#	
Research Project Title: Socio-econo Project Environmental Impact Assess	omic and/or Traditional Knowledge Studies for the Kiggavik sment, Kivalliq Region
Name of Organizations: AREVA R (Golder)	desources Canada Inc. (AREVA), and Golder Associates Ltd

#### **Description of the Research Project:**

The purpose of the studies is to document socio-economic considerations and traditional knowledge in the area of the proposed Kiggavik Project, 80 km west of Baker Lake in Nunavut. The information will be used in the Environmental Impact Assessment for the Kiggavik Project.

As part of these studies, we would like to ask you some questions about your household's consumption of country foods and hunting and fishing patterns. The purpose of this questionnaire is to find out what kinds and amounts of traditional foods are eaten and harvested by people in Baker Lake. This work will help AREVA to understand what effects the Kiggavik project may have on Inuit access to traditional harvests. We are asking about 100 households In Baker Lake to answer the questionnaire.

#### Names of Principal Investigator:

Susan Ross Golder Associates Ltd. 1000, 6<sup>th</sup> Avenue SW Calgary AB T2P 3T1 Tel: 403 299 4663

Tel: 403 299 4663 Fax: 403 299 5606

Email: siross@golder.com

#### **Overview of Procedure:**

Representatives of AREVA and Golder have made presentations in your community on the Kiggavik Project and the environmental, socio-economic and traditional knowledge studies. We have received feedback from your community on the best way to proceed with the studies. We have met with individuals and groups in Baker Lake and other Kivalliq communities during 2009. In addition we would now like to talk to individual households in Baker Lake about consumption and harvesting of country foods.

It will take about one hour of your time to answer the questions we will ask about the traditional food you eat and harvest. We will note your answers on the questionnaire. The questionnaires will be securely stored by AREVA and/or Golder and will be copied and returned to you at your request.

Any information you give us will be completely confidential and will never be publicly attached to your name. The environmental impact assessment does not report information on individuals or families, but on the community as a whole.

At any time during this interview, you can refuse to answer questions and you can refuse to continue the interview and ask us to leave.

Please feel free to ask as many questions as you want throughout the interview. If we can't answer them for you, we will note your questions down and find someone who is able to answer.

After all the socio-economic and traditional studies are completed a report will be written on the information provided by you and others in your community. The report will sent to your community for review and comment, and any necessary changes will be made. The report will not identify the individuals who have provided information. Once the report has been reviewed by your community, we will use it to prepare the Environmental Impact Assessment for the Kiggavik Project.

#### **Benefits of Participating in the Study**

- Contribute to making the Environmental Impact Assessment submitted by AREVA more comprehensive in its consideration of potential socio-economic and traditional resource impacts.
- Assist people (including AREVA, the Government of Nunavut, regulators and your community) to better understand and manage the socio-economic and traditional resource impacts (both positive and negative) of the Kiggavik Project.

#### Possible Risks of Participating in the Study

• The information in the report, once comments are integrated, may be incorporated into the discussion of the potential for socio-economic and traditional resource impacts in the Environmental Impact Assessment, a document that will be distributed in the public domain. However confidentiality concerns will be respected.

#### CONSENT TO PARTICIPATE IN THE STUDY

I,	,	give permission to	<b>AREVA</b>	Resources	Canada	and
G	older Associates Ltd. to interview me.					

I have been fully informed of the objectives of the research project being conducted. I understand these objectives and consent to being interviewed for the project. I understand that steps will be undertaken to ensure that this interview will remain confidential unless I consent to being identified. I also understand that, if I wish to withdraw from the study, I may do so at any time without any repercussions.

#### Having read the above:

☐ I agree to participate in an interview about my household's consumption of country food and hunting and fishing patterns.

I do not agree to participate in an interview about my household's consumption of country
food and hunting and fishing patterns.

SIGNED:				
DATE: Participant				
SIGNED:		<del></del>		
DATE:				
Researcher				
SIGNED:				
DATE:				
Witness				
Inuit:	Yes	No		
Age:	15 to 20	21-40	41-60	over 60
Gender:	Male	Female		

Part 1 – Frequency of Traditional Food Eaten

Traditional food is food that comes from the local land and environment (animals, fish, birds, wild plants). For last winter (in December, January and February, please tell us as well as you can remember, how many days per week your household ate each of the following foods (or how many days in total if you ate this food less often).

		Frequency (number of days)	Comments				
Species	Part	Per week or per season					
Mammals							
Caribou Yes No	)						
	organs						
	meat/bones/cartilage						
	milk/blood						
	fat						
	other						
Musk ox Yes N	0	<u> </u>					

		Frequency (nu	imber of days)	
Species	Part	Per week or		Comments
	organs		<b>,</b>	
	meat/bones/cartilage			
	milk/blood			
	fat			
	other			
Fox Yes No		l e		
	meat/bones			
	other			
Grizzly Yes No				
	organs meat/bones			
	fat			
Mak Van Na	other			
Wolf Yes No	1			
	meat/bones			
	other			
Wolverine Yes	No			
	meat/bones			
	other			
Birds		•		
Diving ducks Yes	No Specify:			
	eggs			
	organs			
	meat/bones			
	fat			
	other			
Geese and swans	Yes No Specify:			
Occoc and swans				
	eggs			
	organs meat/bones			
	fat			
Food (atoms bearing to	other Occasife			
Fowl (ptarmigan ty				
	eggs			
	organs			
	meat/bones			
	fat			
	other			
Gulls and terns Y	es No Specify:			
	eggs			
	organs			
	meat/bones			
	fat			
	other			
Fish		1		
Trout Yes No				
	eggs/roe			
	organs			
	meat/bones/skin			
	fat			
	other			
	Ottiel			

	D	Frequency (number of day	vs)
Species	Part	Per week or per season	Comments
Whitefish Yes	No		
	eggs/roe		
	organs		
	meat/bones/skin		
	fat		
	other		
Burbot Yes No	)		
	eggs/roe		
	organs		
	meat/bones/skin		
	fat		
	other		
Grayling Yes I	No		
	eggs/roe		
	organs		
	meat/bones/skin		
	fat		
	other		
Char Yes No			
	eggs/roe		
	organs		
	meat/bones/skin		
	fat		
	other		
Shellfish Yes I	No Specify:		
Other Yes No	Caccifu.		
Other Yes No	Specify:		
	eggs/roe		
	organs		
	meat/bones/skin		
	fat		
Land Black	other		
Land Plants			
Cloudberry Yes	No		
Crowberry Yes	No		
Bog/rock cranberry	Yes No		
Blueberry Yes	No		
Other Yes No		L	L
-	. ,		

The following is a list of statements about traditional food. For each statement, please indicate whether you agree (A), disagree (D) or have no opinion (N/O):

Harvesting and eating traditional food:

- a. Contributes to physical fitness and good health
- b. Is a favourite outdoor recreation activity

- c. Provides people with healthy food
- d. Keeps people close to nature
- e. Favours sharing in the community
- f. Saves money
- g. Is an important part of the culture
- h. Is an occasion for adults to teach responsibility to their children
- i. Is one way to practice spirituality
- j. Keeps people humble (not proud or boastful)
- k. Provides education on the natural environment
- 1. Contributes to children's education
- m. Provides skills in survival
- n. Provides skills in food preparation at home
- o. Is an opportunity to teach spirituality
- p. Is an opportunity to learn patience
- q. Is a way to strengthen culture

#### Successful harvest:

- a. Brings respect from others
- b. Builds one\s pride and confidence

What traditional food do you like to eat the most?

None	_
First	
Second	
Third	_
Don't know	
What traditional food do yo	ur children like to eat the most?
None	_
First	_
Second	
Third	_
Don't know	_
Doesn't have children	
What traditional foods do ye	ou not like to eat?
None	_
First	
Second	_
Third	
Don't know	

What traditional foods do your children not like to eat?

Second	
Third	
Don't know	
	dren
What traditional fo	Foods do you think is better for your health?
None	
First	
Second	
Third	
Don't know	
What traditional for	Goods do you think are worse for your health?
None	
First	
Second	
Third	
Don't know	
	one who ever got sick from eating traditional foods?
	)
Yes No	
Yes No	
Yes No	
Yes No  If yes, please expl	
Yes No  If yes, please expl  Are there any trad	lain ditional foods that you buy?
Yes No  If yes, please expl  Are there any trad  None	lain litional foods that you buy?
Yes No  If yes, please expl  Are there any trad  None  First	lain ditional foods that you buy?
Yes No  If yes, please expl  Are there any trad  None  First  Second	lain litional foods that you buy?
Yes No  If yes, please expl  Are there any trad  None  First  Second  Third	lain ditional foods that you buy?
Yes No  If yes, please expl	lain ditional foods that you buy?
Yes No  If yes, please expl  Are there any trad  None  First  Second  Third	lain ditional foods that you buy?

Are there any	traditional foo	ds that you would	d like to be able to buy?	
None				
First				
Second		_		
Third				
Don't know _		_		
Are you eating	g more, less or	about the same a	amount of traditional food	than:
5 years ago?	More	Less	Same	
10 years ago?			Same	
Were you livii	ng in this com	munity:		
5 years ago?	Yes	No		
10 years ago?		No		
Are you eating	g about as muc	ch traditional food	d as you like to?	
Yes	No			
		Part 2 – Hunt	ting Activity	
How many pe	ople live now	in your househol	d?	

Name/number	1	2	3	4	5	6	7	8	9	10	11
Age: <5, 5 to 18 or 18+											
male or female											
hunts											
occasional											
active											
intensive											
traps											
occasional											
active											
intensive											
fishes											
occasional											
active											
intensive											
collects plants											

occasional						
active						
intensive						
collects eggs						
occasional						
active						
intensive						

Note: Definitions below are (from NWMB, 2004)

Occasional: Does not engage regularly in harvesting (only a day or two every now and then) participation is usually short term (day trips and weekends)

Active: Regularly engages in a limited number of harvesting activities year round.

Activity can be short, but intense. Time commitment is more than day trips/occasional weekend.

Intensive: Repeatedly and regularly engages in almost all types of harvesting activities year round. There is always country food in the household.

Can the hunters in your household go hunting as often as they like to?

Yes No

If no, why can't they go hunting as often as they like to?

#### First reason:

- 1. Lack of equipment
- 2. Broken equipment
- 3. Little money for ongoing costs (gas, ammunition, maintenance)
- 4. Little time because of Employment School Child care
- 5. Difficult access to good places
- 6. Changes in wildlife
- 7. Other (specify)

#### Second reason:

- 1. Lack of equipment
- 2. Broken equipment
- 3. Little money for ongoing costs (gas, ammunition, maintenance)
- 4. Little time because of Employment School Child care
- 5. Difficult access to good places
- 6. Changes in wildlife
- 7. Other (specify)

#### Third reason:

- 1. Lack of equipment
- 2. Broken equipment

<ol> <li>Little money for ongoing costs (gas, ammunition, maintenance)</li> <li>Little time because of Employment School Child care</li> <li>Difficult access to good places</li> <li>Changes in wildlife</li> <li>Other (specify)</li> </ol>
Can the fishers in your household go fishing as often as they like to?
Yes No
If no, why can't they go fishing as often as they like to?
First reason:
<ol> <li>Lack of equipment</li> <li>Broken equipment</li> <li>Little money for ongoing costs (gas, maintenance)</li> <li>Little time because of Employment School Child care</li> <li>Difficult access to good places</li> <li>Changes in fish</li> <li>Other (specify)</li> </ol>
Second reason:
<ol> <li>Lack of equipment</li> <li>Broken equipment</li> <li>Little money for ongoing costs (gas, maintenance)</li> <li>Little time because of Employment School Child care</li> <li>Difficult access to good places</li> <li>Changes in fish</li> <li>Other (specify)</li> </ol>
Third reason:
<ol> <li>Lack of equipment</li> <li>Broken equipment</li> <li>Little money for ongoing costs (gas, maintenance)</li> <li>Little time because of Employment School Child care</li> <li>Difficult access to good places</li> <li>Changes in fish</li> <li>Other (specify)</li> </ol>
Can you estimate how many of the following your household harvested in the last year?
CaribouBeluga

NarwhalSeal						
Char						
Birds						
Other frequently harv						
Does your household	share any part	of your h	arvest with:			
Other family member	s outside this h	ousehold	? None	Little	About half	Most
Friends? None	Little Abou	ıt half	Most			
Elders? None	Little Abou	ıt half	Most			
Community generally	? None	Little	About half	Most		
Does your household	sell any part of	f your har	rvest?	Yes	No	
(If yes) Please explain	1					
Are you teaching you	r young (5 to 1	8 years)	children:			
To hunt?	Yes	No				
To fish?	Yes	No				
Doesn't have young c	hildren.					

# Attachment C Summary of Focus Group Discussion and Interview Results

- 1. FOCUS GROUP DISCUSSION AND INTERVIEW RESULTS BY COMMUNITY
- 2. FOCUS GROUP DISCUSSION RESULTS (GROUPS FOR HUNTERS, ELDERS, YOUTH AND ROTATIONAL WORKERS AND SPOUSES)
- 3. FOCUS GROUP DISCUSSION AND INTERVIEW RESULTS, BY AND/OR ABOUT WOMEN

#### SUMMARY OF FOCUS GROUP DISCUSSION AND INTERVIEW RESULTS

Note: Focus group discussions and interviews largely took place in 2009 thus some comments may no longer be timely.

#### FOCUS GROUP DISCUSSION AND INTERVIEW RESULTS BY COMMUNITY

#### Arviat

- 50% of the population is on social assistance or unemployment insurance.
- A health committee was formed in the '70s, originally to develop a birthing centre in Arviat.
- A lot of police activity is alcohol related and almost all violence is alcohol related.
- About 300 people a month drawing social assistance. A single person gets about \$300 per month and a mother with two children would get about \$400 per month after claw backs.
- · Alcohol abuse is more a problem for the unemployed, but employed people do get drunk
- Alcohol and drug abuse is essentially 'self-medication' in face of lack of services to deal with problems.
- Alcohol problems are not really visible in the community
- All government assistance is grants. Loans come from the private sector.
- · Although Arviat is quite a religious community, many people see going to church as more important than understanding and living the lessons the church tries to deliver.
- · Although Arviat was a settlement by the late 1950's, people who came to live there still went out on the land for many months of the year, returning to Arviat to purchase things at the Hudson Bay Co. Families could be out on the land from August until May the following year, however, there were no calendars or celebration days so dates and months are sketchy.
- · Although high school graduates are fit and strong, many of them may not have quite the language (English), literacy and numeracy skills they need to succeed in the work place.
- · Although sometimes an alcohol related incident sees both (or more people) drunk, most often it is one who is drunk and the other who is not.

- · Any economic opportunity is of interest to people in Arviat. Mines are sources of employment and encourage people to stay in school, to get training.
- · Arts and crafts are marketed through the Co-op, the Northern Store and Qilik. Also, when regional/territorial meetings are held, there is direct marketing.
- Arviat feels a bit 'forgotten' in terms of access to resources in comparison with other communities in Nunavut.
- Arviat finally got a birthing centre but last year Rankin Inlet took their midwife and now there are no facilities for women to have children in the community so most are sent to Winnipeg. This is very negative and tradition around birth is extremely important to sense of identity and confidence is the health of children. This breaking of tradition around birth has contributed to family dysfunction.
- · Arviat government is pro-development because kids need choices. Education gives kids choices as do more employment opportunities.
- Arviat has a long memory as a community for things they feel were done to them. The relationship with the Government of Nunavut is not good.
- Arviat has a really serious shortage of housing, which results in pretty bad overcrowding.
- · Arviat has good nursing, with seven nurses, three of whom are Inuit, and some of whom have been in the community for many years.
- · Arviat has no mental health workers because there are no statistics to demonstrate the need, but without a mental health centre there is no way to demonstrate need, there is nobody to collect statistics.
- · Arviat has the highest rate of community based MRSA in Nunavut and pregnancy rates are very high both are related to crowded housing. But unemployment is the root cause.
- Arviat has the same issues as other communities generally. Economic activity is constrained by a shortage of investment and distance to markets. There are drug and alcohol problems.
- Arviat has very high unemployment and mining brings jobs.
- · Arviat has very high unemployment and there are few available jobs in the community. Nothing economic is really going on.
- · Arviat is a 'pro-police' community. People trust the police, and come to ask for help with all kinds of things, including for example help with preparing tax returns.

- Arviat is a dry community, and has been since the '70s. So there is not drunkenness on the street as you can see in other communities. Being dry helps about 75% of people, the rest have a problem anyway.
- Arviat is a religious community, and the churches (four of them) do try to focus on helping the young.
- Arviat is a religious community.
- Arviat is a very nice community to live in.
- · Arviat is a very traditional, very cohesive community well known for the independence and entrepreneurship of its people. It was the last settled community in Nunavut. Language is very strong, as are values and beliefs.
- Arviat unemployment is about 70%.
- Arviat would like to take the opportunity to participate in designing training programs, including having training done in the community.
- · Arviat's economic development plan might need to be more aggressive on creating formal sector jobs, maybe it focuses too much on economic activity rooted in traditional activity.
- · Bad responses to increased disposable income are more a worry in Baffin Region than in Kivalliq.
- Because of Arviat that there are now high schools in all communities. Originally children were expected to go to Rankin Inlet, but parents in Arviat refused to send their children away, essentially home schooling them instead. That program developed into a more formal high school in Arviat and eventually the big high school was built.
- Beluga migrate north hugging the coast by Arviat then strike out to deeper water to travel up to Coral Harbour. They travel up in June and July and back in September. They are thought to breed in the south, near Churchill.
- Both hunting and having more money has a good effect on nutrition.
- Both the Beverly and Qamanirjuak herds migrate through the Kiggavik area.
- Break and enters are sometimes done to steal stuff, but most often it seems to be food. Kids break into community facilities, such as hotels and the day care centre) to get food rather than into people's houses to steal stuff.
- Businesses need to have strong training, intended to allow people to succeed and move up in the business.
- · Children are rarely taken away from families, although sometimes from a poor parent or situation to place the child with other family members.

- · Children seem less interested in cooperating with parents and there are intergenerational problems.
- · Church going seems to be declining although it may be increasing again.
- · Classes in the CLC have a maximum of 14 students, but if 14 start a program the numbers that finish are closer to 9 or 10 typically. The CLC will take just about any student over 18 and out of high school for at least one year.
- · Communities can't really say 'no' to mining projects because they need jobs so badly, so they have to say 'yes' even though they don't really want mines in Nunavut.
- · Concern about the AREVA project is mostly around how soon it can go forward, this is the talk about the project in Arviat.
- Day care facilities are stretched.
- Decentralization of government was supposed to bring jobs to Arviat and there are about 100 of these but the population is big and growing fast so job creation has not kept up.
- Drugs are a problem in families, specifically cannabis.
- Drugs are very expensive, up to five times more expensive than in the south. Drugs are ordered over the internet, and mailed to people. It is hard for Canada Post to discover the drugs in the mail, the smell etc. is camouflaged, the internet operations are pretty sophisticated in their organization with addresses etc. continuously changed.
- Drugs contribute to poverty. Cannabis products are addictive, and people start not only using their money to buy drugs, but eventually start selling family property. This in turn leads to family conflicts.
- Economic development also need to focus on assistance to small businesses, such as small engine repair and arts and crafts businesses. They need help with business plans, and funding for insurance (e.g. for outfitters) tools and small capital equipment.
- · Economic Development and Transportation provides HTOs with funds to go hunting for food to distribute country food in the communities.
- Education is extremely important to people in Arviat the community has produced three Inuit nurses and about 30 Inuit teachers, more than any other community in Nunavut.
- · Elders are finding it difficult to figure things out and finding it hard to talk to the young about things the elders have no experience of.

- Elders are in favour of the mine for the jobs that it will bring but want assurance that there will not be disturbance of the caribou that they have depended upon all of their lives. If migration routes are affected, the caribou may move too far away for people to hunt.
- Elders say that country food tasted better than now. Some attribute this to helicopters and airplanes flying over, causing changes to the air that animals breathe.
- Employment can have both good and bad effects. Bad effects include drugs and alcohol, but some people also become greedy and may not share as much as they used to or should. Good effects are that people can buy the equipment they need to go out on the land.
- · Employment changes people's attitudes about themselves, they discover and take pride in the fact that they can support their families.
- Employment come other issues, but these issues are there already and without employment there are not the resources needed to address these other issues. The cycle needs to be broken.
- Employment would be a better experience and easier for people to manage if companies took more care to provide positive feedback and recognize good performance. Often it seems that the only things that are talked about are the bad things people do.
- Even the more marginally employable people now successfully working for exploration companies it is not just the young, educated people who are getting and keeping jobs with the exploration activities.
- Even traditional activities that used to earn people money (such as trapping) do not bring a decent return any more. The animal rights activists are ruining markets, and lowering prices.
- Every spring geese come into town and swim in the sewage lagoon. "This is the problem with development".
- Exploration activity has provided some amount of training but unfortunately it is slowing down in 2009. Arviat has 50 trained drillers but now there is no work for them.
- · Grandparents are quite involved with their grandchildren, but can find it hard to speak about problems.
- Groups settled in Arviat spoke different dialects. Inland people were brought to Arviat in the mid to late 1950's. The hamlet consisted of an RCMP post, Hudson Bay Co., Catholic and an Anglican Mission.

- · Hamlet budget is approximately \$7 million, made up of grants (\$2 million), water and sewage charges (\$2 million), contracts (\$2 million) and miscellaneous sources of revenue (\$1 million). Contracts are things like funding made available for specific positions such as the EDO and the justice committee, airport maintenance fees, etc.
- Health planning is intimately linked with economic activity wellness plans since 2000 have identified increasing employment as the priority in Arviat.
- · Higher employment inevitably results in a need for more police, just because people have more money to spend, buy things, are out in the community more.
- · However not a lot of people are able to complete the training for the highly skilled trades.
- In Arviat, there are lots of people trying to upgrade their driving licenses but to upgrade from a class 5 to a class 3 it is necessary to go to Morrisburg in Ontario. It would better if at least part of this course could be delivered in Arviat as people find it easier to stay in their communities but maybe to have the necessary equipment in Arviat to do hands on training is unrealistic.
- · Income support is a last resort program but a lot of people have to use it because there are no jobs in Arviat.
- Inland hunters did not have knowledge of sea mammal hunting techniques.
- · Inland people were brought to Arviat, (forcibly in some cases), because of a sudden decline or disappearance of caribou and the risk that people would starve. In Arviat, food sources were abundant and included sea mammals such as seals and whales.
- · It is important to encourage the young to get out of Arviat and see some of the world, to see that there are alternatives to drug and alcohol use.
- It is important to train in the community if trainees are going to succeed.
- Keeping kids in school therefore requires strong support from parents.
- Kids are trying harder to be adult at a younger age and in face of so many temptations.
- · Kids are very good at learning in a doing environment but struggle much more with books in a classroom.
- · Kids have a hard time going away to school. They are embarrassed at having to do catch up classes as they are older than their classmates. They miss their communities.
- · Kids that go on to postsecondary struggle, having to do catch up studies etc. so the high school counselor works with the institutions they go to, giving a heads up on the kids so that there is some hope of special support to get them through.

- Language (English) seems to be the biggest challenge really English is a second language and learning it may require the kind of ESL support that is given to immigrant children in other schools.
- Last year people saw a big group of killer whales, but this was very unusual.
- Last year there were 20 high school graduates, the highest number in recent history which typically has seen 13 to 20 students graduate. The estimate is that about 50% of potential graduates (based on school intake) are lost for various non academic reasons.
- Mandate of social services is largely child protection, including physical, emotional and basic human needs safety, following the child protection protocol. They intervene for child protection and also do some counseling and follow up. Social services averages about 15 calls per month. There are four staff in total, all Inuit.
- · Many parents and elders just wonder what is going on with their kids because they don't understand about drugs, don't understand the things that kids understand and do.
- · Mine employment training focus in Arviat is in heavy equipment operation, and upgrading driver's licenses.
- · Mining companies need to accept that the training challenges will require a long term approach.
- · Mining companies need to implement better worker orientation programs, not only to the equipment people will be using on the job but also to pull people together to work as teams, to get over various prejudices people have about each other.
- Mining jobs are particularly suited to Inuit as the jobs are very hands on
- More employment would be very good for Arviat there are few jobs in the community and employment is good for people.
- More kids are graduating from high school and mining won't be their only choice of employment in the future.
- More social services are needed to address problems. But the problem with providing services is that the population is growing so fast.
- More than half of adults in Arviat carve, sew etc. to make money.
- More than half of social assistance cases are single people, rather than people with families, including a lot of high school graduates.
- Most people are employable there just are no jobs for them.
- · Most students at the CLC are people who have been out of high school for some years, those that never completed high school. So CLC offers upgrading classes (GED is offered every year), as well as specialist classes.

- Most training is fully funded but it is quite competitive to get a training place
- · Much has changed in Arviat. There are all sorts of new things to buy, but there are no jobs for people to earn the money to buy these new things that they want.
- · Narwhal are only occasionally seen in Arviat, and bowhead are found only in deeper water but in any case people are not allowed to hunt bowhead in western Hudson's Bay.
- Ongoing surveys continue to identify over crowded housing and poverty as the main determinants of community health.
- · People are not allowed to go south towards Churchill to hunt because government wants to protect tourism.
- People are now more likely to talk about crimes, so the police can catch the people who commit them.
- People are really not very good a managing money.
- People are resistant to going elsewhere to look for work or take up a job because they really don't like to leave their communities. Most people will choose to stay home and unemployed rather than leave.
- · People are starting to notice that there are fewer char in some of the major rivers, but maybe this to because of a growing population of harbor seals.
- People in Arviat generally believe that the AREVA project will proceed and will be implemented safely, that is that the environment will be well managed, including through monitoring.
- · People in Arviat have stronger Inuktitut. Baker and Rankin in particular, where there are more white people, use Inuktitut less.
- People in Arviat know what they want and how to go about getting it.
- People mostly hunt harbor and bearded seal and beluga whale.
- People need jobs to finance hunting.
- People seem to be doing more training, because they feel that employment prospects are getting better.
- People talk negatively about the Inuit. But things are changing very fast for the Inuit. The world is changing, the Inuit once depended on the land but can do so no longer. They are stuck in communities.
- People want to stay in the community, and people who leave try to come back. The first reason for this is that they feel their kids are losing their language.
- · People who want to start businesses can also apply for bank loans.

- Population growth in Arviat has the result that all community facilities are bursting at the seams. The health centre is the busiest in Nunavut. But there are resource constraints there are no mental health workers in Arviat and the school is short 17 teachers.
- Population growth is very high, so housing is critical. There are 600 people waiting for houses and the wait time is about 7 years now.
- Ring seals are mostly found at Nunallo on the border with Manitoba. There seem to be different types of ring seals, varying in size from 2 to 5 feet. The bigger they are the smellier they are.
- Rotational work gives people choices about how they spend their time off.
- Rotational work is good, because it allows people to stay in their communities, which is important.
- Rotational work is particularly appropriate to the Inuit because it provides employment where the work is without requiring people to leave their communities.
- Schools, the RCMP and relatives refer children to social services.
- · Short term training courses are more often taken by older adults or kids that have dropped out of school, not high school graduates.
- · Some believe that other communities got at least a few hunting tags (whereas Arviat got none) but others believe that no community in Kivalliq got anything other than defense kill tags.
- Some hunters sell what they hunt.
- · Some kids may deliberately stay in school, longer than they would need to, delaying getting the last couple of credits, because they are unsure about what to do if they leave.
- · Some people think that the huge increase in MRSA is a result of mining activity, a result of air borne contaminants.
- Some walrus are hunted as well, they come south from Wager Bay in June.
- Students are encouraged to get out of Arviat for a while, for example through exchange and entrepreneurial programs so that they learn about things outside the community.
- · Substance abuse in Arviat is less visible than in many other communities so it is hard to judge how big a problem it actually is.

- · The biggest constraint for social services is that staff need to learn to manage their time better. If they could do this, more would get done.
- The biggest need in Arviat is more recreational facilities, primarily for youth programs. Arviat needs a new hamlet office.
- The church does not really get involved in political issues which would include taking a position on whether or not a mining project should go forward.
- The church does try to help people to live better.
- The churches all operate independently in the community, although they will come together in response to a big tragedy. For example they joined together to fight Satan worship in the community when they discovered that a teacher was getting kids into this.
- The churches message, taken from the bible, is that alcohol makes people lazy and that drugs make eyes red and makes people poor. The bible talks about what doing bad things does to people's behaviours and lives, what people will be like if they do specific things.
- The circuit court comes in once a quarter.
- The CLC can offer just about anything if there is enough demand in Arviat to warrant bringing a specialist teacher in. Otherwise students have to go somewhere else to get specific courses.
- The community is very proactive and innovative. The hamlet is very serious about going after mining jobs.
- The drug and alcohol problem in Arviat is already bad and may become worse with lots of employment.
- The early childhood centre has also emphasized training of staff and there are now about 30 well trained staff working there.
- The economic development plan is still in draft.
- The first school was opened in 1959.
- The government needs to proceed more carefully than it has in the past with approving mining projects.
- The Government of Nunavut is looking at options for different ways of graduating kids from high schools currently they need to finish grade 12 and write the Alberta school leaving exams. Perhaps there are different options (streaming) that would provide kids with a graduation of some type.
- The hamlet is trying to get out of debt, which happened because of lack of experience in managing finances.

- The hamlet will want to negotiate their own agreement with mining companies as they don't seem to get anything through the KIA.
- The high cost of living and the high cost of transport, with markets in the south, is a major constraint to business development.
- The high school has about 340 students and a total staff of 29. It is not at capacity but soon will be because of the high birth rate in Arviat. Student body has grown by 50 students in the last five years.
- The high school offers all of the maths, all of the sciences except physics and has tried to focus on trades (mostly wood working but would like to expand into electrical and energy efficiency) and technology (IT and distance learning). AREVA and Agnico-Eagle have assisted with lap tops.
- The high school tries hard to follow up with graduates, and support the ones that go on to higher education. 8 of the 20 graduates went on to postsecondary, and a few of the others might still do so, this year for example. Sometimes it is a struggle, but so far the 8 are managing. Other graduates are working. Some don't continue on not necessarily because they don't want to but because their parents are not ready to let them go.
- The HTO provides some food to the community. The food bank distributes only southern food.
- The Inuit are very family oriented so they gravitate towards the home and family.
- The justice committee's emphasis is on parenting, in response to a recent increase in young males stealing food and stuff (breaking and entering). However parents are not responding well to calls to attend meetings to see how parents can take more responsibility for helping their children stop doing bad things. And parents are gambling too much. The justice committee sometimes also takes responsibility for 'managing' young offenders that the RCMP and the courts do not want to send to jail.
- The main drivers for the need to intervene are poverty (even the employed can be poor if they spend a lot of money on alcohol and drugs) and poor mental health of parents.
- · The middle generation is quite caught between traditional parents and very modern kids, who really want and depend on a lot of material possessions.
- · The need to fly to Winnipeg to give birth is bad because it means girls have to leave school for a significant amount of time, breaking up their schooling.
- The numbers of beluga are very large now but they expect quotas will come soon because there are also very many hunters.

- The RCMP centre for all of Nunavut is in Igaluit. If there is a crisis and help is needed, it can only come by plane from Igaluit, which is very far away.
- The RCMP have one corporal and two sergeants, so for six months of the year there are only two RCMP in the community at one time. There is a need for one more officer, not because crime is increasing but because the community is growing so fast.
- The RCMP therefore tries to work with the community, because they realize that if there is an emergency of some sort, they will need the support of the community to manage it.
- The science methods harm an animal's ability to be themselves. Polar bears can't be hunters with collars around their necks. Tagging and tattooing caribou makes the meat tougher. Normal animals can cope with the disturbance of vehicles and boats, but are disturbed by these things if they are collared.
- The wellness plan focuses on youth Arviat probably has the best programming for children in Nunavut (head start focuses on parenting, there is a pre-school intervention program, a healthy moms and dads program, etc.)
- The young would rather listen to the media and each other than to the elders.
- There a particular problem with elder abuse although this does happen.
- There are a few outfitters in town, but tourism is a seasonal, low volume business and there are no facilities in town to receive cruise ships.
- · There are enough pregnant/mothering students that the high school should have a day care in the school.
- · There are high school attendance challenges, so the school looks for ways to encourage kids to come to school, so that school is an interesting place to be.
- There are lots of committees in Arviat (health, justice, interagency, early childhood, recreation, etc.) and they are complementary but can't be combined into a single committee as each already has a large mandate without being responsible for everything else as well.
- There are lots of people having meetings and making plans to do things to improve life in the community, but that little action results. This may be because of a shortage of resources (money and people).
- There are lots of polar bear around but Arviat got no hunting quota this year (they have some tags for defense kills). Scientists did a poor inventory count –they came in July and didn't find many polar bears but that is normal in July. Arviat was so full of polar bears in October and November that they had to establish patrols to protect people. People were afraid to go out.
- There are no jobs to be found in Arviat and the problem will get worse because the population is very young.

- · There are not enough postsecondary opportunities, particularly in the community.
- There are only about four or five families in Arviat who are foster parents.
- · There are problems with intergenerational relations, but people do not want to speak of these things.
- There are pros and cons to mining. It might affect caribou migration and people depend on caribou. But it is very hard to find jobs in Arviat, business is not growing and young people are on social assistance.
- There are some services for the young, including parenting programs, head start, child care, help from community justice outreach worker and early childhood early steps. But there need to be more.
- There are treatment centres in Nunavut, but drug and alcohol treatment is only available outside the territory.
- There are worries about air borne contamination as the prevailing winds are from the west. They are already seeing cysts in stomachs, swollen joints etc. in caribou and MRSA in people. It is possible that blasting at Kiggavik is sending contaminants into the air, which land on the plants that caribou are eating.
- There aren't many people who are drunk all the time. The problem is more binge drinking, and the consequences of this.
- There have been a lot of changes in Arviat over the years. On the good side, there are more activities for children. On the bad side, traditional life is getting less important, which is not good for the mental health of children or parents.
- · There have been differences over time in the animal skins. There are yellow things in the skins of polar bear and seal, and the same sort of thing in whale skin.
- There is a disconnect between southern expectations and northern learning styles. Inuit learn by doing and don't respond very well to classrooms. Training programs need to be hands on.
- There is a geology position in Arviat, with the main focus looking for soapstone as most of the carvers have none and are having trouble getting it. One of the difficulties is that quarries can be found and worked during the summer, but the stone can only be hauled in the winter.
- There is a lack of parenting skills, particularly among young, uneducated mothers.
- · There is a lot of pressure on the young kids have so many more options than their parents had and are expected to make something of these.
- There is a lot of talk about Inuit having stomach problems from eating caribou and about people worried about the safety of country food.

- · There is a sense of loss in the community, as traditional options decrease but there is no hope for the future.
- · There is an interagency committee but the hamlet wants to take it over so that its work can become more broad based.
- There is an issue around managing increased incomes, people do need help to be financially prudent and to parent better.
- There is fear of lifestyle changes with development but people also say that the next generation is important and they need jobs.
- There is lots of gambling in the community, both bingo and cards. At Christmas, they cut back on radio bingo in the hopes that people would spend bingo money on their children, to do something special for families at Christmas.
- There is no guiding activity in Arviat now that the polar bear hunt is finished. This represents a significant loss to the community as last year they had seven hunt tags at \$25,000 each.
- There is no more sport hunting for polar bear, the few tourists that come hunt caribou.
- There is nothing available in the community to address alcohol problems, for example there is no AA program, no alcohol counseling available.
- There is tension in trying to live both a traditional and more modern life. It is particularly hard for people to understand how to resolve problems in ways that combine the two very different lives.
- There was good hunting close to Arviat but in the past people were mobile and would travel long distances to find good places to fish and hunt. People went to Whale Cove because it was a good place to hunt beluga. Elders say that wildlife and sea mammals are still plentiful around Arviat that nothing has changed.
- · To the extent that Glad Tidings goes in for social ministry they focus on parenting, cooking and home financial management.
- · Training is funded by Kivalliq Partners in Development and the Nunavut Department of Economic Development and Transportation and is delivered by Nunavut Arctic College.
- Unemployment a very big problem in Arviat.
- Violence against children is not a big problem.
- · Waiting lists for treatment centres outside the territory are a problem.
- · When people get into trouble from drinking, they are most worried about getting out of trouble to get to work on time.
- When people really get into trouble, they are sincere in wanting help, but there is very little in the community to help them.

- When traditional activity reduces, so does knowledge.
- · While all types of families get into trouble, it seems that it is mostly female single parents who are more in need of help with children.
- · While there are more kids graduating from high school, and graduating with high expectations, there are no jobs for them.
- · With a lot of people working, there would be less country food in the community. Meat can be bought at the store, but it is expensive and people do not have money.
- · Women did not hunt sea mammals because it was dangerous. A women might learn to hunt if she did not have any brothers so her father taught her the skills. More typically, women would go out on the land with their husbands and stay at the camp to dry meat and cook.
- · Young people are less likely to go out hunting and eat less country food than older people who eat country food every day. Young people tend to get their country food from the older people in their families.
- Youth are in an identity crisis, in face of so many changes, expectations and temptations.
- · Youth need more than their own desire to live a clean life, more than a church service. There is not enough counseling in the community.
- Youth seem to prefer going to the dances over going to Friday night church services at Glad Tidings.
- · Youth suicide has been much lower than elsewhere in the past but is starting to rise as family and intergenerational relations get more complicated.

# **Baker Lake**

- A big reason for little vandalism in Baker Lake has been the youth drop in centre (with computers), which kids really love.
- A good sports program that keeps kids interested contributes to them staying clean.
- A lot of young people are doing drugs. But it is not like you see drug affected people on the roads more than before.
- About 70 people (on average) from Baker Lake work for Meadowbank.
- Adaptability is an Inuit virtue (an example is the inclusion of throat singing in hip hop performances) and needs to be a non Inuit virtue for those who live in the north.
- A-E has a gym, but the Inuit don't really use it they don't need to exercise outside their work.

- · A-E, during bad weather, tries to shift work to easier, less dangerous jobs because of the difficulties of getting people out if there is an accident.
- Agnico-Eagle isn't really doing much in the community other than an annual feast which is nothing.
- · All feel that it is really important to train the Inuit, keep them in school, help people to finish high school so they can advance on the job, provide on the job and literacy training. They know people who would be good workers, but can't get jobs because of education gaps.
- All felt that they were learning on the job examples include labourers who have become drivers.
- All Inuit should be able to get jobs at the mines near Baker Lake.
- Almost everybody knows somebody working in the mining sector.
- Although everybody doesn't hunt everything, there is hunting and gathering of caribou, fresh and salt water fish, grizzly bears, musk ox, wolves, wolverines, arctic hare, foxes, walruses, harbor and bearded seals, beluga, snow geese, ptarmigan and the eggs of other birds.
- Animals that are chased have harder meat than animals that are killed on the spot.
- As children (1940s/1950s), people only saw a grizzly occasionally. They are seen all the time now. Grizzlies now take cached meat.
- Assertiveness is not the preferred communication style of the Inuit.
- At the time people were first settled in Baker Lake, they were told by government scientists not to collect eggs and not to hunt musk ox. Some people had to, to eat, and had various ways to hide this activity from the RCMP who would charge people if they were found out.
- Baker Lake focuses on sport for youth and is becoming a sport power house in the region.
- Baker Lake has a new, bigger middle class with Meadowbank. There is a lot of new money in town more vehicles, the northern is busier and there is better quality food in the stores.
- Baker Lake has always been changing.
- Baker Lake hunters want to use the mine road for hunting, but the licence doesn't allow it.
- Baker Lake is a great place to live now, and children have a brighter future here than in other communities.

- · Baker Lake is different now, there is a lot more activity this summer, more dust and clearly more money in town.
- Baker Lake is the best run in Kivallig, the council is very fiscally responsible.
- Baker Lake is very pro police people apologize for getting into trouble.
- Baker Lake wants an upgraded airport, which would cost \$35 million. Such an airport could service various mine sites, and help Baker Lake as well.
- · Baker Lake would like to build a new dock, the existing one in town is a health and safety hazard.
- Baker Lake's population is growing, and having to house relatives that come to Baker Lake to work is a problem.
- Because younger people are less likely to go out on the land, there are businesses in Baker Lake with people who go hunting and fishing and sell the product to others.
- Before deciding whether to support or oppose the project, people need more information to understand what is going on, what the project will mean.
- Benefits of employment at Meadowbank include lots of food (workers come home chubby)
- · Berries would fix people who were not able to eat meat, after eating the berries they could eat meat again.
- Both workers coming home after a hard rotation and spouses who have cared for children want a break so when they meet again at the end of a rotation they can get into fights.
- · Break-up seems to be quicker and more sudden. There used to be puddles on top of the ice.
- Buying boats, cars and snow machines allows people to hunt and fish more than before.
- Canada goose nesting areas have moved further north and are found around all the small lakes.
- Caribou and fish are the most important wildlife for food. People also like to hunt ptarmigan a lot, and other small birds.
- Caribou cross all along the Thelon River at various times.
- · Caribou mate everywhere. When there is a little snow and ice on the lakes, mating starts.
- · Caribou movement patterns may have changed because of the Meadowbank road, which attracts caribou, the patterns are always changing anyway and it might just be coincidence.
- Caribou won't be afraid of humans in the near future.

- Coastal community people shouldn't get involved with people in Baker Lake.
- · Community based schools are great for getting more kids into high school but residential schools can impose more discipline, less distraction and offer some kids more opportunities to succeed.
- · Cross cultural training might help to encourage respect between different cultural groups that have come to work together.
- Cultural differences cause problems feeling is that supervisors get suspicious when Inuit smile (which is the Inuit way). Also language has been an issue the Inuit feel that people speaking in French are talking about the Inuit.
- Cultural identity is important and the school includes traditional activity, values in its curriculum but tries to make this relevant to the program of study as opposed to an add on, and such activities are not 'in your face' on a daily basis.
- Don't harvest caribou bulls in October to December because the meat is poor because they are mating.
- Dried cloudberry leaves are used to make tea.
- Drug and alcohol problems seem to be about the same as before.
- Drugs are largely cannabis products.
- Drugs are more accessible now (but it is mostly marijuana)
- · Drugs interfere with school mostly because they keeps kids up and partying all night so that they are too tired in class, rather than because drugs are heavily abused
- · Elders do not really understand the land claim agreement.
- · Elders now stay in their homes and don't go out very much anymore. Only the younger hunters go out.
- · Employed people spend more time on the land.
- Employment has been good as people are able to pay off bills, feel good about themselves and their abilities to take care of their families but some people do get messed up.
- Every couple of years, beluga are observed in Baker Lake.
- Every part of the caribou is used for something, and at different times of year caribou are especially good for some things. During the winter, caribou have thick coats so they are good for mitts or kamiks.
- · Fears about increased alcohol and drugs abuse with Meadowbank were overblown. It hasn't happened.

- · Finding drug dealers is more complicated now lots of people are dealing every once in a while.
- · From April to June, hunters will go out on the land daily. But overall, people seem to go out on the land less.
- Gender balance in high school graduates has been about even over the years.
- Government is looking at restructuring high schools, perhaps getting rid of the grade system, to overcome the grade 10 challenges.
- · Grade 10 is when a lot of children drop out of school. Grade 10 is particularly difficult, with way too much to do for most kids.
- Graduation rates have increased over the early part of the decade, varying between about 10 and 16 per year. Of 18 students in grade 12 this year, about 12 will graduate, including passing the Alberta school leaving exams.
- · Grizzlies now seen every summer. Six individual hunters saw grizzlies on the same day.
- Hamlet expenditures last year were about \$7.2 million, with a small surplus. \$2 million comes from the Government of Nunavut, \$2 million from water and sewer charges, \$2 million from contracts and \$1 million from miscellaneous charges.
- Hamlet government in Baker Lake is smarter.
- · Hamlet is finding it difficult to ensure water and sewage services because the population is growing and the demand for water has escalated individuals use more and more of it.
- · Hamlet needs new equipment for water and sewage services but they don't have the money to buy. Also need new heavy equipment but can't afford that either.
- High school graduates are either working or have gone on to postsecondary.
- High school staff work as a team.
- Hunters don't harvest animals ready to give birth.
- · Hunters haven't noticed any changes in plants. People have noticed a new species of tall plant growing along the road in and around community. It is about 4 feet tall but the name is not known.
- Hunters used to watch the wind direction so caribou wouldn't smell them. Caribou don't care anymore.
- If Kiggavik goes ahead, people should be kept in their home communities and discouraged from moving to Baker Lake.
- · If the Kiggavik project opens, both the project and the wildlife will have to be watched closely. Caribou feed on the land, so the land has to be protected.

- · If the project goes ahead, it should be done very carefully and only hire Inuit.
- · In 1959, a ship unloaded on ice in late September. Thin ice (first ice) was in late August.
- · Inuit are generally happy with their jobs at Meadowbank.
- It is easier for girls than boys to finish high school because boys can't concentrate and are in a hurry to earn some money. Most high school graduates are girls.
- It is good to be able to have income to send parents on trips.
- It is hard for unilingual Inuk to work in English or French language environment.
- · It is mostly white people bringing drugs to Meadowbank but some Inuit may as well.
- It is not in keeping with IQ of sharing the kill, using all of an animal killed, never hunting more than you need and respect for animals to burn animals.
- It seems that people are moving to Baker Lake, the population seems to have jumped recently and there are more vehicles in town (but that may be because some people can afford them more easily now).
- It seems that since the high school was built, more people are going to school (high school is about 10 years old).
- · It used to be that all domestic violence activity was related to alcohol but now stress seems to be a factor.
- It used to reach -40 degrees often, but not too often now.
- Kids do what they want.
- Kids today are kind of 'mini adults', aware that their parents no longer can do everything, fix anything, know everything.
- Language is an enormous issue and the single biggest obstacle to graduation and postsecondary study success. The kids just don't seem to comprehend very well, even though there is comparatively a lot of English spoken in Baker Lake.
- Liquor license application numbers are going up.
- Lives of young adults are a bit different from their mothers' lives, but not that much different.
- · Lives of young adults are really different from their grandmothers' lives, who also worked hard (harder than anybody in the world) but at traditional activity.
- Lots of chambermaids have guit working at Meadowbank because the work is too hard (93 rooms per shift day).

- · Lots of people want to work at Meadowbank, but some preparation for employment is needed for some people.
- · Make sure the grizzly or muskox are looked after. Also seals, beluga, walruses, bearded seal, Canada geese, snow geese, snow geese eggs.
- Many of the kids are really into sports.
- Maybe it would be better if only men worked at Meadowbank, so they couldn't have affairs.
- Meadowbank feels like a prison.
- Meadowbank has been good for Baker Lake. Lots of people are working now, so that is very good.
- · Meadowbank has been good for Baker Lake. Millions of dollars have come into the community and particularly the younger people really want the jobs.
- Men have affairs at Meadowbank.
- Might as well support the project those who are opposed should think about how hard the future will be if there are no jobs for people.
- Migration routes and nesting areas need to be protected.
- Mines are important sources of employment, but it is also important to protect the environment.
- Mines should be screening workers for HIV (this is not legal but some sort of HIV prevention program might be useful).
- Mining companies need to provide more information more proactively, people shouldn't have to go to KIA to get information on projects.
- · Mining is safer than it used to be they are not worried about occupational health and safety overlay, just about large accidents/evacuation (Meadowbank).
- Mining takes land away from hunting grounds
- More 'honest talk' is required to overcome problems with high drop out rates.
- More disposable income as a result of new employment opportunities means more work for the police.
- More economic development in Baker Lake is probably good news for school achievement.
- More graduations may be because of new employment opportunities, and the building of a high school in Baker Lake in 2004.

- · Most feel it is a bit hard for their spouses when they are away (houses are too quiet, more work for spouse) but spouses are getting used to absences, and enjoy what the income does for quality of life.
- Most people in Baker Lake are just very nice people who hold down their jobs and go about their business.
- Most people in Baker Lake really depend on caribou for food. It is hard to live traditionally nowadays. But even if we don't live traditionally, (because we live in town), and hunt and gather as many different animals and plants as we used to, it is important to protect all wildlife, protect the whole environmental system. This includes marine animals that we don't depend on.
- Most people who get jobs at Meadowbank work to stay because they are happy to have employment.
- Mothers are role models, they worked hard and made sure their kids were educated.
- Mothers have to hire babysitters privately or ask family members to help. Child care costs depend on number of children and their ages but range from \$20 to \$40 a day. The daycare costs about \$50 a day.
- · Moving to Baker Lake because of work here mean missing family, not having family support close by.
- New species seen around here are flicker woodpecker and kingfisher seen as well.
- Nobody in the group has seen a wolverine den.
- Non attendance is a process that starts early, long before kids eventually stop going to school altogether.
- November to February used to be really cold months, but the cold period is shorter now.
- · Nunavut's new education act sets 18 as the legal age for leaving school. Most kids don't graduate by that age, it takes them longer. The high school will keep students until they are 21, except on the odd case by case basis.
- One killer whale was observed in Baker Lake, around 1978?
- · Only a few people in Baker Lake go looking for marine mammals down the inlet, but every year there are some seals that appear in Baker Lake itself, near the east end. And every year some people from Chesterfield Inlet come inland towards Baker Lake to hunt caribou.
- Only younger hunters go down towards Chesterfield Inlet to hunt sea mammals. Baker Lake people do not care much about sea mammals.
- Overall the mine has been a good thing for the community.
- · Parents and grandparents are putting more pressure on kids to finish high school now.

- · Parents are absolutely critical to kids' success in school, and need to encourage and support their kids in school, it cannot all be done by the schools.
- · Parents are not overly involved in the school, but show up for sports events and parent teacher interviews.
- People are a bit worried about a site accident at Meadowbank that forces an evacuation in bad weather they would not be able to leave, there would be no transport to leave the site. The EMR response team at site needs to be smarter.
- · People are starting to see different types of animals, birds and plants, perhaps because of climate change.
- People are taking their kids out of school to go on the land during their weeks off.
- People can have a hard time working in the community in jobs that require confidentiality working for A-E is less stressful because they can talk about their jobs with their families.
- · People don't need to go as far as before to hunt, with the exceptions of wolf and wolverine these are not often found close to Baker Lake.
- People have also been able to buy their own houses.
- People like living in Baker Lake so his staff turnover is not such a big problem.
- · People may be contaminated, deformed children born because mothers are contaminated from water and air.
- People need to get educations and employment but they also need to protect their Inuit identity.
- People should try to translate if others are listening. But people at Meadowbank are generally are making an effort to learn some Inuktitut words and to communicate in English.
- People that work at mines need to know their rights and how to file a complaint.
- People used to dance on the land. Black rubber boots were very good for dancing.
- · People usually find out pretty quickly if the work does not suit them, and quit in a couple of days.
- · People, especially from Arviat, are moving into Baker Lake in response to improved job opportunities. This is not a particularly good thing.
- Projects must make sure things are safe for the environment. Regulations must be followed.
- Providing for the family now is 'making money'.

- Ptarmigan are a large part of the diet. Arctic hare as well.
- Rabbit droppings, mixed with water, was for stomach aches.
- RCMP does everything in the community, from filling out tax forms, to storing goods for various organizations, to working with kids' sports. RCMP positions are based on crime statistics, but lots of things they do in the community are not counted as work for purposes of staffing.
- Reasons for quitting Meadowbank include bad supervisors, specifically in the kitchen and for chambermaids (women workers often), spouses may be unable to handle the absences (or male spouses won't let their wives work at the site), there is harassment of women at the site.
- Rent goes up very high as soon as income does, so people are thinking more about their own houses. There are also energy efficiency programs in place that help people to pay for their own houses.
- Rivers have grown larger.
- Roots of bushes (unnamed) were used to cure stomach aches.
- Rotational schedule of contractors is generally worse than Meadowbank's schedule.
- Rotational work can be bad in some cases both parents are working at the mine and leaving the children behind in town.
- · Sales at the co-op increased by \$1 million last year as a result, largely, of Meadowbank t but other exploration companies are hiring people and spending money in Baker Lake as well.
- · Sandhill cranes nest anywhere on dry land. They don't make nests only little indents on the ground. One came into town in the mid 1960s.
- Seals were seen 3 times in Baker Lake last year. They come every year in the summer. Harbour seal, ring seal, and the occasional bearded seal.
- Since the CLC for Meadowbank was formed, the language issue is starting to go away.
- Smoke can affect the caribou.
- Snowmobile: \$10K to buy at the Northern Store but you can buy one in Winnipeg for \$5.5K and ship for \$1,500.
- So every year a kid stays in school longer than he/she might otherwise is a sort of victory.
- Some coast people come toward Baker Lake to hunt wolves, wolverine and musk ox.

- Some contractors use illegal wage practices (withholding money, not paying overtime etc.)
- · Some couples have marital problems when men start to work rotation.
- · Some people say there was an influx of 10,000 caribou into the area, but caribou change their travel patterns every few years anyway.
- Some people still use moss on the land when they forget to bring toilet paper with them.
- · Some wet areas have become drier. Ice freeze-up is quite a bit later. As a child, freeze-up was October. Last year it was in late November.
- Swans are found along the Hudson Bay coast. Not sure of their areas.
- · Sweet plants were harvested as candy. Cowberries, blueberries and black and red berries were also gathered and still are.
- The ancestors of people in Chesterfield, Rankin and Arviat used to hunt in the Baker Lake area.
- The area around the island on the other side of Baker Lake seems to be getting more shallow.
- The AREVA site has garbage on it, in torn open bags.
- The big effects of Meadowbank have been that labour costs have gone up, there has been no help with community infrastructure and Baker Lake needs another policeman.
- The course (outside Nunavut) was very hard and it felt like I was losing my language so I came back.
- The educational requirements of A-E are discouraging people, because many have not completed high school. There now is a limit on going back to high school you have to be 25 or younger.
- The employed can afford vehicles, houses on the land etc., before with no income getting out to the land was more difficult.
- The environment has to be protected all year round because animals move to different places in different seasons and there are seasonal differences in what animals do.
- · The focus on young people of parents and government is sort of new before, youth were not much worried about. But now youth are asked for their opinions and listened to.
- The government pretty well ignores Baker Lake and has put very little money into the community over the years. Rankin had no trouble getting a lot of funding for its expanded community centre.

- The hamlet decided to change the bingo room in the community centre to a youth drop in centre as a suicide prevention measure. The kids really like the drop in centre.
- The hamlet has had the same workers for 20 years, but should let them go to work for Meadowbank people should work where they want and people who like rotational work should be able to go work for A-E and free up jobs in town for those who won't work rotationally.
- The hamlet is really struggling to hire people.
- The high school has about 355 students on paper, with regular attendance of about 270 in grades six to twelve. Capacity is about 350 students, so effectively they are not quite at capacity. There are 27 staff in total, 18 of whom are teachers. There are three Inuit teachers. The school has no guidance counselor. They are fully staffed.
- The high school has gotten better at providing students the support they need to succeed, has learnt how better to manage the student population. The school environment is now more positive and empathetic than it might have been in the past.
- The high school has Inuktitut is a 'core' subject, that is students are specifically taught how to speak and write correctly.
- The high school is more concerned about supporting kids that want to stay in school than trying to lure back chronic non attenders.
- · The ice flows used to bring the ice to the shores of the Thelon but now the ice seems to stay in the middle and the water level seems to be going down.
- The importance of sharing means that money, and the things bought with money, flow through people's hands very easily people give lots away to family and friends.
- · The Inuit are starting to build/buy their own homes. Baker Lake Contracting and Supplies has built 20 new houses for the private market and will continue to build new ones.
- The Inuit stick together at the A-E site, to support each other. They are all friends now, and see each other in town as well.
- The Inuit still eat a lot of caribou and won't stop eating caribou. They also eat a lot of fish (trout, whitefish and char).
- The Inuit work year round, same as everybody else, to feed themselves, with different activities at different times of the year. Trapping takes place in winter, when animals have thick coats. Male caribou are not hunted during mating, as they don't taste good. It is important not to hunt animals carrying young.

- The IQ approach of government is unique because it is a vision shared by all in Nunavut (as opposed to for example different organizations having different, individual visions), it is a territorial initiative.
- The isolation at Meadowbank is a bit difficult to bear. There are not enough phones, which people need to stay in touch with their families. The community radio is also not available at the site.
- The Kazan river seems to have more sand, either because the water level is going down or because more sand is being deposited.
- The land looks different now because of climate change.
- The main challenge faced by working mothers married to rotational workers is finding suitable child care during the 2 week period that their husbands are away at work.
- The migration of caribou is of less concern since the Northern Store opened.
- The mixing of Inuit and non Inuit may cause problems.
- The original wildlife is still there, but now there are new animals and birds and some birds are staying all winter.
- The presentations that mining companies do on their projects are generally pretty dry and many of the young are not terribly interested in listening to them anymore.
- The RCMP asked A-E to fund a fifth position but that didn't work out very well. They are getting a new, bigger building.
- The RCMP land is a safe place to store things.
- The RCMP post has one corporal and two constables, and has another position that has been vacant for some time but may just about be filled soon.
- The rivers are drying up.
- The school's emphasis on embedding IQ in the curriculum and operations (i.e. content and process) has been a factor in increased graduation rates.
- The schools have safe sex education and kids are more careful about sex these days.
- There are a lot less wetlands than there used to be. Now we see different types of birds.
- There are a lot more jobs in town.
- There are a lot of drug dealers in town now.

- There are a lot of drugs coming in, most of it is cannabis.
- There are different areas for different seasons. Because water travels to Hudson Bay, make sure the water is protected.
- There are different geese, insects and birds like martens, a small black bird and northern woodpecker.
- There are difficulties (age limits and other criteria) that prevent people from going back to high school after quitting early.
- There are drugs at Meadowbank.
- There are fewer storms now in Baker Lake, but there are still strong winds.
- There are issues of sexual harassment at Meadowbank.
- · There are more drugs in town than there used to be, harder drugs are coming into town, and some white people at Meadowbank have been dealing hard drugs.
- · There are new sicknesses now when people lived on the land they only used to get colds.
- · There are not many jobs for women in Baker Lake, but many women would never do rotational work.
- There has been a building boom in Baker Lake, both because of Meadowbank and more aggressive social housing construction by the government. And now the federal government has announced another \$180 million for housing so the boom will continue. There have been 47 new units built in the last five years.
- · There have been differences in Baker Lake over the last two years. Lots of Inuit are working now which is very good and a lot of these are keeping their jobs.
- There is a fair amount of sport activity for kids (baseball, hockey, swimming pool in the summer) but not all kids are into sports so more is necessary. The new community hall being built this summer should help.
- There is a lot more equipment in town ATVs, snow machines, boats and cars.
- There is a need to have prizes etc. to get youth to go to meetings.
- There is an enormous cultural gap between generations, as cultural change is happening so fast.
- · There is an HR officer at Meadowbank to help people with problems, but the Inuit are not comfortable to talking to strangers about their difficulties. So they normally would not go to the HR office with a problem. Meadowbank has also brought social counselors to site occasionally but the Inuit won't talk to them either.

- · There is clear evidence of substance abuse and prostitution among high school students, but there are no numbers and the school is pretty successful at keeping incidents out of the building. It is possible there has been an increase as a result of the A-E project, but there is no real evidence to support this.
- There is no common area at the mine site to socialize with co-workers; not enough phones so stay connected with home; there is some racism.
- There is no real pattern in kids over 18 leaving school early to get jobs in the mining sector but it probably happens occasionally.
- There is no real women's group in Baker Lake, but it would be good to have one.
- There is one daycare in the hamlet and it is full and has a wait list.
- · There is prostitution going on at Meadowbank. Cleaning ladies who go from room to room get offers from workers and accommodate them at times.
- There is some coke and crack in Baker Lake but very little.
- There isn't as much water as there used to be in Chesterfield Inlet, the water is shallower.
- There may be a shift happening in kids' attitudes, more awareness that there are opportunities out there for kids.
- There should be a mining component in the curriculum at the high school.
- There was a moss that ground up cured snow blindness and breast milk mixed with ice would also work.
- There were more suicides in Baker Lake in the early years of this decade.
- There were no special places for plant collection. Plants were everywhere. But the area around Judge Sissons Lake was good for red berries.
- Traditional cures are not used now why bother now that there is a nursing station.
- Traditional skills are being 'converted' into more modern ones. There are not many youth that both want to and can go out on the land.
- Traditional wildlife used to run at the smell of humans, but now stay and even come close to the garbage area. They are no longer afraid of humans.
- Travelling is important, with work you can travel elsewhere in Nunavut and to Winnipeg, with families, for the first time in many years because of

### additional income.

- Two incomes are now needed to live 'reasonably' in Baker Lake. Food and cigarettes are really expensive, as are sports equipment for the kids and buying and maintaining vehicles and boats. Babysitters are also expensive.
- Two weeks off gives a lot of time with families and especially with children.
- Two weeks working and two weeks off is good two weeks off allows time to travel and hunt.
- · Uranium will escape and contaminate where we hunt, especially the land along the Thelon and on the south side of Baker Lake.
- Used to be able to get tradesmen to fix things for \$25 per hour and now it costs \$150.
- · Used to travel far to harvest caribou, but now, don't need to go further than 40 miles. Caribou are just there now, and hunters don't know why.
- Walrus are found only in Hudson Bay, because of the deep water.
- · Water affects the land and its animals and also marine animals so it needs to be protected as well. Kiggavik could impact all types of wildlife.
- We feel differently about ourselves as a result of having jobs. We have been able to earn and save money and spend it wisely, are happier and less stressed (no bills) and so are the spouses and kids, met lots of new and interesting people (including from the south), are known and respected in town, are more self-confident in what we know and are able to be proactive in solving problems, are more independent and able to do 'what is right'.
- · We would keep working at Meadowbank as long as we can, don't intend to leave the jobs
- · When people's eyes were bothered with 'white stuff' a louse tied with a hair was put into the eyes to take the white stuff out.
- · White workers are bringing drugs to the mine site.
- · Why is Baker Lake looking at a uranium project again when the we rejected uranium years ago.
- Wildlife move so it is important to protect the environment everywhere, not just at specific places.
- With income, people can afford more drugs.

- · With parents and grandparents encouraging kids to get an education, retain their traditional ways of life, protect the environment and work, there is a lot of pressure on the young.
- With work experience at Meadowbank, it is easy to find other employment.
- Wolves and wolverine are caught in the winter because of their thick coats.
- · Women are generally happy with the quality of health services and say that the schools are pretty good and that their kids enjoy going to school.
- · Women are more likely to graduate from high school, so it is young men that really need educational help.
- · Women elders prepared their husbands for hunting, made good clothing, prepared and shared food.
- · Women worry about their husbands having affairs with other women working at the mine, particularly women with children.
- · Workers are mostly buying equipment to go hunting. Hunting is both an enjoyable and provides food to households.
- Workers go out on the land more since they started working for Meadowbank.
- · Workers seem to have gained in confidence, generally enjoy the work, and people have a lot more money.
- Working has brought people (who didn't previously know each other) together, which is a good thing.
- Working people provide support to parents, siblings.
- Workshops are continuously done with high school staff to get them on board with the IQ emphasis.
- Young people want jobs, training and community involvement.
- · Young women often decide to have only two or three kids, because it is hard to take care of more than that, physically and financially. Birth control gives options now older people didn't have birth control.
- Youth are generally less interested in the environment than their parents and grandparents.
- · Major current concerns about Meadowbank of the community are related to hunter access to the all weather road and issues around language at the mine.

### **Chesterfield Inlet**

75% of the community is employed, either with the hamlet office or with the residential home for children with disabilities or in housing.

- A 4 plex for elders is under construction.
- · A community board decides on liquor applicants and call the RCMP if there is any question about the applicant.
- A few people have been to Morrisburg from training and some have certifications to operate heavy equipment.
- A lot of Inuit were attracted to the whalers and came to this area from other parts of the region. The Hudson Bay Co. was trading here and that also encouraged people to come to the Chesterfield area.
- A single mother (or father would find it nearly impossible to find overnight childcare if they had to work rotation.
- · Adult children support other extended family, not just their immediate families.
- · Adults and children pick berries. There are many nearby places to pick berries. Men collect berries too.
- · Alcohol not a big problem here because people can't afford to order it.
- · Arctic sports are very popular here. Chesterfield holds the championship. These games are taught to kids in schools and by family members.
- At community feasts, young people do not eat the country foods—only the elders do.
- Baker Lake police staffing will need to increase primarily because of traffic increases from economic activity such as mining.
- · Chesterfield Inlet is quiet and there are few calls to the police or arrests.
- Chesterfield Inlet is used to outsiders.
- · Chesterfield is not particularly religious. There is a RC Church and a Glad Tidings. Neither is involved in social issues nor appears to have much influence over their parishioners.
- · Chesterfield needs more jobs, lower prices and more activities for children.
- · Children also need to see that high school graduates get the jobs, but what they see is people get the work that is available and with only a grade 9 education.
- Children can't be forced into a curriculum.
- · Church is not a strong factor in the community but there is a full time priest. Attendance is routine, not spiritual.
- · Clinic does not see anything particularly unusual for a northern community. They are busier during flu season and see people with RSV, some diabetes but not different, in numbers, from elsewhere.

- · Clinic has 2 nurses that work every day and are on call in the evenings. Doctor comes in once per month for a week. A mental health worker comes in once every 6 months for a 2 week period. Dental services are provided about every 2 months. Medivac is available. Clinic offers pre-natal and well-child clinic services; general health services.
- Country foods are consumed by young people only at ritual events and celebrations by the young.
- Crowding is not critical here but some kids do have to sleep in shifts.
- Driftwood was collected closer to Hudson Bay (from the ships) and used as kayak building material. Moss was used for cooking. Today, there is a tundra moss that is boiled to make a hot beverage.
- Elders are not that involved in the community.
- Elders should be paid to work as experts in what they know.
- Employment with mining companies is rare. There is a diamond mine exploration only 18 km from Chesterfield Inlet but it has employed people from Rankin Inlet.
- Everyone in the community wants roads. People here are really active outdoors.
- Family members look after children when parents are working.
- Few people are looking for permanent work.
- Graves can be found at all the important camp sites, many marked with Inuksuit. There are also areas of stone circles where people used to dance and drum and sing, and kayak rests.
- Hamlet budget is around \$4million.
- Health and wellness committee is not effective.
- · Hunters had movable camps in earlier days. Now, many people in Chesterfield have permanent cabins.
- Hunting in groups is to share fuel costs and equipment, and because it is safer.
- · If illegal traffic of drugs and alcohol is a problem associated with mining, a private security firm should be hired to search luggage at the start of rotations.
- In the bigger communities young people do not hunt and are losing their language.
- · In the old days hunters used whale oil for bug repellent. Today, hunters wear mosquito netting.

- Inuit children are not very competitive.
- · IQ is something younger people give lip service to.
- It is very important to teach and speak Inuktitut to children, because if they do not learn they will understand the elders.
- · It's a big deal when a child catches his first fish.
- It's quiet and peaceful here.
- · Key hamlet priorities is infrastructure -- extending roads partly for Shear, but also to have a network of roads to enable fishing, easier access to cabins on the land and for tourism (guiding and other businesses)
- Kids have little to do recreationally.
- Liquor is brought in illegally and there is cannabis here too. People have relatives in Winnipeg and Churchill and will sometimes bring cannabis and liquor back with them after visiting.
- · Many parents are not literate, did not succeed in school and do not behave in ways that demonstrate a value in formal education.
- Marijuana is here in this hamlet but there are no hard drugs and people are aware of the dangers.
- Men and women both sew clothing out of hides. Sewing is a skill that is passed down, not learned in school.
- · Men will spend money on alcohol, however, in Chesterfield husbands also support their families and there is some expectation that they support their elders too.
- Mental health services are inadequate; and a dental therapist is needed.
- Money often leads to poor choices.
- Most work is short term and seasonal.
- Navigating local politics can be hard.
- Not all outsiders integrate or participate in community activities and this hurts the Inuit.
- Of 12 potential high school graduates this year, 4 will graduate this is a positive trends and is because there are teachers here who have worked with the students for several years, are dedicated and interested.

- · Older hunters and elders warn the young of the hazards of hunting in white-out conditions. You need to be able to see the cracks in the ice.
- Older relatives worry about younger hunters.
- Our ancestors used to make a stone weir for fish and then walk up inland to hunt caribou when their skin was thin. They built the weir in case they were not successful in killing a caribou they would still have food to take home. Gill nets are now used instead of weirs but these stone weirs are important as they represent activities of recent ancestors (relatives).
- Parents are not supportive; do not impose curfews or bed times or the necessary supports that encourage school success.
- Parents do not make homework a priority.
- · Parts for snow machines and gas are the big expenses. People really must maintain their snow machines and be careful of crashing them because repairs and parts are costly.
- People always come back to Chesterfield. This is a good place to live. But parents do not expect their children to stay unless the job situation improves.
- People are concerned about traffic on the inlet. There were no seals last year because of Agnico Eagle's traffic. Traffic vibrations drive seals away.
- People are resistant to change.
- · People do not believe in the traditional origin myth or spirituality. These are stories and legends only.
- People in Chesterfield Inlet consume more food from the land than elsewhere. Hunting is popular and necessary. The harvest is divided up among family.
- People in Chesterfield Inlet have is a strong indicator of people's desire to work.
- Recreation is a real challenge for all children because there are no facilities or programming.
- School is K-12 with 122 enrolled currently but average is 115. There are two full time teachers, a vacant ½ position, 5 full time teaching assistants and student support assistants.
- Selling country food to the hotel or store is frowned upon but people know that in Rankin hunters sometimes sell their harvest they are less traditional there.
- · Shear calls its diamond discovery as "diamonds just outside of Churchill" people of Chesterfield would like to be recognized for nearby mining resources.

- Smart women have fewer children.
- Social problems are not that evident, there are no runaways and physical abuse is not common. Emotional abuse between couples is more common name calling, put downs. This is a problem particularly of young couples.
- Some children really struggle after graduating from high school. The school here did not have teachers that were motivated and the good students were not challenged. Home work was not given and children were not allowed to borrow library books.
- · Some families move to other communities where they have extended family and at certain times of the year children are enrolled in the community they are visiting.
- Some people have the tools for carving, but tools are expensive and extra disposable income needs to be spent on food.
- Some women make and sell mitts and parkas.
- Some young people do go hunting regularly. The main difference between their hunting and their parent's is that they hunt in groups.
- Sometimes kids stay out all night because they don't have a place to sleep.
- Teas were made out of some plants that had medicinal properties.
- The elders' 4 plex will free up housing for younger families or just make more room when elders move into the new 4 plex but crowding is not a big issue here.
- The community is safe for women. People do not lock their doors.
- The community is very safe, quiet.
- The cost of living is a big concern. People that can pay for bulk goods up front can make a sea-lift order.
- · The council is all one family, the hamlet office is all one family, housing is run by another family. Jobs are passed down, qualifications do not matter.
- The hamlet has been well managed financially.
- The land and the abundance of animals is an important feature of Chesterfield Inlet.

- The mission was established in 1912 along with the hospital. The residential school opened in 1951. People from all over the region came to attend school. School was in for 10 months of the year. The children in residence were not permitted to hunt, even with a local family. They were permitted to trap fox nearby. So, the residential school students participated and learned to hunt only when they went home for the summer.
- The post has two members, both substitutes here while others are away.
- The RCMP is very motivated to hire Inuit. Nine members were hired this year after training in Iqaluit. Overall Nunavut has 30 Inuit members.
- The school has several students from the nearby residence for children with disabilities but doesn't have special needs resources for these children.
- The school provides an academic curriculum for the fall term and then after January switches over to experiential learning which involves kayak building (nationally approved training), safety training, building maintenance, etc. Math and English are integrated into the experiential curriculum. Arranging the curriculum like this allows students to write departmental exams in January. In the past, classes would end in early June and exams would be held in late June. Students did not study in the time between class dismissal and exams.
- · The seasons, light and the darkness, have an effect on daily routines and sleep patterns and this affects learning.
- The young also fish.
- The young listen to elders out of respect but that they are not truly interested in maintaining traditional life skills such as igloo building because it serves no modern purpose.
- There are 3-4 dominant families here and they run everything and hire their own and generally look down on others.
- There are a lot of activities that families can do together.
- · There are drugs and alcohol in the community but it is a safe community. Social problems are not very visible.
- There are edible purple flowers that people pick and eat and also certain roots (they are white and taste like carrots).
- · There are no applicants for open jobs at the hamlet office.
- There are no counselors in the community but people do not trust southern counseling. Elders often intervene when asked. Elders are trusted, experienced and can provide advice.

- There are not many traditional activities that men and women don't both do.
- There are numerous important cultural sites nearby. Some of these are stone fox traps, grave sites at old camps, Thule sites, stone weirs (for catching fish), Inuksuit and stone pits for cooking.
- There are people in Chesterfield who are accustomed to working and then there is a less motivated group.
- There are similarities in culture and lifestyles between Inuk and Newfoundlanders.
- · There are some hunters who go out every day after work when its spring and days are long.
- There is a daycare but it's difficult to get a place and this depends on the child's age.
- There is a need for more recreation activities for youth. There should be a place where people can go to exercise. The arena is seasonal, open in winter only. Young people hang around and have few recreational options.
- · There is less crowding than in other communities in Kivalliq. The wait list for housing is not long.
- · There is not a youth crime such as drinking, drugs, vandalism,.
- · There is not gathering place for women or for youth or elders. A community centre with services and programs would really help to bring people together.
- There is not much activity in the arts and crafts area
- There is not much alcohol abuse. People don't have the income for it.
- There was a curfew in Baker Lake in the past and during this time you did not see kids outside late at night. Here youth do not tend to stay outside late even without a curfew.
- There was a doctor and an RCMP detachment in Chesterfield's earliest days.
- This year, students are building a stage for the gym and are learning igloo building and traditional skills.
- Those that are about 35 and under encourage their kids to get an education. Grandparents don't encourage kids to go to school very much and a lot of kids are raised by grandparents.
- Traditional families outweigh the number of families that push for education.

- Trapping completely died out in Chesterfield and a number of years ago. A key reason was that the government came under pressure from Greenpeace to ban leg- hold traps. Instant kill traps were distributed but trappers found them dangerous and difficult to set up. There were a lot of accidents as a result of these traps and people eventually gave up the activity altogether.
- Unemployment is not as high as elsewhere.
- We need funding to continue traditional activities. We would like a building to make sleds.
- · We would like to believe that everyone is consuming country foods, but it's only elders that have country foods regularly.
- · Women are child bearers, so they have to look after children.
- · Women do not go out in the coldest months of December and January -- it's too cold for women then.
- · Women do not have a problem with rotational work. This is preferred to husbands/partners being unemployed or seasonally employed or employed only once in a while.
- Women here go to Rankin to deliver babies, rather than Winnipeg.
- · Women here hunt and fish. Women consume country foods as often as possible and also prepare them in traditional ways. Sewing seal skin and caribou clothing is also practiced. Men also sew clothing.
- Women would go hunting more often but are looking after their children.
- Young parents that want to work rotations at mines should receive some sort of childcare subsidy.
- · Young people need to have teachers that are here for the long term and that are part of the community. It's the relationship they have with these teachers that motivates them to come to school.
- Youth will not become employable unless they can handle the structure associated with attending school, and passing grades.

### **Coral Harbour**

- 2 -3 snowmobile accidents a year. The helmet bylaw is not enforced and there are accidents every year.
- · All country food is important: seal, fish, geese, etc.
- AREVA should set up scholarships. This will be a motivator.
- AREVA was present at a career fair as was a wildlife biologist who is conducting a study of eiders. There is a duck sanctuary on the island. The students seemed riveted by these career talks.

- Because of climate change, the ground is melting faster and affecting vegetation, which, in turn, affects the health of caribou.
- · Birth control is available but the school does not support sex education.
- Burrowing owl was sighted a few summers back and there are butterflies in May/June. This is evidence of climate change.
- · Career information should be made available to adults, parents. Everyone needs to know about new occupations.
- Caribou harvest was in March. 850 caribou harvested and sent to Arctic Foods in Rankin Inlet. 850 is considered a low number but that is the number Arctic Foods asked for. There is a contractor that handles the harvesting and transport. An abattoir was set up at the airport. The federal inspection agency is present. The harvest employed about 20 people for a period of 2 weeks.
- · Caribou is abundant all year.
- · Caribou is hunted; people dry the meat so they have a supply for months.
- · Coral Harbour is a good place to raise a family. It is safe, people look out for one another; people are not as individualistic as in the south.
- Crowding causes health problems.
- Diabetes (type 2), anemia, .tuberculosis, hypertension, heart disease and vitamin D deficiency are starting to show up/show up more.
- During summer, people eat roots and berries.
- Early school leavers leave at grade 10, when they enter the credit system and cannot move on without passing grades.
- Elders crave country food. You need it to keep you warm.
- · Elders are happy with modern medicine and health care because now people are getting hurt, in snow machine and trucks accidents.
- · Elders are involved in sewing classes, organizing traditional gatherings, storytelling and encouraging youth to speak Inuktitut.
- Elders are respected in Coral Harbour. But elders are not always right.
- Elders care about what young people want, not only about the traditions.
- Elders get enough country food. There are enough people still engaged in hunting.

- · Elders like to teach younger people traditional ways such as sewing and skinning animals. But they also want children to learn English.
- · Elders participate in school programs to teach traditions but they have not been invited to the school for two years.
- Elders want to share what they know.
- End of May is polar bear hunting season. Coral Harbour received 40 tags.
- Enrolment is 276, but there is some fluctuation during the year. Families move in and out of the community, for work primarily. There are 18 teachers at the school, some are Inuit and some are from Coral Harbour.
- Health centre staffed with 2 community health nurses, 2 clerk interpreters, 1 caretaker, 1 house keeper, 1 nurse manager. Other medical people come in periodically, often for not long enough. For example a psychiatrist comes 4 times a year for only two and half days.
- Hunting is in decline because people are working. It's also harder and more time consuming than just buying at the store.
- · Hunting skills are not being passed down in the younger generation. Time is the main issue.
- If one had a headache, the treatment was to put pressure on it by tying a cloth around the head.
- If one needed a heating pad, we would heat sand and make one.
- · If schools could offer more hands on learning that may address the drop out situation.
- · In mid June eggs are collected (geese, duck and gull).
- · In recent years, more girls are graduating but the numbers are too small to draw any conclusions.
- In the past, people didn't get sick so there was no traditional medicine.
- Influential elders have passed away so people are now less traditional.
- Inuit do a lot themselves. They are hands on people.
- Inuit people should be working, not just southerners.
- Jobs in the hamlet are taken by members of one influential family. These people are not qualified, but the jobs are inherited.
- · Kids are intelligent but not performing well on written tests.

- Kids in school and those that leave for education are not out on the land much.
- Last year 7 students of a possible 13 graduated. This year, of 5 of 9 will probably graduate.
- Marine mammals are in good supply walrus, seal, and beluga.
- Most graduates leave the community and go to Arctic College in Igaluit or to Red River College.
- No one in Coral Harbour has a full dog team. People hunt with snow machines but gas is expensive.
- · Not many people hunt in winter, you need a snow machine.
- Nunavut's position to allow mining is good.
- · Once in a while, they will see a narwhal.
- · Originally, there were 40 caribou brought over from Coats Island. The herd grew to 30,000. Now there are about 10,000 and they are all over Southampton Island. There is some suggestion of in breeding resulting in health issues.
- People crave country food—especially if they grew up on it.
- · People here also go crab jigging. Crabs are caught by hook and occasionally with crab traps.
- People hunt and fish for food. No one sees this as a recreational activity.
- People hunt for food.
- People in Coral Harbour are quite mobile.
- · People purchase food through mail order using a link card, a pre-paid card. Those that don't have a link card borrow from those that do.
- People use to rub mouse fur on blisters.
- People want treatment for mental health issues.
- Psychiatry-4 times a year but for 2.5 days only
- Rankin is building a vocational school and this may be a draw for students.
- Seal is a life line.
- Sharing is very important to the Inuit.

- · Since the north is so cold, we design and make our own clothes. The store bought clothes are not warm enough. We depend on animals not just for food but for our clothing.
- Single mothers really need respite care.
- Some kids see their parents taking drugs.
- · Some people say that in Inuit culture, it's a man's right to beat his wife but that is now why they do it, that is just why it sometimes isn't reported.
- Some people sell pelts privately, you can make a pretty good living from trapping.
- Some people trap arctic fox and send the pelts for auction in the south (Thunder Bay). The wildlife office collects the pelts and pays the trapper between \$20 and \$50 per pelt. Price depends on quality. A seal skin is usually worth \$50.
- · Suicidal ideation and suicide is a male problem, so there is a men's club, a self help group, trying to do something about this.
- Tags were distributed for the cape caribou population study. About 100 caribou were culled. This was a health study, carried out in March 2008 and 2009 and then again at the end of the summer. GN is leading the study.
- Talking to kids about street drugs encourages them to try them.
- The government tells us that there are too many caribou on the island. They were brought here originally from Coats Island. There was a long period of restricted hunting so the population grew.
- The HTO advises against killing bulls.
- The HTO organizes animal study groups, enforces quotas, and distributes tags through a lottery system.
- The Northern store sells pelts but these come from the south.
- The traditional diet was rich in calcium and nutrients. Nutrition was the treatment of illness.
- There are 3 churches, Anglican, Catholic and Glad Tidings. People don't hunt on Sundays. This rule is IQ.
- · There are 3 outfitters here. They take their clients out to hunt caribou, walrus and polar bears. 60 walrus tags were issued this year.
- There are drugs and alcohol in the community and have been for a long time. In the 70's the ships and barges brought these in.

- There are no predators here, no wolves. Maybe there is not enough food for all the caribou and some are developing sickness.
- There has been out migration from Coral Harbour. The community won't grow if there are no jobs. People can move around easily because everyone has relatives in other hamlets. Some have relatives in every corner of Nunavut and in Ottawa.
- There is no commercial fishing here as there is on other hamlets. Other hamlets are approached by Rankin's Arctic Foods but Coral Harbour is not, it is too far perhaps.
- There is pride in developing a good hunter.
- There is someone who hunts caribou and leaves the carcass. This is not IQ. It is considered offensive.
- There may not be as many belugas around as in the past.
- There need to be places for women to find shelter and for single mothers to get some support.
- There needs to be more information at career fairs on the occupations that aren't mining, but are related to mining.
- Trout and char fishing are really popular.
- Until the mid-70's, there were restrictions on caribou hunting but not now.
- We are not going to go back that's not the intention in teaching traditions."
- · We taught our children to hunt and they became good hunters.
- · Wildlife has not been well managed in the past. The health of caribou is questionable swollen joints, infections.
- Women are involved with alcohol and drugs so there are some miscarriages.
- · Young people (even 20 something's) are speaking a mix of Inuktitut and English.
- Young people are not interested in traditions some are, some not.
- · Youth need to stay in school.
- Youth speak English more than they speak Inuktitut.

# **Rankin Inlet**

90% of the time is spent on 10% of the people.

- A cultural shift is going on.
- A key issue for young people is employment.
- A treatment centre in Rankin is needed so that people are able to see and understand that health is possible. Currently they have to go to Manitoba for treatment, and there are no Inuit there (for support).
- A weekend of hunting costs about \$400 including ammunition, gas and gear.
- Aboriginal Skills Employment Partnership helps provide training money for Inuit.
- Aboriginal Skills Employment Partnership results are that of every 3 entering only 1 graduates.
- About 10% of the adult population in Rankin does art.
- Across Nunavut training Inuit nurses, teachers and environment workers is also an important priority.
- · Alcohol abuse is more out in the open now.
- All training money is well spent, whether or not people can immediately find jobs.
- Although it may be that good families produce good kids, there are lots of counter examples.
- · Although people at Meadowbank are generally happy with their jobs and happy to be working, they find two weeks at the mine site difficult. This is mostly because they get bored there is nowhere to go other than their own rooms.
- Although Rankin is a progressive community relative to others in Kivalliq, there has been rapid change that has disoriented some people a bit.
- Animals are always moving but there is no change in numbers.
- Arctic College probably has the best collection of IQ information.
- AREVA is not being upfront about their future intentions, there is more uranium than they say.
- Art is an expression of culture and most pieces are unique they shouldn't be subject to bargaining.
- · Art will continue to be done by lots of people because as children watch their parents work, they learn how to do art. Art is like hunting, children learn from their parents.
- · Artists only get help from the hamlet occasionally, and it has been two years since anyone remembers getting any help.

- Artists say they do not have the time to teach younger people their skills.
- Artists struggle to find good places to work. Houses aren't big enough, are difficult to heat and light. Moisture rusts tools. Artists would really like to have a place to work, something like what the Matchbox Gallery can provide to its ceramicists.
- · Artists try to produce what will sell. They know what the co-op is able to sell so they try to produce that king of thing. There is more demand for small (cheaper) items.
- At closure, there will need to be some sort of compensation program. Workers can depend on the mine forever and they won't buy hunting equipment. There should be a law about compensation at closure.
- Attendance is pretty good, with only perhaps 10 or 15 students not attending regularly.
- Baker Lake has the reputation for being a big gambling centre.
- Barriers to professional guiding involve risks and responsibilities and costly insurance. Start-up costs are significant. Transport Canada requires that boaters have appropriate insurance to take tourists out.
- Because of the nickel mine in Rankin Inlet 50 years ago, and because the people who worked there are very old and sick now, there is a correspondence made between working in mines and health problems.
- Because water is more available, good hygiene practices, such as hand washing, are not an issue here.
- Believe that new wage employees need training in money management and employment skills. Mines should provide this.
- Birthrate in Rankin Inlet is higher than in southern communities but the average number of children in a family is 3 or 4 so it appears to be coming down.
- Businesses in Rankin sometimes buy artists' work, and the Matchbox Gallery sometimes will. Otherwise, people go around to offices and hotels where visitors might be.
- Children are not obedient. Young people are the bosses.
- · Children are taken out hunting in the warmer seasons with double walled tents and some hunters have cabins.
- Children learn to hunt typically at about 14 years of age but it depends on when the child is ready and some go out at a much younger age.
- Churches are Roman Catholic, Anglican and more recently Glad Tidings (Pentecostal) it is Arviat where the Pentecostal church has most political influence. The influence of the Pentecostals is increasing in the north they are well funded, have full time ministers and do a lot of community service.

- · Communities are perfectly able to self monitor they see and understand problems that arise, say for example in response to employment, and can respond appropriately to those problems.
- · Country food is of high importance to this community so the welfare of animals is important, it is the cornerstone of Inuit culture.
- · Country food is sometimes purchased from people but most of all it is shared.
- Court comes to town once every two or three months (in Baker Lake once a quarter). There is also a justice of the peace (who can make decisions regarding who should be handed over the court system) and a community justice committee.
- Developing mining will help younger people find employment.
- Diabetes is becoming more of a problem in Rankin Inlet, particularly type 2.
- Diabetes is not as great a problem here as it is in northern Manitoba but there are growing numbers probably because of changes in diet and lack of exercise. The winters are long and cold.
- Docking is owned by the territorial government
- Don't much like mining projects, and exploration projects leave a lot damage behind
- Drug prices are very much higher, 10 times higher, than in the south.
- Drug testing of mine workers is strict and likely very effective.
- Drugs and alcohol are the biggest problems. The RCMP are unlikely to arrest people for simply possession but definitely go after people who are selling (bootleggers and importers).
- Drugs are bad because they steal kids' motivation.
- Drugs have been a problem at Meadowbank. It is mostly white people who are bringing them.
- · Drugs of current concern are primarily marijuana, hash, oil, mushrooms. Some 'crack' has shown up in the community, but it is localized.
- Each HTO receives \$7000 per year for supplies needed to mount a hunt that will provide for elders and those that no longer hunt or receive country foods.
- Each RCMP post reports to the mayor of each hamlet on crime statistics but these are not publicly available.

- Economic development priorities are i) improving government infrastructure; ii) completing the trades school (to open in 2010); iii) mineral development; and iv) supporting arts, crafts and to a lesser extent food processing.
- Elders have been hunting all their lives and know a lot about migration and should be consulted.
- Elders participate in school programs and are invited to speak to classes at Arctic College.
- Elders play a role in teaching younger adults and youth about hunting.
- Elders should make the decisions or at least have a strong say in decisions about mining.
- Elders should not have to travel further to hunt because of a road or because a mine's activities have disturbed migration patterns and routes.
- Elders try to help young people by listening to them and sometimes they pray.
- Elders warn the young that if they get into trouble and end up with a criminal record, they may not be employable at the mine.
- Elders would be happy if the young people get work.
- Employee assistance programs and financial management training may help people to manage new employment more successfully.
- Even if mining companies hire people with no history of substance abuse, some will start using because they have more money.
- Eventually, all trained people can get jobs in the north if they want to.
- Everyone relies on caribou, fish, seals, ptarmigan, beluga, cloud berries and plants used for teas.
- · Evidence of some disappointment that mining companies prefer to use southern consultants rather than ones that live in the north.
- Expectation that the road linking Rankin to Thompson Manitoba will be built
- Family Outreach Services provides services in addition to addiction services.
- · Fathers will teach their daughters how to hunt if they do not have sons; however, the duty of the father is to pass down hunting skills to boys.
- Few people live as full time hunters, many hunters have full time jobs.

- · Fire and EMS department as 1 full time paid chief and 20 volunteers, two fire trucks and one ambulance. Fire/EMS services are well funded and operate well in all Kivalliq communities.
- For beluga, it's best to head to Churchill in early July when they are migrating.
- Gambling is also a problem and the addictions project sees people with gambling addictions occasionally. Poker is a sort of new gambling activity in town, even children as young as 6 are now playing poker.
- · Girls prefer ice fishing to hunting.
- Government now has a new pot of money to which artists can apply for assistance to buy tools, materials and/or a facility to work in. But the money is small.
- · Grandchildren are not hunting but, rather, are on the internet and watching TV and playing video games. In the old days, children used to beg to go hunting.
- Half of Baker Lake is on social assistance.
- · Hamlet budget was about \$7 m last year. 90% comes from GN. Municipal sources of income are essentially land leases, water and sewer charges and garbage collection charges.
- · Hamlet has a contract with the GN to provide \$190,000/year for EDO and studies.
- Hamlet has a separate office that deals with spousal assault and has an AA program, in addition to the project.
- Health centre staff has been warned about drug problems and the potential for harder drugs in the community due to a mine workforce, however, drugs and drug use is not evident.
- High school constraints are primarily related to staff quality and the ambitiousness of the curriculum which may be trying to do too much too fast in a
  complicated cultural context.
- Hiring of Inuit is very important.
- Housing is an issue for young families.
- · Hunters carry satellite phones and gps devices for safety reasons.
- Hunting occurs everywhere; everything is important.
- If mining companies find good rock, they could help by providing these materials to artists, but mining companies are not really interested in artists they don't tell people about anything they find unless it is diamonds or gold.

- If young people give up hunting to work in the mine, they will not be self sufficient if it closes.
- · In Kugluktuk where, with the establishment of an alcohol committee (to which people had to apply and could only get alcohol if they had not history of abuse), spousal abuse was cut in half.
- · In the old days, hunters travelled by dog team and wore caribou clothing. They were expert hunters and no one worried about them. Now, hunters use skidoos (dogs are only used for racing) and they don't have the correct clothing.
- Influence and nepotism are really important in Nunavut.
- Interpersonal relations are fundamental to Inuit culture and doing the wrong thing can make people feel extremely bad, even 'dirty'.
- Inuit culture is strong, and ways of life do not disappear because of mining.
- It is a challenge to rise out of the experience of powerlessness to take advantage of new opportunities.
- It is a pivotal time in Nunavut for motivating and keeping motivated students.
- It is important for people to keep a grip on tradition and memory. These root people and gives them identity.
- It is important that education programs are culturally appropriate
- It is not a popular idea that people from the south be encouraged to move into northern communities if they are working at mining projects, but this might introduce a stimulus for more economic growth.
- It is paternalistic to worry about negative effects of employment. The important thing is for people who want jobs to have them, and they should be left to live their lives.
- It is very stressful trying to make a living at art.
- It is wrong not to teach your children to speak Inuktitut, but some younger people are doing that.
- It may be that girls graduate more than boys, probably because the girls are more mature.
- It takes time to become a good artist and it takes time to produce good art.
- It will take time to change people's focus from just worrying about today to thinking more long term so that they can learn to save, manage money, etc.
- It's good for Inuit to be hired as monitors and it's good that wildlife monitoring is happening.

- · It's important for young people to learn how to build an igloo and to learn different hunting and survival skills for each season.
- It's not clear how extreme cold will affect mining activities and equipment.
- Jobs are easy to find in Iqaluit but not in Rankin.
- · Kids are spending their money on games and cell phones and not on hunting equipment.
- · Kids are starting to speak out a bit more. It takes time to build trust, but there is a more open attitude as well. Kids are very honest and some of them are very astute observers.
- · Kids have no patience, this is another loss of tradition. The elders learned patience, needed patience to live out on the land but kids don't do this and so don't learn.
- Kids recognize that the territory is multi-cultural now and they need to learn how to deal with that.
- Kids start falling out of school in about grade 10, but more and more seem to be staying in school.
- · Kids who are not inclined to go to school are not inclined to work either.
- · Kivalliq and Kitikmeot make up the RCMP west district.
- · Kivalliq statistics on high school graduation in 2008 were 192 grade 12 students registered, 104 graduated and 96 passed the Alberta high school leaving exams.
- Last year 25 students graduated and they expect perhaps 30 to graduate this year.
- Local Housing Association administers housing in the hamlet
- Lots of mining skills are transferable.
- · Making art is an effective way to contribute to a healthy mind. But again, because there is nowhere for people to go to do art, effectiveness is limited.
- Many hunters prefer to hunt alone unless they're hunting by boat.
- Many young Inuit haven't really ever succeeded at anything in their lives, so graduating can be really important.
- Markets in Rankin include the co-op, which has again started buying carvings, but only carvings that are already sold, that is, they send photographs of carvings to the south and if there is interest in buying they will sell the work.

- Material supply is challenging. Metal and tools come from the south. Soapstone is hard to get and is in short supply, which is the reason people carve other stones however these are very hard on tools and not everybody can afford the good tools needed to work on hard stone. If they are able, artists can travel to Falstaff Island to get soapstone. Wood comes from the lumber store in Rankin (for example, for making drums). Hides are not used for drum skins as they dry out even elders use store bought drum skins now.
- Maybe kids are destroying themselves because of the pain they have from losing identity.
- Mine employment is probably good even for married men, as long as the mine site is kept dry.
- · Miners aren't very interested in art. But, see above, he isn't much interested in selling stuff anyway.
- Mines should have treatment available substance abuse problems on-site.
- · Mining companies need to take the advice of Inuit on who to hire and who not to hire. The Inuit know everybody and can advise on whether people are doing drugs, have criminal records, are able to work well.
- · Mining companies perform better now, environmentally, and young people need jobs and training—but uranium is another thing.
- · Mining in the north has different effects from mining in the south. There are no trees, for example, to break the winds. The land is flat. Baker Lake gets strong winds first, and then Rankin Inlet gets them so there is concern here about the air around Baker Lake.
- Mining is driving a lot of the education program.
- · Mining projects can offer jobs that represent that new life, and jobs are certainly necessary, but with more disposable income there is more drug use.
- Mining workers do not buy art.
- Money is important—transportation to get out on the land is costly.
- · More high school students are expected in Rankin because the construction of the new trades school, correctional centre and mines will bring new population to town. After that the school population will go down a bit as the birth rate has decreased
- More money available for drugs raises the threat of movement into the community of organized crime.
- More than half of high school graduates go postsecondary programs.

- More youth are expressing homosexuality. Being gay is not acceptable in Inuit culture.
- Most artists have children that are also artists.
- Most funding for the arts comes from government and art galleries, including for training programs for artists.
- · Most hunting occurs between May and September but hunters are anxious to get out on the land now (April) because it's warming up.
- Most of the clients are unemployed
- Mould is a problem in some houses. A lot of the housing is small and poorly maintained.
- · Municipality is responsible for addictions and drug counseling, and has a group home for developmentally delayed adults.
- Municipality owns the land; owns and maintains the roads.
- Narwhal is hunted in Repulse Bay.
- NIRB process is bad it takes too long, it is not well understand by people in communities and it does not give enough importance to meaningful consultation and what people in communities actually say about projects. Also their website is completely unhelpful, it is impossible to find anything on it.
- Not all the same and do not all have the same points of view.
- NTI's approval (conformity review) represents just a 'washing of hands' of responsibility with regard to uranium.
- · Nunavut Arctic collage priorities are business and leadership, management, construction trades, heavy equipment, mechanics and mining. It takes about six months to train a heavy equipment operator.
- Nunavut Arctic College budget is \$24 million, of which about \$6 million is spent in Kivalliq. Of the total, about \$18 million is from the Government of Nunavut and \$6 million from third parties (which can include Government of Canada, as well as the private sector). The budget is of course constrained but there is enough money to do the most important stuff. The college has 7 instructors (only 2 are full time), one in the community learning centres in each community and 25 full time instructors at the college in Rankin Inlet.
- Nunavut Arctic College enrollment is about 200 FTE per year in Kivallig.
- · Nunavut Arctic College has about a 70% success rate among students.

- Nunavut Arctic College tries to ensure that management programs take into account Inuit culture.
- · Nunavut has an art committee that holds an art festival is a different community (but often Iqaluit) on an annual basis and the Department of Economic Development and Transportation holds a Kivalliq Region are festival every year.
- Nunavut wasn't really ready for the Agnico-Eagle project, hadn't got various things done to prepare people to get jobs.
- Older kids who are not serious about school can disrupt the educations of younger ones.
- One of the issues around employment with mines, which provide well paid jobs, is that equality is a traditional value.
- One way to get one's name known as an artist is to donate work to organizations.
- · Only 14 polar tags were given out this year for all the communities nearby and these are all for defence kills.
- Other mines, such as gold mines, at closure have not been able to fully clean up the mine sites.
- Otherwise, capacity is adequate to meet needs e.g. water and sanitation. There are smaller needs, like more community freezer space and a new graveyard, but these are considered more or less manageable.
- Parents are not bringing their children up correctly and that is why they are doing more drugs and alcohol and spending time away from home.
- Parents attitudes about education are changing, and parents are encouraging their kids to stay in school.
- · Paternalistic that having roads or higher income will lead to drug and alcohol problems, or that people won't know how to manage.
- People abuse substances for many reasons, including deep guilt and hurt over things they may have done in their lives but people also look for excuses for their behaviour (residential school experiences, jobs at mines).
- · People are buying bigger faster snow machines and driving in unsafe ways or do not have the skills, so there are more accidents, mostly out on the land.
- · People are getting more stingy with their harvests, it is getting harder to find people to give away caribou.
- People are referred to the addictions project by the courts, social services and the Kivalliq outreach program. People referred by the court are not so much those who have committed drug and alcohol offenses but because of consequent behaviours (breaking and entering, spousal assault). The project then refers people to treatment centres in Manitoba if this is warranted there is no treatment centre in Nunavut.

- People are saying good things about AREVA.
- · People deny substance abuse problems, saying that substance abuse is a problem for first nations and whites but not Inuit.
- People generally do not want to deal with census takers because so much of what their lives are may be illegal and bring down trouble from authorities. So the census results are not necessarily accurate.
- People hunt whenever they can and many hunters will take their holidays when there is more daylight so they can hunt for longer periods.
- People in Rankin are generally supportive of artists, and some people say nice things about the work which lifts artists up when it seems their work is not appreciated. People in town buy jewelry but don't really buy sculpture. They feel that to make a living they must depend on southern markets.
- · People need an identity to frame goals for themselves, which helps them stay away from drugs and alcohol and suicide.
- People need more indoor exercise facilities and programs.
- People who already have drug or alcohol problems when hired, will likely show escalation in problems.
- People without drug or alcohol problems when hired are not likely to start.
- People worry about the hunters. Young hunters get stranded or lost. They don't use all the survival skills that the elders had learned.
- Perhaps about 30% of kids who should be graduating actually are at this point, which is comparable to the rate in Newfoundland 50 years ago. It took Newfoundland about 30 years to raise that rate to a more normal (for Canada) rate of about 80% and he expects the same thing to happen in Nunavut.
- Plants are gathered by elders from August to September.
- Police get called when alcohol abuse leads to violence.
- Population growth (2% per year) is high because of significant in migration from other Nunavut communities.
- Power generation is owned by territorial government.
- Racism (against whites) has recently been increasing. People in Nunavut do not want to see a lot of white people in the north.
- Rankin ceramic artists now have work in the National Gallery and other museums.

- Rankin has a more diverse economy, will not be overly affected by the recent decline in mining/exploring activity exploration companies do not really spend a lot of money in the north.
- Rankin has a well developed road and trail system so people can hunt and fish easily. There are lots of elders on the land. This contributing to a healthy lifestyle and diet.
- · Rankin has its own water system so the community, unlike others, does not have periods where water runs out.
- · Rankin hunters want to keep the tags for themselves, not sell them to tourists..
- Rankin Inlet community development plan was provided.
- · Rankin Inlet does not like racists. They tell them to leave town.
- · Rankin Inlet has a doctor at all times and is equipped with medivac (Air Medical Transport).
- Rankin Inlet has had a long time to get used to a diverse economy, a more open and diverse social structure and money and therefore is unlikely to react as negatively to jobs as some other communities might.
- Rankin Inlet is a community of a few rich and a lot of poor. There are few in between.
- Rankin is a mining town originally; the hamlet developed in response to the old nickel mine (which closed in the mid 60s).
- Rankin is easy to move to the Inuit population is more diverse than in other communities and it has a proportionately larger white population. People don't depend on trucked water, education and health services are generally better, Rankin is a regional centre, it is generally a healthier community, with less crime (police detachment is the same size as communities that are half the size of Rankin).
- · Rankin is more able to absorb lots of new employment than smaller communities like Chesterfield and Whale Cove.
- Rankin is working toward a community sustainability plan but this has been stalled for about 8 months.
- Rankin's municipal council is new and is pro development.
- RCMP post has 6 full time officers (four constables) and 1 stenographer. All are non Inuit. Staffing is based on activity levels, such as call volume. Communities with less crime have fewer RCMP, proportionately.
- RCMP priorities in the north are i) alcohol; ii) drugs; and iii) youth. There may be slight adjustments temporarily to deal with community specific problems, but these priorities are fixed across the north and have been for some time.
- Reasons cited most often for substance abuse are that parents and/or friends are using.

- · Recreational facilities are a major issue in town. Money has been identified to expand these, but not nearly enough so far.
- Recreational facilities are stressed as they were built for population about ½ the current size.
- Recreational facility options include building new, or retrofitting existing one. Money has been identified from the gas tax for Nunavut and community, but it's not enough. Options are limited.
- Respect of elders is very important; requests of elders to go get river water for them to drink or to help them in various ways are respected.
- Rotational work allows people to live where they choose rather than close to projects. There is some expectation that if the Kiggavik project has pick up points across Kivalliq Region, more people will move to Rankin as it can be perceived as a better place to live, with more and better facilities.
- Rotational work may be more manageable for people, however people have to be determined to make employment work. Nunavut Arctic College has follow up program son graduates.
- Schools are funded based on the numbers of students, but should be funded on the basis of student needs.
- Scientists are often wrong.
- · Scientists need to explain the effects of uranium and what will happen after the mine closes.
- Services include: sick clinic program, chronic illness clinic, ophthalmology one week of every month, advanced x-rays (i.e. have a technician), birthing centre, well child clinic, mental health services (2 outreach workers and a psychiatrist comes in each quarter for one week), social workers (supervision of social workers in smaller communities is the responsibility of this office), addictions services.
- Sharing has probably decreased somewhat, but a lot of this has to do with much larger populations people share within large extended families rather than with the whole community, which is just too large now.
- Should focus on positives instead of negatives.
- · Single men can easily manage rotational jobs at mine sites, but how can a woman with children manage that?
- Skills training needs to transferable.
- Social development priorities are territorial, fall out of Government of Nunavut social policy.
- Social workers provide support to families that have had a suicide or an attempted suicide.

- Some artists say the only reason they produce art is to make some money, otherwise they wouldn't do it. Others say that they would give up art as a livelihood if they could get a real job, but would still do art as a sort of hobby because it is in the blood. Others say they do art as a livelihood because it is better to make your money from doing something you enjoy.
- Some changes in caribou have been observed: boils on skin, white spots that resemble larvae, fluid around joints. These changes are off-putting so people do not eat the meat.
- · Some hunters will bring back 2 or 3 caribou a weekend. The meat is shared with immediate and extended family members.
- Some men are not prepared to leave their families, particularly their grandchildren, to do rotational work.
- Some women hunt sea mammals such as seals but it is rarer for women to go out on the water.
- Some women may want to work for mines, but that would be on the condition that they were assured of good medical care.
- Some young people don't hunt much. They want to teach their children to hunt when they are ready but that needs resources.
- Some young people who drink give it up completely when they have children.
- · Substance abuse has gotten worse over time in the community and will continue to get worse unless there is a 'new life' for the young.
- Success in finding employment opportunities is linked to graduating from high school and timing.
- Suicide is not talked about in the north, and not reported. The fear of copy cat behaviour is silly, as everybody within a community knows when someone commits suicide anyway.
- · Suicides will continue to increase many male suicides are linked to sexual assault of female family members.
- Tapestries are not done often in Rankin, which is too bad because it would be good for women to do more art. But women do make clothes and dolls, and sell these by announcing items for sale on community radio.
- The addiction project sees men, women, and couples. Because it is the court that refers people, children are not part of the clientele. Substance abuse is often a family activity.
- The addictions project also sees a lot of people more than once, they circle through addiction, court, treatment and then back to addiction.
- The addictions project is funded by the hamlet and has been in operation for 25 to 30 years.

- · The addictions project primarily treats drug and alcohol addictions and sees about five people per month.
- The church has hurt people and therefore but for some religion can be helpful in battling problems.
- The concern with marijuana is that it is hugely stronger today than in the past (active ingredient is now at 30% when it used to be 2%) and is definitely addictive.
- The current recession is giving Nunavut a chance to catch up.
- The elders with long experience on the land are dying (it has been 60 years since people were beginning to be brought into settled communities) so it is critical to capture as much of their knowledge as possible now.
- The government asks Nunavut Arctic College to do just about everything, and most of it they can't always do.
- The hamlet has lots of services and programs but doesn't have an elders' centre.
- The health centre has 6 RNs (or BSCN's); 4 are Inuit who trained in Iqaluit and two of these nurses are from Rankin. The birthing centre is staffed with 2 midwives, one of whom is Inuit.
- The health centre sees 1,200 to 1,300 patients a month, some of which are emergencies. Emergencies that require evacuation take more time and resources but you cannot plan for these. Generally, staffing needs are met.
- The high school has zero tolerance for drug use, so it really doesn't have much of a problem, but there is probably use outside in the school. Part of the problem is that there have been a more than one of health workers who have come into town and been quite public about their dope use.
- The high school needs to do more follow up on students, both to understand what happens to them and to support them when they go away.
- The high school worries about its current population kids who have dropped out are let back in on a case by case basis.
- The high school would like to have a day care centre.
- The human resource inventory of KIA has not really begun yet but there has recently been a training session for enumerators.
- The KIA has not made progress with their IQ database they have collected some stories from elders but are looking for space and staff to start the database.
- The Kiggavik project would be good for Rankin, as long as environmental concerns are managed well.
- The lack of jobs means that some people try to do art to earn some money.

- The Matchbox gallery provides a place to work to selected Inuit artists.
- The middle school has 130 students and is pretty well at capacity. It has five teachers teaching grades 5 and 6 as well as an Inuktitut teacher, 2.5 teaching assistants and a principle and student support (counselor) working half time.
- The middle school really needs a full time counselor.
- The more disposable income there is, the more policing is needed because inevitably people are more active.
- The Morrisburg heavy equipment operator program provided people with the equipment and materials they needed to learn but probably wasn't long enough to have operators develop good enough skills to get hired. Some have done well since training, but others never found employment.
- The new Technical Trades Training Centre will open in 2010, with emphasis on electrical, plumbing, house maintenance (unique to the north) and oil burner mechanic programs. Heavy equipment technician and automotive mechanic programs will be added in 2012. A centre is also opening in Cambridge Bay where millwright, welding and mining courses will be offered.
- The north needs development and has little else other than mineral resources. It is just too remote to participate competitively in the mainstream economy.
- The number of artists is increasing because communities are growing, it is not that more people proportionately are starting to do art.
- The people of Baker Lake are inland people so they depend on fish, ptarmigan and caribou. Their livelihoods should be protected. In Rankin Inlet, at least, we have sea mammals. But there are fewer seals around and maybe this is because of mining.
- The project would be good thing because it will create employment opportunities and allow people to get off income support and care for their families better.
- The Rankin Inlet Health Centre was opened 3 ½ years ago. The new 13 bed hospital wing will make this a Regional Health Centre focusing on 24 to 48 hours of stable care services (critical patients who stabilize will be transferred here).
- · The RCMP and health services are on a collision course with Inuit, all they see is the problems and come to wrong conclusions, wrong attitudes and wrong approaches.
- The recent recession is being felt already the carving market is down, prices are low.
- The south is moving in too fast.

- The traditional Inuit value of sharing is disappearing. People are less willing to share when they see what is happening to what they have to offer, how it is used and how people treat their families, especially their children.
- The women are worried about worker health and safety, and in the event of an emergency what kinds of medical facilities would be on site.
- There are 3 or 4 community feasts a year when there is excess meat or in special circumstances such as when 600 Narwhal were trapped in ice near pond inlet and DFO okayed hunters to harvest them.
- · There are a lot of young adults who use carving and other artistic pursuits simply to find drug money. They often try to sell unfinished and/or poorly done work to tourists.
- There are about 30 staff, including 21 teachers at the high school.
- · There are about 300 students at the high school in Rankin and perhaps they could squeeze in about 50 more.
- There are currently 25 Nunavummiut registered as masters students in the south.
- There are more students going to college just after graduating from high school.
- There are now more opportunities in Rankin Inlet to motivate students to stay in school.
- There are programs in schools that facilitate interaction between elders and the young.
- There are real concerns about contamination of the land, water, resources and people, as well as about the uses the uranium will be put to.
- There are stories about people working at mining sites being told to do illegal things (environment, workers protection) on pain of being fired.
- There are stories about prostitution in Baker Lake.
- There are strong currents all the way down to Churchill and oil spills could have a terrible effect over the entire region.
- · There are tensions between communities and the government over an unwieldy EIA process, as communities usually are impatient to see the jobs that developed projects bring.
- There are too many, too young, too inexperienced and short term health and education workers in the north some don't bother to learn anything about the Inuit, don't bother to buy the right clothes (which just says they don't intend to participate or stay) but just impose their southern view of things on people

- · There is a lot of variation in who hunts where. Some people have ATVs and will go as far as 5 gallons of gas will take them. Some walk and others travel 20 miles inland.
- There is a semi-formal harvest distribution system. The HTOs are in regular communication and if one HTO has walrus for example, it may be traded with another HTO for caribou. Because of this distribution, it is important that caribou meat and other food sources from one area are not contaminated because contaminated meat could affect people in a much broader trading area than just Rankin.
- There is a small elite, but many are related/attached to these few. If you have a problem in Rankin Inlet and try to solve it, you will find that whoever you have the problem with has a relative of friend that will intervene with some sort of point of leverage to make the problem just go away and leave you with no recourse.
- There is a waiting list for housing. The subsidy on housing is a bonus and people don't want to lose the subsidy for salaried employment.
- · There is almost no talk of shamanism in Rankin, there is a strong taboo.
- There is an interagency committee that includes members of the community, health, education, social services, police etc. The three primary roles are information sharing, planning and implementation the idea is to ensure that assistance programs are planned and implemented in complementary ways rather than competitively or repetitively.
- · There is growing interest in building and owning one's own house.
- There is less violence with drugs and so the effects on families are more hidden.
- There is lots of bargaining in selling art (by the co-op and by tourists) but most artists say the price in the price, they are not interested in bargaining.
- There is more income and more employment compared to other communities in the region and less of a housing issue.
- There is no balance of opinion between scientists and hunters. Hunters are not listened to and resent the decision making process over-values science and the opinions of government experts.
- There is no evidence of gangs selling drugs moving into Rankin.
- There is no HIV/AIDS in Rankin Inlet
- There is no prioritizing of animals or activities because everything is a priority.
- There is not enough being done for mental health.

- · There is resentment that decisions for the Inuit are made by a white government, that people are run by non-Inuit and this was not the promise of Nunavut.
- There is some resentment that the economy has evolved to the extent that people feel they need a paycheck to live reasonably, that is, that the traditional economy has given way to a more modern economy that requires quite a bit of money to participate in.
- There seems to be growing agreement that the Inuit are a different people now and that depending on the land for livelihoods is not enough.
- There was more snow in the past.
- Think about what white denial of Inuit identity and culture has meant to the Inuit, many of whom of lived with this their whole lives.
- This community lives off the land and has heard many stories about the environmental damage mines can cause once they are in operation.
- Tightening up on alcohol results does not result in more use of drugs.
- Too much drug use means children aren't cared for, food cannot be paid for and people are eventually unable to work.
- · Tourism is not well marketed by the government. Outfitters and guides are expected to market their services themselves and marketing and promotional costs are high.
- Town infrastructure priorities are i) closing the old dump (ongoing) as it is too close to town and is a health hazard; ii) building/expanding the community centre which is just too small for the community and also become a safety concern for large events; and iii) land development which is necessary to cope with population growth (about 15% between 2001 and 2006).
- · Trades centres will improve level of training, they will have the equipment and materials to train people as they might be trained in the south
- Train now or fill the jails later.
- Treatment centre waiting times are three to four months, so most people are back in trouble before they can get into treatment centres.
- · Uranium is dangerous for people and animals. Uranium dust travels and can affect a great number of people. You can't see uranium like you can other minerals.
- Use of marijuana leads to use of harder drugs.

- Utilidor system is owned by the federal government.
- · Virtually all graduates find something to do, they do not end up on social assistance.
- · What will AREVA fill the mine pit with when they are finished? Nothing will grow. It will have to be filled with gravel like others were.
- · When a mine is in operation situations arise that cannot be prevented or do not correspond to the mitigation in the EIA.
- · When alcohol is controlled, people just replace alcohol with drugs. And there is always a new drug to try.
- · When children were put into schools they learned the western ways. Young people will never live the way we did.
- · When the nickel mine closed, workers were not assisted in finding alternative employment and were left with nothing. They didn't have hunting equipment and had to walk to hunt so people went on welfare.
- When working with elders to achieve anything, it is important to find the right elder
- · Whereas welfare is provided in kind, baby bonuses are still provided as cash so this is the money that many use to gamble with.
- · White people have brought material possessions to Nunavut, including drugs and alcohol, and then are trying to bring jobs that will give people the money to buy these things. This in turn requires Inuit to have educations, papers, etc. (which is not the traditional way). The whole thing is a trap, resulting in people abandoning their identity.
- · With the exception of the language act, which is a positive achievement, the direction the GN is going in is not good.
- · Women are considered as property in traditional Inuit culture. This is problematical for spousal abuse programs and prevention as many elders, including women, believe that is a woman's role to submit to the will of men.
- · Women go marine mammal hunting, particularly sealing.
- · Young children have ipods and are on the internet, there weren't these distractions a few years ago so maybe now younger people are not as interested in hunting.
- · Young people are not self sufficient so they do not have that to be proud of.
- Young people are reluctant to leave their communities for work and for schooling; family and friends are more important.

- · Young people have now figured out pretty much that it is not much help blaming others for problems. Even if it was white people that brought bad things to Inuit communities, they are now here and causing problems and it can only be up to people themselves to solve the problems.
- · Young people today speak English and they can get on the internet and get information about mining and about uranium. Young people will make the right decisions.
- · Younger people may find fewer job openings in the future.

## **Repulse Bay**

- A few people in Repulse have been trained in Morrisburg but some don't jobs yet. Others have worked in exploration as Hall Beach. So there are some people getting mining experience here in Repulse Bay.
- A whole caribou is sold for \$200 if another community is looking for them.
- An elder remembers not liking new things, such as candy or molasses, not liking the sweet taste.
- Arctic College had a sewing program taught by elders and this was very popular. They also ran a tool making program (ulus).
- · Arctic games (the annual event) are popular.
- As young people, the elders were out on the land. In the winter they lived on the ice, hunting seals. In the summer, they would go inland to hunt caribou and not return until the fall. One reason for the timing was to hunt caribou while their hide was thin, so that they had hides suitable for caribou clothing.
- · At Christmas, the hamlet organizes games for kids but the community could use more recreation for kids maybe a pool.
- · Caribou are close by. Other species hunted are wolves, wolverines, polar bears, narwhal, seal and beluga.
- · Caribou are harder to find in the winter. They migrate south to Rankin and Baker and then move north to Igloolik. In the past, hunters would spend days finding caribou.
- · Constraints to hunting are time and money. Fuel costs are the issue at present. But newer snow machine models are getting to be more complicated and parts are expensive too.
- · Crowding brings about lots of problems -- people can't store enough food, health issues, people run out of water, a lot of stress.
- Elders are not in control of young people anymore.

- Elders) receive meat from people, and are supported in this way.
- Elders, in the past, ran the communities. They told young people where to go to hunt. Now, they don't run communities and their role as hunting advisors is less.
- Even employed people cannot keep up with the cost of living. So, they hunt as a livelihood strategy, this helps them conserve cash for other necessities. This is not for tradition; it's done out of need.
- Every household has a hunter. People hunt for food. It is a livelihood strategy. Store bought food is very expensive and people have bills to pay and spend money on other necessities. So, harvesting game and fishing is important primarily for sustenance.
- Everyone is concerned about birds and caribou that migrate past Baker Lake.
- Fixing snow machines is not as easy to do on your own.
- Gambling (cards) is a problem. Children go hungry because of gambling but the community does not see it as a problem.
- Gambling is as destructive as alcoholism.
- · Hamlet budget is \$4 million. There is a deficit. People over spent the budget now they have to cut expenses and lay people off.
- Having too much surplus country food is not a good thing, it goes to waste
- · House crowding is an issue. Some houses have 13 people living in them. It's very hard to get a house and the population is growing.
- HTO areas of responsibility include distribution of tags, monitoring numbers of animals, encouraging a conservation approach (sustainability) to hunting and fishing. Upholding the guota system is a key role.
- HTO chooses people to fish and sell to the plant in Rankin.
- Hunt only what you need.
- · Hunters harvest caribou, wolf, polar bears, beluga, fox, narwhal and walrus. Walrus are hunted to feed both dogs and people.
- · Hunting was much harder in the past. People used sail boats to hunt marine mammals. Today, you need a snow machine.
- If caribou get too close to the mine, can they become contaminated in some way?
- · If you have to travel further to hunt, the fuel costs are an issue. So, predicting where animals are is important. They migrate.

- In 1978, people were starting to give up dog teams.
- · In Repulse Bay, children eat country food daily.
- In the past, families were entirely dependent on hunting for everything: meat, clothing, seal oil for fuel and light. So, obviously they would hunt more frequently than we do now. They also had dogs to feed so the harvest would have to be bigger (more mouths to feed, not just family members). Their only costs were bullets.
- · In the spring and summer, everyone hunts but not as much in the winter as in the past.
- Inuktitut language skills are being passed down and this is really important.
- · John Rae had a stone house here, some say he discovered the NW Passage. There are 2 whalers buried at Harbour Island and inscriptions on the stone. Whalers wrote on rocks nearby.
- Kids are getting older and trying weed and alcohol. Bootlegging is common.
- Last summer there was 3 or 4 polar bears right in town.
- Meat is not sold; it is shared among family. When a hunter has more than he needs, he will offer the extra meat to people in the community, he will go on the radio and tell people that they can come by to get the meat.
- Muskox is not close anymore so they are not hunted often.
- Muskox is not hunted here.
- · Narwhal hunting is spectacular. People will stay out all night. People can sell the tusks and the maktak is a delicacy. It's very exciting when the narwhal come into the Bay.
- · Narwhal is a species being studied by government to find out about migration patterns. When narwhal are here, you can look out and see them for miles.
- · People also hunt birds. Variety is important partly because people like to have different food and also because people are not supposed to over hunt any one species.
- People are now playing southern games traditional games are not really practiced except in the annual tournaments.
- · People do not need to build igloos anymore so they don't know how. They have cabins instead.
- People do teach their children to hunt but working gets in the way and not all young people are interested.
- · People drink water and get ice from the rivers. Many people won't drink tap water because it's treated.

- · People from Repulse wouldn't even consider a move to Baker Lake because it is inland and the culture and diet are very different.
- People like rotational work.
- · People want to preserve Inuktitut and support government efforts to preserve the language.
- People will hunt wolves and wolverines not for food, but to sell the pelts.
- · Prior to 1968, children were to attend the residential school in Chesterfield Inlet.
- Repulse Bay was not really established as a community until it opened its own school in 1968. Additional housing was brought in at that time the original matchbox houses. Some elders, as children, had never seen anything like this housing before.
- Repulse had a number of polar bear tags this year and all but one remains.
- Repulse has a recreation director.
- Repulse is building a new recreation centre because the old one burned down.
- Residential school could make people stop respecting elders.
- Residential school had an effect but one woman says she never really knew that what was happening was wrong until she was told it was.
- School is over at the end of May and then families start to go out on the land. People are out all night seal hunting.
- · Some families moved to Rankin when the nickel mine was started. People also had jobs unloading ships full of DEW line site materials.
- Some of what has been lost is the basic skills to survive in the arctic.
- Some pelts are sold privately for sewing clothing.
- Some younger people will not stay in Repulse, they need jobs.
- Sometimes the young going out on the land get homesick and are more used to surfing the internet and playing electronic games.
- The alcohol committee receives applications for alcohol orders but will only process 15 a month. So, not everyone can access alcohol every month if they can afford to. The system works well.

- The community first started when whalers coming down from the Southampton area looking for a safe harbour. The first building here was the Hudson Bay Post. The only housing was the HB Co. house and a house for the RC priest. There was another trading company up here but the HB came to dominate and it left, in about 1929.
- The HTO promotes sustainability and doesn't like to see waste
- The young need better funding to be able to complete training programs.
- There are less caribou now.
- There are lot of polar bears in spring and summer, some elders are to go camping.
- There are lots of animals so there are lots to eat, even when unemployed.
- There are lots of polar bears in the area so maybe this is an indication that their numbers are increasing.
- There has been outfitting/guiding here. Clients have been Americans (from Minnesota). The HTO would choose the guide to take the hunters out. This is not allowed anymore. Hunters have to complete guiding courses and be certified. But there is real interest in this activity.
- There is a fish plant in Rankin that will pay people in Repulse for their catch.
- There is a lot of unemployment for the youth.
- There is exploration happening at Hall Beach and Igloolik. If the people there end up without caribou, they will be coming this way to hunt them, putting pressure on our herd.
- There is marijuana in the community but it is middle aged people that are smoking it, not the young.
- There is not much work. When a person gets a job with the hamlet, they will keep it forever. Jobs don't come open.
- There were 72 narwhal tags this season—a person can get 4 maximum.
- They are building a new health centre. The old one is small and has housing attached and is basically not a modern building at all.
- This area is full of interesting history and people are proud of it. One of the elders' grandmothers was born on a whaler's ship.
- Time and gas prices are major constraints to hunting.
- Today, elders still eat country food. Store bought food is too expensive.

- Tusks can be sold to the store and generally go for \$100 a foot. They are sold for carving.
- · Water/sewer system is the main priority for the hamlet.
- When people lived on the land, they had dog teams with them. They made new igloos every night until they reached their destinations (materials for making a tent were too expensive). They used stone lamps and seal oil for lighting. Everything they had come from what they hunted food, oils for heat and light, hides for clothing and footwear. They had to feed the dog teams. This is how one supported a family, it was the only way.
- · With their husbands women participate in caribou hunting but few women have the skills to hunt anything other than seals on their own.
- Wolves may migrate too.
- Women fish in the winter and in the spring they hunt seals.
- You can't hunt without a snow machine.
- · You can't really save money by hunting in groups. Snowmobiles only take a couple of people and if they are really loaded up, the gas costs are greater.
- · Young people are turning to technology, not elders for teaching.
- Young people do not learn survival skills and it's more dangerous for them to hunt.
- Young people either leave the community or they stay, with the understanding that their family will support them if they don't have a job.

## **Whale Cove**

- Elders are pretty healthy because they eat better and go out on the land.
- Learning by experience, by doing things, is better than learning in school from teachers and books.
- · A road to Manitoba would mean that there won't be the problem of people freezing to death travelling on a road).
- · Alcohol is not a healthy thing, but things will only change if something bad happens to someone, like passing out and freezing to death or choking on their own vomit.
- · Although young people may be confused at first, many will learn and can become good employees. It would be helpful if the mines provided pre employment training.

- · Anybody can get a job at the hamlet, even if they are can't do much and even then they don't come to work all the time.
- AREVA (like most companies) will do a good job and the environment is not so much of a worry. Of more interest is jobs and how youth will get such jobs without high school. Mines should provide training for people so that they can manage to get and keep jobs at the mines.
- · AREVA needs to keep the caribou out of danger, and to educate people about what the dangers actually are from a uranium mine.
- At the time of the mine in Rankin Inlet, a lot of people who didn't speak English were hired. The mine helped the Inuit, by not bringing in a whole lot of people from the south to do the work.
- Attendance is a huge problem, and gets worse after grade 9 and when the weather is good.
- Because of the mines, the government has more money to fund training, but are training people in the south, trainers are just money hungry. Training should be done in the communities.
- · Bringing an end to spousal abuse will require women to stop accepting it.
- Dental education is pretty good, with the correct messages delivered by dental therapists visiting schools but the messages particularly about dental hygiene don't seem to be getting through.
- · Elders are powerful in the hamlet and on the council. People listen to them and act accordingly.
- Elders are very grateful to their elders for teaching them things without them having to go to school to get papers.
- Employment is really needed, young people need to get off welfare.
- · Hamlet has a budget of about \$4 million per year, including over \$1 m for payroll for 25 full time and 15 part time staff.
- Hamlet infrastructure is in pretty good shape and so are finances. But the community isn't really growing.
- Housing is generally in good shape and there is not a lot of overcrowding is not extreme.
- · If people do leave the community to work, even temporarily on rotation, they need to know that there is someone at the work site that they can trust and rely on to help them.
- If someone has a job, their rent goes way up.
- · If uranium is handled properly, it can be safely mined.
- · If you have friends in government, you can deal with problems.

- In general people are pretty healthy...
- · In the old days, people didn't have all sorts of health and safety PPE, therefore they had to learn to be careful. Now, people depend on the equipment to save them rather than learning how to survive without it.
- · In the old days, people didn't have to pay huge sums for insurance, which is expensive. First you need papers, then insurance if you want to do anything.
- In Whale Cove there is just no way that someone who commits a crime won't get caught.
- It is easy to find people who have done things wrong. 'People always talk' whether it is boasting about what they have done or about others.
- It is not fair that the people who win at bingo get their social assistance checks cut.
- It is not possible that everybody will agree on any given issue, but with tough economic times you would think that most people would welcome with open arms new projects in Nunavut.
- It is only once in a very long time that one can find a good person in government, who wants to do the right thing for Inuit.
- It is really hard to keep teachers beyond their contracted two years, and more than a few don't even last out their contracts.
- Jealously is a big problem in relationships.
- Kids aren't interested, don't attend classes and don't pass.
- · Kids don't go to school, they don't seem to have grasped the concept that to learn, they must attend school.
- Kids don't speak either Inuktitut or English well.
- · Kids party at night and so are too tired to get up to go to school.
- Kids say they want jobs but are not prepared to get educated to get jobs.
- Kids stay up all night and are too tired to go to school in the morning.
- Many of the female students are pregnant at some point.
- Many working people are supporting two or three households, because so few are working.
- · Maybe the mine should help provide power power is like insurance if you want to open a business because the business rates for power are a killer.

- Mostly just about everybody gets into a little bit of trouble occasionally.
- · NAC knows the prospects for classes in Whale Cove are poor, but just say that they have to be done and that teachers should do the best they can.
- No high school graduation makes youth feel inadequate and lack confidence.
- Not very many people in Whale Cove are still hunting a lot.
- · Nutritional problems may be starting and there is some evidence of an increase in diabetes and heart disease.
- · On average about 6 to 8 babies are born a year.
- · One of the RCMP objectives in Whale Cove is to make very clear to men that they will no longer get away with beating women, that they will get caught and they will be charged.
- One person shouldn't be in a position to affect all of Nunavut with their ideas.
- Parents are not involved in the school and they can't get their kids to get up in the morning to go.
- Parents have to learn that they need to get their kids up in the morning to go to school.
- Paychecks give people a good feeling about themselves, and allow people to buy the food and equipment they need.
- · People are encouraged to advantage of training opportunities, including for business development. Most training is done outside Whale Cove.
- · People are good about taking care of their health, and are well educated about public health issues.
- People do not want to leave the community to go south because they are sick.
- People don't get much excited about working they it would hire people so some people sent in resumes but never heard anything back, so people are beginning to ask themselves why bother.
- People don't necessarily value their teeth and often choose to have them extracted rather than fixed. Treatment (beyond fillings) often involves going south.
- People need jobs so that they can learn by experience some won't work out and will become unemployed again but others will just take off with the opportunity. The rules need to be bent a little bit more to give the young a chance.
- People sometimes don't call the police where there is domestic violence because they have to charges even when the beaten spouse doesn't want to do this.

- People to not live such traditional lives any more.
- People who oppose mining should be held accountable for the damage she does, people will be on welfare if mining projects are stopped. People against mining destroy lives by manipulating people who believe what they say and don't understand enough to disagree or reach their own conclusions.
- People without educations can't get jobs because they can't show they have the required education. Some people without educations are the best workers, but because they didn't complete all the required courses they don't have papers.
- People, including the young, have to make decisions for themselves and if they don't want to do much then others can't do it for them, or change their minds.
- People's teeth are in awful shape mostly because they just don't brush their teeth, but also because there is no fluoride in the water. Diets, with lots of junk food are often bad for teeth, but it is really the failure to brush that is the problem.
- Perhaps the Inuit are too quiet when it comes to handling some opponents of mining. Nobody wants to argue with opponents, because that just works them up and makes them do and say more against mining projects.
- Perhaps the problem with the young is that they know too much, have too much education.
- Personal assaults increased when the community moved to become wet.
- Politicians do not speak for the community but for themselves.
- Prices are really high in the community even though it is the community that owns the Co-op the management there ignores what people want, won't let people take more than \$200 of their own money out at a time and denies more than \$250 credit to people on social assistance even though they know those people will be getting a check soon.
- Problems with attendance in Whale Cover are similar to in other small communities.
- Relationships with men get in the way of getting training and of working.
- Rotation may not be a problem for some women, who are related to half the people in town so their children can be cared for.
- Rotational employment is a good thing because people in Whale Cove really do not want to leave the community.
- · School needs to prepare kids for employment.
- Schools teach traditional activity this the young have to learn by doing with their elders.
- · Some youth hunt and fish rarely and are more interested in traditional activity contests that regular activity on the land.

- · Students don't come to ask for help after school, aren't interested in make up classes to ensure they pass. This is completely different from other communities.
- The caribou used to come close to town, but don't anymore, probably because the youth have scared them off with their snow machines and ATVs.
- The community health committee is not very effective...
- The council is not very proactive, and younger councillors just do what the elders say needs to be done.
- · The curriculum just has too much in it to work well.
- The goal of government is to preserve language and culture.
- The government's rent scale is a disincentive to working.
- The hamlet also needs a youth drop in centre.
- The hamlet has a real struggle with water truck drivers, particularly in the winter when the weather is bad and the work is therefore hard. People just don't come to work.
- The hamlet has a recreation officer, and there is lots of hockey, square dancing and basketball.
- The hamlet has money for programs, but can't find the workers to run any programs.
- The hamlet health committee doesn't do much...
- The health centre does a lot of health education and manages disease outbreaks pretty well.
- The health centre has two nurses and they are very busy right now because of an outbreak of respiratory syncytial virus (RSV). A dentist comes in two or three times a year, an eye doctor once a year, a mental health nurse for a week every month and a doctor (GP) about every six weeks.
- The Inuit want something back for letting the mine go forward, such as a road to Manitoba or better yet a railroad. Then the cost of living would go down.
- The long time nurses in the community great.
- The main reasons for not finishing high school are sleeping in and having children.
- The move to being a wet community has resulted in an increase in spousal abuse.

- The only real employment opportunities in town are the hamlet government, the school and the Co-op.
- The police are very busy in the community doing many things that don't have much to do with policing. .
- The post has two policemen.
- The RCMP doesn't get a lot of calls, but more than they used to because of the liquor bylaw.
- The RCMP put drunks in jail when they find them because it seems that they are not able to take care of themselves, get themselves home.
- The referendum in Arviat was successful in keeping the community dry because there was a death just before the vote.
- The school does not have a problem with violence and doesn't see drug use in the school.
- The school functions more as a drop in centre than a school attendance is very low
- The school is a great facility, with all it needs to teach well and the teachers (11 in total, 4 are Inuit) are excellent. It had 3 graduates last year (two boys and one girl) and may have two or three this year
- The school is interviewing SSAs with grade 6 educations.
- The school principal isn't doing a great job because he won't push issues, doesn't want to step on toes.
- · The town needs a bigger hotel.
- The whales used to be just offshore of Whale Cove but they seem to further out now.
- The world is for everyone the Inuit are not the only people who experience poverty, other people need jobs too.
- The young don't seem to obey any more, they just want to do what they want sleep, play on the internet, watch TV and do drugs.
- The young neither live a traditional life any more, nor have enough English to get good jobs.
- The young want to stay in Whale Cove, they don't want to leave unless they really need money badly. They want to stay because that is where their hearts and souls are. Rotational work is good from this perspective.
- The youth aren't the problem drinkers and they don't do a lot of drugs, probably because they don't have much money.
- The youth need to be more employed, but it is impossible to get them out of bed. Young people are charging their parents with abuse when the parents try to get them out of bed.

- There are lots of problems with equipment that vanishes from dental offices, perhaps because dentists just steal the stuff.
- There have been environmental problems at other mines. At one mine, the mine wasn't fenced and caribou got in and were eating things that may not have been good for them. At Nanisivik, a pile of stored chemicals collapsed and the chemicals ended up on the beach.
- · There is a lot of waste in the system to provide dental care, southern administrators just don't care enough to take good care of and put to good use the resources they have.
- There is a new community hall in Whale Cove.
- There is little motivation to go to school nobody needs to graduate from high school to get a job at the hamlet or the Co-op.
- There is no pattern as to who gets drunk and who doesn't men and women, young and old, employed and unemployed, they all drink.
- There is no women's shelter in Whale Cove and women can only leave the community to go to a shelter if the police lay charges.
- There is some talk that Whale Cove is an ideal location for a regional deep water port.
- There should be more activities in town for youth, but sometimes it is good to stay quietly at home with elders.
- There was a drop in school attendance in Whale Cove's after its move to being a wet community.
- Things don't change much in Whale Cove.
- Tourism is a possible area for increased economic activity but there currently is no outfitter in town.
- Traditional activity can only be learned by working at it, not by playing at it.
- · Training boosts confidence people often don't even try to get jobs because they feel it would be too difficult for them to succeed.
- Whale Cove fishermen barely get cigarette money when they sell to the fish plant.
- Whale Cove has a high percentage of the population with mental health problems.
- Whale Cove is a pretty quiet and a very pro-police community.
- · Whale Cove is overlooked by government, because it is so small.

- · Whale Cove shares its MLA with Rankin South and Rankin South has so many more people to vote than Whale Cove that Rankin gets everything and Whale Cove gets little.
- · What is really hurting the Inuit is the new requirements for papers. It may be fine down south for people to need at least grade 12 but perhaps in Nunavut grade 10 is enough
- · When somebody does have a job his/her whole family keeps asking for money so the worker doesn't get to keep very much of it and decides it is not really worth working.
- · Why does even a garbage truck driver needs to show a grade 10 education why does anyone need an education in garbage.
- With a good paying job I can secure my son's future.
- · Work experience programs can't be done in schools, but need to be done in the real world.
- · Young people can be picky about what kind of job they are prepared to do. They say up front that they will do anything to make money, but that is not always the case.
- · Young people increasingly depend on older people for their country food. These people are sharing their harvests because the young cannot afford to go out and hunt.
- · Young people today feel that they are not well prepared or educated for work at a mine site, so they will be reluctant to apply for such jobs. They are afraid, unconfident and shy.
- · Young people want to finish high school, but there is too much bullying, particularly of kids that are doing well in school. They drop out in response to bullying.
- Youth cannot afford the gear for going out on the land
- Youth would be happy to have a spouse working a rotational job and happy to work hard, as long as the pay is good.

## FOCUS GROUP DISCUSSION RESULTS (GROUPS FOR HUNTERS, ELDERS, YOUTH AND ROTATIONAL WORKERS AND SPOUSES)

## Hunters

• A weekend of hunting costs about \$400 including ammunition, gas and gear.

- Although everybody doesn't hunt everything, there is hunting and gathering of caribou, fresh and salt water fish, grizzly bears, musk ox, wolves, wolverines, arctic hare, foxes, walruses, harbor and bearded seals, beluga, snow geese, ptarmigan and the eggs of other birds.
- Animals are always moving but there is no change in numbers.
- As children (1940s/1950s), people only saw a grizzly occasionally. They are seen all the time now. Grizzlies now take cached meat.
- Barriers to professional guiding involve risks and responsibilities and costly insurance. Start-up costs are significant. Transport Canada requires that boaters have appropriate insurance to take tourists out.
- Because of climate change, the ground is melting faster and affecting vegetation, which, in turn, affects the health of caribou.
- Beluga migrate north hugging the coast by Arviat then strike out to deeper water to travel up to Coral Harbour. They travel up in June and July and back in September. They are thought to breed in the south, near Churchill.
- · Both the Beverly and Qamanirjuak herds migrate through the Kiggavik area.
- · Break-up seems to be quicker and more sudden. There used to be puddles on top of the ice.
- Burrowing owl was sighted a few summers back and there are butterflies in May/June. This is evidence of climate change.
- Canada goose nesting areas have moved further north and are found around all the small lakes.
- · Caribou and fish are the most important wildlife for food. People also like to hunt ptarmigan a lot, and other small birds.
- · Caribou are harder to find in the winter. They migrate south to Rankin and Baker and then move north to Igloolik. In the past, hunters would spend days finding caribou.
- Caribou cross all along the Thelon River at various times.
- Caribou harvest was in March. 850 caribou harvested and sent to Arctic Foods in Rankin Inlet. 850 is considered a low number but that is the number Arctic Foods asked for. There is a contractor that handles the harvesting and transport. An abattoir was set up at the airport. The federal inspection agency is present. The harvest employed about 20 people for a period of 2 weeks.
- · Caribou mate everywhere. When there is a little snow and ice on the lakes, mating starts.
- Caribou won't be afraid of humans in the near future.

- · Children are taken out hunting in the warmer seasons with double walled tents and some hunters have cabins.
- · Children learn to hunt typically at about 14 years of age but it depends on when the child is ready and some go out at a much younger age.
- · Constraints to hunting are time and money. Fuel costs are the issue at present. But newer snow machine models are getting to be more complicated and parts are expensive too.
- Don't harvest caribou bulls in October to December because the meat is poor because they are mating.
- Each HTO receives \$7000 per year for supplies needed to mount a hunt that will provide for elders and those that no longer hunt or receive country foods.
- Economic Development and Transportation provides HTOs with funds to go hunting for food to distribute country food in the communities.
- Elders play a role in teaching younger adults and youth about hunting.
- · Elders) receive meat from people, and are supported in this way.
- End of May is polar bear hunting season. Coral Harbour received 40 tags.
- Every couple of years, beluga are observed in Baker Lake.
- Every household has a hunter. People hunt for food. It is a livelihood strategy. Store bought food is very expensive and people have bills to pay and spend money on other necessities. So, harvesting game and fishing is important primarily for sustenance.
- Every part of the caribou is used for something, and at different times of year caribou are especially good for some things. During the winter, caribou have thick coats so they are good for mitts or kamiks.
- Everyone relies on caribou, fish, seals, ptarmigan, beluga, cloud berries and plants used for teas.
- Fathers will teach their daughters how to hunt if they do not have sons; however, the duty of the father is to pass down hunting skills to boys.
- Few people live as full time hunters, many hunters have full time jobs.
- Fixing snow machines is not as easy to do on your own.
- For beluga, it's best to head to Churchill in early July when they are migrating.
- Grizzlies now seen every summer. Six individual hunters saw grizzlies on the same day.

- Having too much surplus country food is not a good thing, it goes to waste
- HTO areas of responsibility include distribution of tags, monitoring numbers of animals, encouraging a conservation approach (sustainability) to hunting and fishing. Upholding the quota system is a key role.
- · Hunt only what you need.
- Hunters carry satellite phones and gps devices for safety reasons.
- Hunters don't harvest animals ready to give birth.
- · Hunters harvest caribou, wolf, polar bears, beluga, fox, narwhal and walrus. Walrus are hunted to feed both dogs and people.
- Hunters haven't noticed any changes in plants. People have noticed a new species of tall plant growing along the road in and around community. It is about 4 feet tall but the name is not known.
- · Hunters used to watch the wind direction so caribou wouldn't smell them. Caribou don't care anymore.
- Hunting occurs everywhere; everything is important.
- Hunting skills are not being passed down in the younger generation. Time is the main issue.
- If caribou get too close to the mine, can they become contaminated in some way?
- · If the Kiggavik project opens, both the project and the wildlife will have to be watched closely. Caribou feed on the land, so the land has to be protected.
- · If you have to travel further to hunt, the fuel costs are an issue. So, predicting where animals are is important. They migrate.
- · In 1959, a ship unloaded on ice in late September. Thin ice (first ice) was in late August.
- · In the past, families were entirely dependent on hunting for everything: meat, clothing, seal oil for fuel and light. So, obviously they would hunt more frequently than we do now. They also had dogs to feed so the harvest would have to be bigger (more mouths to feed, not just family members). Their only costs were bullets.
- It used to reach -40 degrees often, but not too often now.
- · It's important for young people to learn how to build an igloo and to learn different hunting and survival skills for each season.
- Last year people saw a big group of killer whales, but this was very unusual.

- · Make sure the grizzly or muskox are looked after. Also seals, beluga, walruses, bearded seal, Canada geese, snow geese, snow geese eggs.
- Many hunters prefer to hunt alone unless they're hunting by boat.
- Meat is not sold; it is shared among family. When a hunter has more than he needs, he will offer the extra meat to people in the community, he will go on the radio and tell people that they can come by to get the meat.
- Migration routes and nesting areas need to be protected.
- Mining in the north has different effects from mining in the south. There are no trees, for example, to break the winds. The land is flat. Baker Lake gets strong winds first, and then Rankin Inlet gets them so there is concern here about the air around Baker Lake.
- Money is important—transportation to get out on the land is costly.
- Most hunting occurs between May and September but hunters are anxious to get out on the land now (April) because it's warming up.
- Most people in Baker Lake really depend on caribou for food. It is hard to live traditionally nowadays. But even if we don't live traditionally, (because we live in town), and hunt and gather as many different animals and plants as we used to, it is important to protect all wildlife, protect the whole environmental system. This includes marine animals that we don't depend on.
- Muskox is not close anymore so they are not hunted often.
- · Narwhal are only occasionally seen in Arviat, and bowhead are found only in deeper water but in any case people are not allowed to hunt bowhead in western Hudson's Bay.
- Narwhal is hunted in Repulse Bay.
- New species seen around here are flicker woodpecker and kingfisher seen as well.
- No one in Coral Harbour has a full dog team. People hunt with snow machines but gas is expensive.
- Nobody in the group has seen a wolverine den.
- November to February used to be really cold months, but the cold period is shorter now.
- Once in a while, they will see a narwhal.
- One killer whale was observed in Baker Lake, around 1978?

- · Only 14 polar tags were given out this year for all the communities nearby and these are all for defence kills.
- Only a few people in Baker Lake go looking for marine mammals down the inlet, but every year there are some seals that appear in Baker Lake itself, near the east end. And every year some people from Chesterfield Inlet come inland towards Baker Lake to hunt caribou.
- Originally, there were 40 caribou brought over from Coats Island. The herd grew to 30,000. Now there are about 10,000 and they are all over Southampton Island. There is some suggestion of in breeding resulting in health issues.
- People also hunt birds. Variety is important partly because people like to have different food and also because people are not supposed to over hunt any one species.
- People are not allowed to go south towards Churchill to hunt because government wants to protect tourism.
- People are starting to notice that there are fewer char in some of the major rivers, but maybe this to because of a growing population of harbor seals.
- People don't need to go as far as before to hunt, with the exceptions of wolf and wolverine these are not often found close to Baker Lake.
- People hunt and fish for food. No one sees this as a recreational activity.
- People hunt whenever they can and many hunters will take their holidays when there is more daylight so they can hunt for longer periods.
- People mostly hunt harbor and bearded seal and beluga whale.
- People need jobs to finance hunting.
- Plants are gathered by elders from August to September.
- · Projects must make sure things are safe for the environment. Regulations must be followed.
- Ptarmigan are a large part of the diet. Arctic hare as well.
- · Rankin hunters want to keep the tags for themselves, not sell them to tourists..
- Ring seals are mostly found at Nunallo on the border with Manitoba. There seem to be different types of ring seals, varying in size from 2 to 5 feet. The bigger they are the smellier they are.

- Sandhill cranes nest anywhere on dry land. They don't make nests only little indents on the ground. One came into town in the mid 1960s.
- Seals were seen 3 times in Baker Lake last year. They come every year in the summer. Harbour seal, ring seal, and the occasional bearded seal.
- · Some believe that other communities got at least a few hunting tags (whereas Arviat got none) but others believe that no community in Kivalliq got anything other than defense kill tags.
- · Some changes in caribou have been observed: boils on skin, white spots that resemble larvae, fluid around joints. These changes are off-putting so people do not eat the meat.
- Some hunters sell what they hunt.
- Some hunters will bring back 2 or 3 caribou a weekend. The meat is shared with immediate and extended family members.
- Some walrus are hunted as well, they come south from Wager Bay in June.
- Some wet areas have become drier. Ice freeze-up is quite a bit later. As a child, freeze-up was October. Last year it was in late November.
- Some women hunt sea mammals such as seals but it is rarer for women to go out on the water.
- · Swans are found along the Hudson Bay coast. Not sure of their areas.
- Tags were distributed for the cape caribou population study. About 100 caribou were culled. This was a health study, carried out in March 2008 and 2009 and then again at the end of the summer. GN is leading the study.
- The environment has to be protected all year round because animals move to different places in different seasons and there are seasonal differences in what animals do.
- The HTO advises against killing bulls.
- The HTO organizes animal study groups, enforces quotas, and distributes tags through a lottery system.
- The HTO promotes sustainability and doesn't like to see waste
- The Inuit work year round, same as everybody else, to feed themselves, with different activities at different times of the year. Trapping takes place in winter, when animals have thick coats. Male caribou are not hunted during mating, as they don't taste good. It is important not to hunt animals carrying young.

- The numbers of beluga are very large now but they expect quotas will come soon because there are also very many hunters.
- The science methods harm an animal's ability to be themselves. Polar bears can't be hunters with collars around their necks. Tagging and tattooing caribou makes the meat tougher. Normal animals can cope with the disturbance of vehicles and boats, but are disturbed by these things if they are collared.
- There are 3 or 4 community feasts a year when there is excess meat or in special circumstances such as when 600 Narwhal were trapped in ice near pond inlet and DFO okayed hunters to harvest them.
- There are 3 outfitters here. They take their clients out to hunt caribou, walrus and polar bears. 60 walrus tags were issued this year.
- There are a lot less wetlands than there used to be. Now we see different types of birds.
- There are different areas for different seasons. Because water travels to Hudson Bay, make sure the water is protected.
- There are fewer storms now in Baker Lake, but there are still strong winds.
- There are less caribou now.
- There are lots of polar bear around but Arviat got no hunting quota this year (they have some tags for defense kills). Scientists did a poor inventory count –they came in July and didn't find many polar bears but that is normal in July. Arviat was so full of polar bears in October and November that they had to establish patrols to protect people. People were afraid to go out.
- There are lots of polar bears in the area so maybe this is an indication that their numbers are increasing.
- There are programs in schools that facilitate interaction between elders and the young.
- There are strong currents all the way down to Churchill and oil spills could have a terrible effect over the entire region.
- · There are worries about air borne contamination as the prevailing winds are from the west. They are already seeing cysts in stomachs, swollen joints etc. in caribou and MRSA in people. It is possible that blasting at Kiggavik is sending contaminants into the air, which land on the plants that caribou are eating.
- There has been outfitting/guiding here. Clients have been Americans (from Minnesota). The HTO would choose the guide to take the hunters out. This is not allowed anymore. Hunters have to complete guiding courses and be certified. But there is real interest in this activity.

- There is a fish plant in Rankin that will pay people in Repulse for their catch.
- · There is a lot of variation in who hunts where. Some people have ATVs and will go as far as 5 gallons of gas will take them. Some walk and others travel 20 miles inland.
- There is a semi-formal harvest distribution system. The HTOs are in regular communication and if one HTO has walrus for example, it may be traded with another HTO for caribou. Because of this distribution, it is important that caribou meat and other food sources from one area are not contaminated because contaminated meat could affect people in a much broader trading area than just Rankin.
- There is no balance of opinion between scientists and hunters. Hunters are not listened to and resent the decision making process over-values science and the opinions of government experts.
- There is no guiding activity in Arviat now that the polar bear hunt is finished. This represents a significant loss to the community as last year they had seven hunt tags at \$25,000 each.
- There is no prioritizing of animals or activities because everything is a priority.
- · There is someone who hunts caribou and leaves the carcass. This is not IQ. It is considered offensive.
- · There isn't as much water as there used to be in Chesterfield Inlet, the water is shallower.
- There was more snow in the past.
- · Tourism is not well marketed by the government. Outfitters and guides are expected to market their services themselves and marketing and promotional costs are high.
- · Traditional wildlife used to run at the smell of humans, but now stay and even come close to the garbage area. They are no longer afraid of humans.
- · Trout and char fishing are really popular.
- Until the mid-70's, there were restrictions on caribou hunting but not now.
- · Used to travel far to harvest caribou, but now, don't need to go further than 40 miles. Caribou are just there now, and hunters don't know why.
- · Walrus are found only in Hudson Bay, because of the deep water.
- · Water affects the land and its animals and also marine animals so it needs to be protected as well. Kiggavik could impact all types of wildlife.

Results

- · When a mine is in operation situations arise that cannot be prevented or do not correspond to the mitigation in the EIA.
- · Wildlife move so it is important to protect the environment everywhere, not just at specific places.
- · With their husbands women participate in caribou hunting but few women have the skills to hunt anything other than seals on their own.
- Wolves and wolverine are caught in the winter because of their thick coats.
- · Wolves may migrate too.
- Women fish in the winter and in the spring they hunt seals.
- · You can't really save money by hunting in groups. Snowmobiles only take a couple of people and if they are really loaded up, the gas costs are greater.

#### **Elders**

- Learning by experience, by doing things, is better than learning in school from teachers and books.
- · A key issue for young people is employment.
- · A lot of Inuit were attracted to the whalers and came to this area from other parts of the region. The Hudson Bay Co. was trading here and that also encouraged people to come to the Chesterfield area.
- · A road to Manitoba would mean that there won't be the problem of people freezing to death travelling on a road).
- All country food is important: seal, fish, geese, etc.
- All Inuit should be able to get jobs at the mines near Baker Lake.
- · Although Arviat was a settlement by the late 1950's, people who came to live there still went out on the land for many months of the year, returning to Arviat to purchase things at the Hudson Bay Co. Families could be out on the land from August until May the following year, however, there were no calendars or celebration days so dates and months are sketchy.
- An elder remembers not liking new things, such as candy or molasses, not liking the sweet taste.
- Animals that are chased have harder meat than animals that are killed on the spot.
- AREVA is not being upfront about their future intentions, there is more uranium than they say.

- AREVA needs to keep the caribou out of danger, and to educate people about what the dangers actually are from a uranium mine.
- As young people, the elders were out on the land. In the winter they lived on the ice, hunting seals. In the summer, they would go inland to hunt caribou and not return until the fall. One reason for the timing was to hunt caribou while their hide was thin, so that they had hides suitable for caribou clothing.
- At closure, there will need to be some sort of compensation program. Workers can depend on the mine forever and they won't buy hunting equipment. There should be a law about compensation at closure.
- At the time of the mine in Rankin Inlet, a lot of people who didn't speak English were hired. The mine helped the Inuit, by not bringing in a whole lot of people from the south to do the work.
- At the time people were first settled in Baker Lake, they were told by government scientists not to collect eggs and not to hunt musk ox. Some people had to, to eat, and had various ways to hide this activity from the RCMP who would charge people if they were found out.
- Because of the mines, the government has more money to fund training, but are training people in the south, trainers are just money hungry. Training should be done in the communities.
- Before deciding whether to support or oppose the project, people need more information to understand what is going on, what the project will mean.
- · Berries would fix people who were not able to eat meat, after eating the berries they could eat meat again.
- · Children are not obedient. Young people are the bosses.
- Coastal community people shouldn't get involved with people in Baker Lake.
- Dried cloudberry leaves are used to make tea.
- Driftwood was collected closer to Hudson Bay (from the ships) and used as kayak building material. Moss was used for cooking. Today, there is a tundra moss that is boiled to make a hot beverage.
- During summer, people eat roots and berries.
- Elders crave country food. You need it to keep you warm.
- · Elders are happy with modern medicine and health care because now people are getting hurt, in snow machine and trucks accidents.

- Elders are in favour of the mine for the jobs that it will bring but want assurance that there will not be disturbance of the caribou that they have depended upon all of their lives. If migration routes are affected, the caribou may move too far away for people to hunt.
- · Elders are very grateful to their elders for teaching them things without them having to go to school to get papers.
- Elders care about what young people want, not only about the traditions.
- Elders get enough country food. There are enough people still engaged in hunting.
- Elders have been hunting all their lives and know a lot about migration and should be consulted.
- Elders like to teach younger people traditional ways such as sewing and skinning animals. But they also want children to learn English.
- · Elders now stay in their homes and don't go out very much anymore. Only the younger hunters go out.
- Elders participate in school programs and are invited to speak to classes at Arctic College.
- Elders participate in school programs to teach traditions but they have not been invited to the school for two years.
- Elders say that country food tasted better than now. Some attribute this to helicopters and airplanes flying over, causing changes to the air that animals breathe.
- Elders try to help young people by listening to them and sometimes they pray.
- · Elders warn the young that if they get into trouble and end up with a criminal record, they may not be employable at the mine.
- Elders would be happy if the young people get work.
- Elders, in the past, ran the communities. They told young people where to go to hunt. Now, they don't run communities and their role as hunting advisors is less.
- Employment is really needed, young people need to get off welfare.
- Even employed people cannot keep up with the cost of living. So, they hunt as a livelihood strategy, this helps them conserve cash for other necessities. This is not for tradition; it's done out of need.
- Every spring geese come into town and swim in the sewage lagoon. "This is the problem with development".
- Everyone is concerned about birds and caribou that migrate past Baker Lake.

- · Grandchildren are not hunting but, rather, are on the internet and watching TV and playing video games. In the old days, children used to beg to go hunting.
- Graves can be found at all the important camp sites, many marked with Inuksuit. There are also areas of stone circles where people used to dance and drum and sing, and kayak rests.
- Groups settled in Arviat spoke different dialects. Inland people were brought to Arviat in the mid to late 1950's. The hamlet consisted of an RCMP post, Hudson Bay Co., Catholic and an Anglican Mission.
- Hunters had movable camps in earlier days. Now, many people in Chesterfield have permanent cabins.
- · Hunting was much harder in the past. People used sail boats to hunt marine mammals. Today, you need a snow machine.
- · If one had a headache, the treatment was to put pressure on it by tying a cloth around the head.
- · If one needed a heating pad, we would heat sand and make one.
- If someone has a job, their rent goes way up.
- · If the project goes ahead, it should be done very carefully and only hire Inuit.
- · If uranium is handled properly, it can be safely mined.
- If you have friends in government, you can deal with problems.
- · If young people give up hunting to work in the mine, they will not be self sufficient if it closes.
- · In 1978, people were starting to give up dog teams.
- In Repulse Bay, children eat country food daily.
- · In the old days, hunters travelled by dog team and wore caribou clothing. They were expert hunters and no one worried about them. Now, hunters use skidoos (dogs are only used for racing) and they don't have the correct clothing.
- · In the old days, people didn't have all sorts of health and safety PPE, therefore they had to learn to be careful. Now, people depend on the equipment to save them rather than learning how to survive without it.
- · In the old days, people didn't have to pay huge sums for insurance, which is expensive. First you need papers, then insurance if you want to do anything.
- · In the past, people didn't get sick so there was no traditional medicine.

- · Inland hunters did not have knowledge of sea mammal hunting techniques.
- · Inland people were brought to Arviat, (forcibly in some cases), because of a sudden decline or disappearance of caribou and the risk that people would starve. In Arviat, food sources were abundant and included sea mammals such as seals and whales.
- Inuit do a lot themselves. They are hands on people.
- Inuit people should be working, not just southerners.
- · It is not fair that the people who win at bingo get their social assistance checks cut.
- It is not possible that everybody will agree on any given issue, but with tough economic times you would think that most people would welcome with open arms new projects in Nunavut.
- It is only once in a very long time that one can find a good person in government, who wants to do the right thing for Inuit.
- It's good for Inuit to be hired as monitors and it's good that wildlife monitoring is happening.
- It's not clear how extreme cold will affect mining activities and equipment.
- · John Rae had a stone house here, some say he discovered the NW Passage. There are 2 whalers buried at Harbour Island and inscriptions on the stone. Whalers wrote on rocks nearby.
- Kids are spending their money on games and cell phones and not on hunting equipment.
- · Kids in school and those that leave for education are not out on the land much.
- · Maybe the mine should help provide power power is like insurance if you want to open a business because the business rates for power are a killer.
- · Might as well support the project those who are opposed should think about how hard the future will be if there are no jobs for people.
- · Mining companies perform better now, environmentally, and young people need jobs and training—but uranium is another thing.
- Mining takes land away from hunting grounds
- Not very many people in Whale Cove are still hunting a lot.
- Nunavut's position to allow mining is good.

- One person shouldn't be in a position to affect all of Nunavut with their ideas.
- · Only younger hunters go down towards Chesterfield Inlet to hunt sea mammals. Baker Lake people do not care much about sea mammals.
- Other mines, such as gold mines, at closure have not been able to fully clean up the mine sites.
- Our ancestors used to make a stone weir for fish and then walk up inland to hunt caribou when their skin was thin. They built the weir in case they were not successful in killing a caribou they would still have food to take home. Gill nets are now used instead of weirs but these stone weirs are important as they represent activities of recent ancestors (relatives).
- · Paychecks give people a good feeling about themselves, and allow people to buy the food and equipment they need.
- People are now playing southern games traditional games are not really practiced except in the annual tournaments.
- People are starting to see different types of animals, birds and plants, perhaps because of climate change.
- People do not need to build igloos anymore so they don't know how. They have cabins instead.
- People may be contaminated, deformed children born because mothers are contaminated from water and air.
- People need jobs so that they can learn by experience some won't work out and will become unemployed again but others will just take off with the opportunity. The rules need to be bent a little bit more to give the young a chance.
- People use to rub mouse fur on blisters.
- People used to dance on the land. Black rubber boots were very good for dancing.
- People who oppose mining should be held accountable for the damage she does, people will be on welfare if mining projects are stopped. People against mining destroy lives by manipulating people who believe what they say and don't understand enough to disagree or reach their own conclusions.
- People without educations can't get jobs because they can't show they have the required education. Some people without educations are the best workers, but because they didn't complete all the required courses they don't have papers.
- People worry about the hunters. Young hunters get stranded or lost. They don't use all the survival skills that the elders had learned.
- People, including the young, have to make decisions for themselves and if they don't want to do much then others can't do it for them, or change their minds.

- Perhaps the Inuit are too quiet when it comes to handling some opponents of mining. Nobody wants to argue with opponents, because that just works them up and makes them do and say more against mining projects.
- Perhaps the problem with the young is that they know too much, have too much education.
- Prior to 1968, children were to attend the residential school in Chesterfield Inlet.
- Rabbit droppings, mixed with water, was for stomach aches.
- Repulse Bay was not really established as a community until it opened its own school in 1968. Additional housing was brought in at that time the original matchbox houses. Some elders, as children, had never seen anything like this housing before.
- Residential school could make people stop respecting elders.
- Residential school had an effect but one woman says she never really knew that what was happening was wrong until she was told it was.
- Rivers have grown larger.
- Roots of bushes (unnamed) were used to cure stomach aches.
- Schools teach traditional activity this the young have to learn by doing with their elders.
- Scientists are often wrong.
- Scientists need to explain the effects of uranium and what will happen after the mine closes.
- · Since the north is so cold, we design and make our own clothes. The store bought clothes are not warm enough. We depend on animals not just for food but for our clothing.
- Smoke can affect the caribou.
- Some coast people come toward Baker Lake to hunt wolves, wolverine and musk ox.
- · Some families moved to Rankin when the nickel mine was started. People also had jobs unloading ships full of DEW line site materials.
- Some kids see their parents taking drugs.
- Some of what has been lost is the basic skills to survive in the arctic.

- · Some people still use moss on the land when they forget to bring toilet paper with them.
- · Sweet plants were harvested as candy. Cowberries, blueberries and black and red berries were also gathered and still are.
- Talking to kids about street drugs encourages them to try them.
- Teas were made out of some plants that had medicinal properties.
- · The ancestors of people in Chesterfield, Rankin and Arviat used to hunt in the Baker Lake area.
- The area around the island on the other side of Baker Lake seems to be getting more shallow.
- The AREVA site has garbage on it, in torn open bags.
- The caribou used to come close to town, but don't anymore, probably because the youth have scared them off with their snow machines and ATVs.
- The community first started when whalers coming down from the Southampton area looking for a safe harbour. The first building here was the Hudson Bay Post. The only housing was the HB Co. house and a house for the RC priest. There was another trading company up here but the HB came to dominate and it left, in about 1929.
- The first school was opened in 1959.
- · The ice flows used to bring the ice to the shores of the Thelon but now the ice seems to stay in the middle and the water level seems to be going down.
- The Inuit still eat a lot of caribou and won't stop eating caribou. They also eat a lot of fish (trout, whitefish and char).
- The Inuit want something back for letting the mine go forward, such as a road to Manitoba or better yet a railroad. Then the cost of living would go down.
- The Kazan river seems to have more sand, either because the water level is going down or because more sand is being deposited.
- The land looks different now because of climate change.
- The migration of caribou is of less concern since the Northern Store opened.

- The mission was established in 1912 along with the hospital. The residential school opened in 1951. People from all over the region came to attend school. School was in for 10 months of the year. The children in residence were not permitted to hunt, even with a local family. They were permitted to trap fox nearby. So, the residential school students participated and learned to hunt only when they went home for the summer.
- The mixing of Inuit and non Inuit may cause problems.
- The original wildlife is still there, but now there are new animals and birds and some birds are staying all winter.
- The people of Baker Lake are inland people so they depend on fish, ptarmigan and caribou. Their livelihoods should be protected. In Rankin Inlet, at least, we have sea mammals. But there are fewer seals around and maybe this is because of mining.
- The rivers are drying up.
- The traditional diet was rich in calcium and nutrients. Nutrition was the treatment of illness.
- The whales used to be just offshore of Whale Cove but they seem to further out now.
- The world is for everyone the Inuit are not the only people who experience poverty, other people need jobs too.
- The young don't seem to obey any more, they just want to do what they want sleep, play on the internet, watch TV and do drugs.
- The young neither live a traditional life any more, nor have enough English to get good jobs.
- The youth need to be more employed, but it is impossible to get them out of bed. Young people are charging their parents with abuse when the parents try to get them out of bed.
- · There are different geese, insects and birds like martens, a small black bird and northern woodpecker.
- There are drugs and alcohol in the community and have been for a long time. In the 70's the ships and barges brought these in.
- There are lot of polar bears in spring and summer, some elders are to go camping.
- There are new sicknesses now when people lived on the land they only used to get colds.
- There are numerous important cultural sites nearby. Some of these are stone fox traps, grave sites at old camps, Thule sites, stone weirs (for catching fish), Inuksuit and stone pits for cooking.

- There are pros and cons to mining. It might affect caribou migration and people depend on caribou. But it is very hard to find jobs in Arviat, business is not growing and young people are on social assistance.
- There have been environmental problems at other mines. At one mine, the mine wasn't fenced and caribou got in and were eating things that may not have been good for them. At Nanisivik, a pile of stored chemicals collapsed and the chemicals ended up on the beach.
- There is exploration happening at Hall Beach and Igloolik. If the people there end up without caribou, they will be coming this way to hunt them, putting pressure on our herd.
- There is fear of lifestyle changes with development but people also say that the next generation is important and they need jobs.
- There is pride in developing a good hunter.
- · There is resentment that decisions for the Inuit are made by a white government, that people are run by non-Inuit and this was not the promise of Nunavut.
- There was a doctor and an RCMP detachment in Chesterfield's earliest days.
- · There was a moss that ground up cured snow blindness and breast milk mixed with ice would also work.
- There was good hunting close to Arviat but in the past people were mobile and would travel long distances to find good places to fish and hunt. People went to Whale Cove because it was a good place to hunt beluga. Elders say that wildlife and sea mammals are still plentiful around Arviat that nothing has changed.
- There were no special places for plant collection. Plants were everywhere. But the area around Judge Sissons Lake was good for red berries.
- This area is full of interesting history and people are proud of it. One of the elders' grandmothers was born on a whaler's ship.
- Today, elders still eat country food. Store bought food is too expensive.
- Traditional activity can only be learned by working at it, not by playing at it.
- · Traditional cures are not used now why bother now that there is a nursing station.
- Trapping completely died out in Chesterfield and a number of years ago. A key reason was that the government came under pressure from Greenpeace to ban leg- hold traps. Instant kill traps were distributed but trappers found them dangerous and difficult to set up. There were a lot of accidents as a result of these traps and people eventually gave up the activity altogether.

- · Uranium is dangerous for people and animals. Uranium dust travels and can affect a great number of people. You can't see uranium like you can other minerals.
- Uranium will escape and contaminate where we hunt, especially the land along the Thelon and on the south side of Baker Lake.
- We are not going to go back that's not the intention in teaching traditions."
- We taught our children to hunt and they became good hunters.
- Whale Cove fishermen barely get cigarette money when they sell to the fish plant.
- · Whale Cove shares its MLA with Rankin South and Rankin South has so many more people to vote than Whale Cove that Rankin gets everything and Whale Cove gets little.
- · What is really hurting the Inuit is the new requirements for papers. It may be fine down south for people to need at least grade 12 but perhaps in Nunavut grade 10 is enough
- · What will AREVA fill the mine pit with when they are finished? Nothing will grow. It will have to be filled with gravel like others were.
- · When children were put into schools they learned the western ways. Young people will never live the way we did.
- When people lived on the land, they had dog teams with them. They made new igloos every night until they reached their destinations (materials for making a tent were too expensive). They used stone lamps and seal oil for lighting. Everything they had came from what they hunted food, oils for heat and light, hides for clothing and footwear. They had to feed the dog teams. This is how one supported a family, it was the only way.
- · When people's eyes were bothered with 'white stuff' a louse tied with a hair was put into the eyes to take the white stuff out.
- · When the nickel mine closed, workers were not assisted in finding alternative employment and were left with nothing. They didn't have hunting equipment and had to walk to hunt so people went on welfare.
- · Why is Baker Lake looking at a uranium project again when we rejected uranium years ago?
- · Why does even a garbage truck driver needs to show a grade 10 education why does anyone need an education in garbage.

- Women did not hunt sea mammals because it was dangerous. A women might learn to hunt if she did not have any brothers so her father taught her the skills. More typically, women would go out on the land with their husbands and stay at the camp to dry meat and cook.
- · Work experience programs can't be done in schools, but need to be done in the real world.
- Young people (even 20 something's) are speaking a mix of Inuktitut and English.
- · Young people are not interested in traditions some are, some not.
- Young people are not self sufficient so they do not have that to be proud of.
- · Young people increasingly depend on older people for their country food. These people are sharing their harvests because the young cannot afford to go out and hunt.
- · Young people today speak English and they can get on the internet and get information about mining and about uranium. Young people will make the right decisions.
- · Young people want to finish high school, but there is too much bullying, particularly of kids that are doing well in school. They drop out in response to bullying.
- · Youth need to stay in school.

### **Young Adults**

- A lot of young people are doing drugs. But it is not like you see drug affected people on the roads more than before.
- A whole caribou is sold for \$200 if another community is looking for them.
- · Adults and children pick berries. There are many nearby places to pick berries. Men collect berries too.
- · Although young people may be confused at first, many will learn and can become good employees. It would be helpful if the mines provided pre employment training.
- · Arctic College had a sewing program taught by elders and this was very popular. They also ran a tool making program (ulus).
- · Arctic games (the annual event) are popular.
- · Arctic sports are very popular here. Chesterfield holds the championship. These games are taught to kids in schools and by family members.

- AREVA (like most companies) will do a good job and the environment is not so much of a worry. Of more interest is jobs and how youth will get such jobs without high school. Mines should provide training for people so that they can manage to get and keep jobs at the mines.
- At Christmas, the hamlet organizes games for kids but the community could use more recreation for kids maybe a pool.
- Baker Lake has always been changing.
- · Baker Lake is different now, there is a lot more activity this summer, more dust and clearly more money in town.
- Because younger people are less likely to go out on the land, there are businesses in Baker Lake with people who go hunting and fishing and sell the product to others.
- Caribou are close by. Other species hunted are wolves, wolverines, polar bears, narwhal, seal and beluga.
- · Caribou is abundant all year.
- Caribou is hunted; people dry the meat so they have a supply for months.
- · Chesterfield needs more jobs, lower prices and more activities for children.
- · Coral Harbour is a good place to raise a family. It is safe, people look out for one another; people are not as individualistic as in the south.
- · Country food is of high importance to this community so the welfare of animals is important, it is the cornerstone of Inuit culture.
- Country food is sometimes purchased from people but most of all it is shared.
- · Crowding brings about lots of problems -- people can't store enough food, health issues, people run out of water, a lot of stress.
- Drugs are more accessible now (but it is mostly marijuana)
- · Elders are involved in sewing classes, organizing traditional gatherings, storytelling and encouraging youth to speak Inuktitut.
- Elders are not in control of young people anymore.
- Elders are respected in Coral Harbour. But elders are not always right.
- Elders do not really understand the land claim agreement.

- Elders should be paid to work as experts in what they know.
- Elders should make the decisions or at least have a strong say in decisions about mining.
- Elders should not have to travel further to hunt because of a road or because a mine's activities have disturbed migration patterns and routes.
- Elders want to share what they know.
- Gambling (cards) is a problem. Children go hungry because of gambling but the community does not see it as a problem.
- Gambling is as destructive as alcoholism.
- · Girls prefer ice fishing to hunting.
- Housing is an issue for young families.
- HTO chooses people to fish and sell to the plant in Rankin.
- · Hunting in groups is to share fuel costs and equipment, and because it is safer.
- · Hunting is in decline because people are working. It's also harder and more time consuming than just buying at the store.
- · If people do leave the community to work, even temporarily on rotation, they need to know that there is someone at the work site that they can trust and rely on to help them.
- In mid June eggs are collected (geese, duck and gull).
- In the old days hunters used whale oil for bug repellent. Today, hunters wear mosquito netting.
- · Inuit culture is strong, and ways of life do not disappear because of mining.
- Inuktitut language skills are being passed down and this is really important.
- It is easier for girls than boys to finish high school because boys can't concentrate and are in a hurry to earn some money. Most high school graduates are girls.
- It is very important to teach and speak Inuktitut to children, because if they do not learn they will understand the elders.
- · It is wrong not to teach your children to speak Inuktitut, but some younger people are doing that.
- It's a big deal when a child catches his first fish.

- It's quiet and peaceful here.
- Jobs are easy to find in Igaluit but not in Rankin.
- Jobs in the hamlet are taken by members of one influential family. These people are not qualified, but the jobs are inherited.
- · Kids are getting older and trying weed and alcohol. Bootlegging is common.
- Last summer there was 3 or 4 polar bears right in town.
- Many working people are supporting two or three households, because so few are working.
- Marijuana is here in this hamlet but there are no hard drugs and people are aware of the dangers.
- Marine mammals are in good supply walrus, seal, and beluga.
- Men and women both sew clothing out of hides. Sewing is a skill that is passed down, not learned in school.
- · Mines are important sources of employment, but it is also important to protect the environment.
- · Mining companies need to provide more information more proactively, people shouldn't have to go to KIA to get information on projects.
- Muskox is not hunted here.
- · Narwhal is a species being studied by government to find out about migration patterns. When narwhal are here, you can look out and see them for miles.
- No high school graduation makes youth feel inadequate and lack confidence.
- Not many people hunt in winter, you need a snow machine.
- · Older hunters and elders warn the young of the hazards of hunting in white-out conditions. You need to be able to see the cracks in the ice.
- Older relatives worry about younger hunters.
- Parents and grandparents are putting more pressure on kids to finish high school now.
- Parts for snow machines and gas are the big expenses. People really must maintain their snow machines and be careful of crashing them because repairs and parts are costly.

- People always come back to Chesterfield. This is a good place to live. But parents do not expect their children to stay unless the job situation improves.
- People crave country food—especially if they grew up on it.
- People do teach their children to hunt but working gets in the way and not all young people are interested.
- People here also go crab jigging. Crabs are caught by hook and occasionally with crab traps.
- People hunt for food.
- · People need to get educations and employment but they also need to protect their Inuit identity.
- People purchase food through mail order using a link card, a pre-paid card. Those that don't have a link card borrow from those that do.
- People want to preserve Inuktitut and support government efforts to preserve the language.
- People will hunt wolves and wolverines not for food, but to sell the pelts.
- Politicians do not speak for the community but for themselves.
- Prices are really high in the community even though it is the community that owns the Co-op the management there ignores what people want, won't let people take more than \$200 of their own money out at a time and denies more than \$250 credit to people on social assistance even though they know those people will be getting a check soon.
- Providing for the family now is 'making money'.
- Repulse had a number of polar bear tags this year and all but one remains.
- Respect of elders is very important; requests of elders to go get river water for them to drink or to help them in various ways are respected.
- Rotational work can be bad in some cases both parents are working at the mine and leaving the children behind in town.
- Seal is a life line.
- Sharing is very important to the Inuit.
- Some pelts are sold privately for sewing clothing.
- · Some people have the tools for carving, but tools are expensive and extra disposable income needs to be spent on food.

Results

- Some people sell pelts privately, you can make a pretty good living from trapping.
- Some people trap arctic fox and send the pelts for auction in the south (Thunder Bay). The wildlife office collects the pelts and pays the trapper between \$20 and \$50 per pelt. Price depends on quality. A seal skin is usually worth \$50.
- Some women make and sell mitts and parkas.
- Some young people do go hunting regularly. The main difference between their hunting and their parent's is that they hunt in groups.
- Some young people don't hunt much. They want to teach their children to hunt when they are ready but that needs resources.
- Some young people who drink give it up completely when they have children.
- Some younger people will not stay in Repulse, they need jobs.
- · Some youth hunt and fish rarely and are more interested in traditional activity contests that regular activity on the land.
- Sometimes the young going out on the land get homesick and are more used to surfing the internet and playing electronic games.
- Success in finding employment opportunities is linked to graduating from high school and timing.
- The course (outside Nunavut) was very hard and it felt like I was losing my language so I came back.
- The educational requirements of A-E are discouraging people, because many have not completed high school. There now is a limit on going back to high school you have to be 25 or younger.
- The focus on young people of parents and government is sort of new before, youth were not much worried about. But now youth are asked for their opinions and listened to.
- The government tells us that there are too many caribou on the island. They were brought here originally from Coats Island. There was a long period of restricted hunting so the population grew.
- The hamlet also needs a youth drop in centre.
- The hamlet has had the same workers for 20 years, but should let them go to work for Meadowbank people should work where they want and people who like rotational work should be able to go work for A-E and free up jobs in town for those who won't work rotationally.

- The land and the abundance of animals is an important feature of Chesterfield Inlet.
- The long time nurses in the community great.
- The main reasons for not finishing high school are sleeping in and having children.
- The Northern store sells pelts but these come from the south.
- The presentations that mining companies do on their projects are generally pretty dry and many of the young are not terribly interested in listening to them anymore.
- The young also fish.
- The young need better funding to be able to complete training programs.
- The young want to stay in Whale Cove, they don't want to leave unless they really need money badly. They want to stay because that is where their hearts and souls are. Rotational work is good from this perspective.
- · There are 3 churches, Anglican, Catholic and Glad Tidings. People don't hunt on Sundays. This rule is IQ.
- There are a lot of activities that families can do together.
- There are edible purple flowers that people pick and eat and also certain roots (they are white and taste like carrots).
- There are lots of animals so there are lots to eat, even when unemployed.
- There are no predators here, no wolves. Maybe there is not enough food for all the caribou and some are developing sickness.
- · There are not many jobs for women in Baker Lake, but many women would never do rotational work.
- There are not many traditional activities that men and women don't both do.
- There are some hunters who go out every day after work when its spring and days are long.
- There has been out migration from Coral Harbour. The community won't grow if there are no jobs. People can move around easily because everyone has relatives in other hamlets. Some have relatives in every corner of Nunavut and in Ottawa.
- There is a lot of unemployment for the youth.
- There is a need to have prizes etc. to get youth to go to meetings.

- There is no commercial fishing here as there is on other hamlets. Other hamlets are approached by Rankin's Arctic Foods but Coral Harbour is not, it is too far perhaps.
- There may not be as many belugas around as in the past.
- There should be a mining component in the curriculum at the high school.
- There should be more activities in town for youth, but sometimes it is good to stay quietly at home with elders.
- There were 72 narwhal tags this season—a person can get 4 maximum.
- This community lives off the land and has heard many stories about the environmental damage mines can cause once they are in operation.
- Time and gas prices are major constraints to hunting.
- Traditional skills are being 'converted' into more modern ones. There are not many youth that both want to and can go out on the land.
- Tusks can be sold to the store and generally go for \$100 a foot. They are sold for carving.
- We need funding to continue traditional activities. We would like a building to make sleds.
- · Wildlife has not been well managed in the past. The health of caribou is questionable swollen joints, infections.
- · With parents and grandparents encouraging kids to get an education, retain their traditional ways of life, protect the environment and work, there is a lot of pressure on the young.
- Women are child bearers, so they have to look after children.
- · Women do not go out in the coldest months of December and January -- it's too cold for women then.
- · Women would go hunting more often but are looking after their children.
- Working people provide support to parents, siblings.
- You can't hunt without a snow machine.
- · Young children have ipods and are on the internet, there weren't these distractions a few years ago so maybe now younger people are not as interested in hunting.
- Young parents that want to work rotations at mines should receive some sort of childcare subsidy.

- · Young people are reluctant to leave their communities for work and for schooling; family and friends are more important.
- · Young people are turning to technology, not elders for teaching.
- · Young people can be picky about what kind of job they are prepared to do. They say up front that they will do anything to make money, but that is not always the case.
- Young people do not learn survival skills and it's more dangerous for them to hunt.
- · Young people today feel that they are not well prepared or educated for work at a mine site, so they will be reluctant to apply for such jobs. They are afraid, unconfident and shy.
- · Young people want jobs, training and community involvement.
- · Younger people may find fewer job openings in the future.
- · Youth are generally less interested in the environment than their parents and grandparents.
- Youth cannot afford the gear for going out on the land
- Youth speak English more than they speak Inuktitut.
- Youth would be happy to have a spouse working a rotational job and happy to work hard, as long as the pay is good.

#### **Rotational Workers and Spouses**

- A-E has a gym, but the Inuit don't really use it they don't need to exercise outside their work.
- · A-E, during bad weather, tries to shift work to easier, less dangerous jobs because of the difficulties of getting people out if there is an accident.
- · All feel that it is really important to train the Inuit, keep them in school, help people to finish high school so they can advance on the job, provide on the job and literacy training. They know people who would be good workers, but can't get jobs because of education gaps.
- · All felt that they were learning on the job examples include labourers who have become drivers.
- Assertiveness is not the preferred communication style of the Inuit.
- Baker Lake is a great place to live now, and children have a brighter future here than in other communities.
- Baker Lake's population is growing, and having to house relatives that come to Baker Lake to work is a problem.

- Benefits of employment at Meadowbank include lots of food (workers come home chubby)
- · Cross cultural training might help to encourage respect between different cultural groups that have come to work together.
- · Cultural differences cause problems feeling is that supervisors get suspicious when Inuit smile (which is the Inuit way). Also language has been an issue the Inuit feel that people speaking in French are talking about the Inuit.
- Drug and alcohol problems seem to be about the same as before.
- Employed people spend more time on the land.
- · From April to June, hunters will go out on the land daily. But overall, people seem to go out on the land less.
- It is good to be able to have income to send parents on trips.
- It is mostly white people bringing drugs to Meadowbank but some Inuit may as well.
- It is not in keeping with IQ of sharing the kill, using all of an animal killed, never hunting more than you need and respect for animals to burn animals.
- It seems that since the high school was built, more people are going to school (high school is about 10 years old).
- Lots of people want to work at Meadowbank, but some preparation for employment is needed for some people.
- · Maybe it would be better if only men worked at Meadowbank, so they couldn't have affairs.
- Meadowbank feels like a prison.
- Men have affairs at Meadowbank.
- Mines should be screening workers for HIV (this is not legal but some sort of HIV prevention program might be useful).
- · Mining is safer than it used to be they are not worried about occupational health and safety overlay, just about large accidents/evacuation (Meadowbank).
- · Most feel it is a bit hard for their spouses when they are away (houses are too quiet, more work for spouse) but spouses are getting used to absences, and enjoy what the income does for quality of life.
- Mothers have to hire babysitters privately or ask family members to help. Child care costs depend on number of children and their ages but range from \$20 to \$40 a day. The daycare costs about \$50 a day.
- · Moving to Baker Lake because of work here mean missing family, not having family support close by.

- People are a bit worried about a site accident at Meadowbank that forces an evacuation in bad weather they would not be able to leave, there would be no transport to leave the site. The EMR response team at site needs to be smarter.
- People are taking their kids out of school to go on the land during their weeks off.
- People can have a hard time working in the community in jobs that require confidentiality working for A-E is less stressful because they can talk about their jobs with their families.
- People have also been able to buy their own houses.
- People should try to translate if others are listening. But people at Meadowbank are generally are making an effort to learn some Inuktitut words and to communicate in English.
- People that work at mines need to know their rights and how to file a complaint.
- · People usually find out pretty quickly if the work does not suit them, and quit in a couple of days.
- Reasons for quitting Meadowbank include bad supervisors, specifically in the kitchen and for chambermaids (women workers often), spouses may be unable to handle the absences (or male spouses won't let their wives work at the site), there is harassment of women at the site.
- Rotational schedule of contractors is generally worse than Meadowbank's schedule.
- Some contractors use illegal wage practices (withholding money, not paying overtime etc.)
- Some couples have marital problems when men start to work rotation.
- The employed can afford vehicles, houses on the land etc., before with no income getting out to the land was more difficult.
- The Inuit stick together at the A-E site, to support each other. They are all friends now, and see each other in town as well.
- The isolation at Meadowbank is a bit difficult to bear. There are not enough phones, which people need to stay in touch with their families. The community radio is also not available at the site.
- The main challenge faced by working mothers married to rotational workers is finding suitable child care during the 2 week period that their husbands are away at work.
- There are difficulties (age limits and other criteria) that prevent people from going back to high school after quitting early.
- There are drugs at Meadowbank.
- · There are issues of sexual harassment at Meadowbank.

- · There is an HR officer at Meadowbank to help people with problems, but the Inuit are not comfortable to talking to strangers about their difficulties. So they normally would not go to the HR office with a problem. Meadowbank has also brought social counselors to site occasionally but the Inuit won't talk to them either.
- There is no common area at the mine site to socialize with co-workers; not enough phones so stay connected with home; there is some racism.
- There is one daycare in the hamlet and it is full and has a wait list.
- There is some coke and crack in Baker Lake but very little.
- · Travelling is important, with work you can travel elsewhere in Nunavut and to Winnipeg, with families, for the first time in many years because of additional income.
- Two weeks off gives a lot of time with families and especially with children.
- · Two weeks working and two weeks off is good two weeks off allows time to travel and hunt.
- We feel differently about ourselves as a result of having jobs. We have been able to earn and save money and spend it wisely, are happier and less stressed (no bills) and so are the spouses and kids, met lots of new and interesting people (including from the south), are known and respected in town, are more self-confident in what we know and are able to be proactive in solving problems, are more independent and able to do 'what is right'.
- · We would keep working at Meadowbank as long as we can, don't intend to leave the jobs
- With work experience at Meadowbank, it is easy to find other employment.
- · Women are more likely to graduate from high school, so it is young men that really need educational help.
- · Women worry about their husbands having affairs with other women working at the mine, particularly women with children.
- Workers go out on the land more since they started working for Meadowbank.
- · Workers seem to have gained in confidence, generally enjoy the work, and people have a lot more money.
- · Working has brought people (who didn't previously know each other) together, which is a good thing.

#### FOCUS GROUP DISCUSSION AND INTERVIEW RESULTS, BY AND/OR ABOUT WOMEN

Note: Excludes comments by women hunters, elders, youth and interview participants where comments were not specific to women.

- · While all types of families get into trouble, it seems that it is mostly female single parents who are more in need of help with children.
- There is a lack of parenting skills, particularly among young, uneducated mothers.
- The wellness plan focuses on youth Arviat probably has the best programming for children in Nunavut (head start focuses on parenting, there is a pre-school intervention program, a healthy moms and dads program, etc.)
- Arviat finally got a birthing centre but last year Rankin Inlet took their midwife and now there are no facilities for women to have children in the community so most are sent to Winnipeg. This is very negative and tradition around birth is extremely important to sense of identity and confidence is the health of children. This breaking of tradition About 300 people a month drawing social assistance. A single person gets about \$300 per month and a mother with two children would get about \$400 per month after claw backs.
- · Women did not hunt sea mammals because it was dangerous. A women might learn to hunt if she did not have any brothers so her father taught her the skills. More typically, women would go out on the land with their husbands and stay at the camp to dry meat and cook.
- · The need to fly to Winnipeg to give birth is bad because it means girls have to leave school for a significant amount of time, breaking up their schooling.
- · There are enough pregnant/mothering students that the high school should have a day care in the school.
- The main challenge faced by working mothers married to rotational workers is finding suitable child care during the 2 week period that their husbands are away at work.
- There is one daycare in the hamlet and it is full and has a wait list.
- · Mothers have to hire babysitters privately or ask family members to help. Child care costs depend on number of children and their ages but range from \$20 to \$40 a day. The daycare costs about \$50 a day.
- · Women worry about their husbands having affairs with other women working at the mine, particularly women with children.
- Men have affairs at Meadowbank.
- Maybe it would be better if only men worked at Meadowbank, so they couldn't have affairs.

- There are issues of sexual harassment at Meadowbank.
- Drug and alcohol problems seem to be about the same as before.
- There are drugs at Meadowbank.
- · With work experience at Meadowbank, it is easy to find other employment.
- Benefits of employment at Meadowbank include lots of food (workers come home chubby)
- · Workers seem to have gained in confidence, generally enjoy the work, and people have a lot more money.
- Some couples have marital problems when men start to work rotation.
- There is no common area at the mine site to socialize with co-workers; not enough phones so stay connected with home; there is some racism.
- Meadowbank feels like a prison.
- It is not in keeping with IQ of sharing the kill, using all of an animal killed, never hunting more than you need and respect for animals to burn animals.
- Lots of people want to work at Meadowbank, but some preparation for employment is needed for some people.
- People that work at mines need to know their rights and how to file a complaint.
- · Assertiveness is not the preferred communication style of the Inuit.
- · Cross cultural training might help to encourage respect between different cultural groups that have come to work together.
- Workers go out on the land more since they started working for Meadowbank.
- · From April to June, hunters will go out on the land daily. But overall, people seem to go out on the land less.
- Moving to Baker Lake because of work here mean missing family, not having family support close by.
- Baker Lake's population is growing, and having to house relatives that come to Baker Lake to work is a problem.
- Baker Lake is a great place to live now, and children have a brighter future here than in other communities.
- Mothers are role models, they worked hard and made sure their kids were educated.
- Lives of young adults are a bit different from their mothers' lives, but not that much different.

- · Lives of young adults are really different from their grandmothers' lives, who also worked hard (harder than anybody in the world) but at traditional activity.
- · Women elders prepared their husbands for hunting, made good clothing, prepared and shared food.
- · Young women often decide to have only two or three kids, because it is hard to take care of more than that, physically and financially. Birth control gives options now older people didn't have birth control.
- The schools have safe sex education and kids are more careful about sex these days.
- Two incomes are now needed to live 'reasonably' in Baker Lake. Food and cigarettes are really expensive, as are sports equipment for the kids and buying and maintaining vehicles and boats. Babysitters are also expensive.
- · Kids do what they want.
- Many of the kids are really into sports.
- · Women are generally happy with the quality of health services and say that the schools are pretty good and that their kids enjoy going to school.
- · Parents are not overly involved in the school, but show up for sports events and parent teacher interviews.
- It seems that people are moving to Baker Lake, the population seems to have jumped recently and there are more vehicles in town (but that may be because some people can afford them more easily now).
- There are a lot more jobs in town.
- · Rent goes up very high as soon as income does, so people are thinking more about their own houses. There are also energy efficiency programs in place that help people to pay for their own houses.
- There is no real women's group in Baker Lake, but it would be good to have one.
- The hamlet decided to change the bingo room in the community centre to a youth drop in centre as a suicide prevention measure. The kids really like the drop in centre.
- Lots of chambermaids have quit working at Meadowbank because the work is too hard (93 rooms per shift day).
- Reasons for quitting Meadowbank include bad supervisors, specifically in the kitchen and for chambermaids (women workers often), spouses may be unable to handle the absences (or male spouses won't let their wives work at the site), there is harassment of women at the site.

- · Women are more likely to graduate from high school, so it is young men that really need educational help.
- It is easier for girls than boys to finish high school because boys can't concentrate and are in a hurry to earn some money. Most high school graduates are girls.
- There are not many jobs for women in Baker Lake, but many women would never do rotational work.
- Women here go to Rankin to deliver babies, rather than Winnipeg.
- · Women do not go out in the coldest months of December and January -- it's too cold for women then.
- · Women would go hunting more often but are looking after their children.
- · Women are child bearers, so they have to look after children.
- · Men and women both sew clothing out of hides. Sewing is a skill that is passed down, not learned in school.
- There are not many traditional activities that men and women don't both do.
- In recent years, more girls are graduating but the numbers are too small to draw any conclusions.
- · There need to be places for women to find shelter and for single mothers to get some support.
- · Single mothers really need respite care.
- · Women are involved with alcohol and drugs so there are some miscarriages.
- The community is safe for women. People do not lock their doors.
- Social problems are not that evident. For example, there are no runaways; physical abuse is not common. Emotional abuse between couples is more common—name calling, put downs. This is a problem particularly of young couples.
- · Women do not have a problem with rotational work. This is preferred to husbands/partners being unemployed or seasonally employed or employed only sporadically.
- Men will spend money on alcohol, however, in Chesterfield husbands also support their families and there is some expectation that their elders are supported. Adult children support other extended family, not just their immediate families.
- · Women here hunt and fish. Women consume country foods as often as possible and also prepare them in traditional ways. Sewing seal skin and caribou clothing is also practiced. Men also sew clothing.
- · Older women in this group say "the Inuit need money, not jobs".

- There is a daycare but it's difficult to get a placement and depends on the child's age and required adult –infant/child ratio. Family members look after children when parents are working. A single mother (or father), however, would find it nearly impossible to find overnight childcare if they had to work a rotation.
- · "Smart women have fewer children".
- There are no counselors in the community but these women do not trust "southern" counseling. Elders often intervene when asked. Elders are trusted, experienced and can provide advice.
- · There is not gathering place for women or for youth or elders. A community centre with services and programs would really help to bring people together.
- · Some women hunt sea mammals such as seals but it is rarer for women to go out on the water.
- Fathers will teach their daughters how to hunt if they do not have sons; however, the duty of the father is to pass down hunting skills to boys.
- Girls prefer ice fishing to hunting.
- Rankin Inlet does not like racists. They tell them to leave town.
- The women are worried about worker health and safety, and in the event of an emergency what kinds of medical facilities would be on site.
- · Half of Baker Lake is on social assistance.
- Hiring of Inuit is very important.
- · Although people at Meadowbank are generally happy with their jobs and happy to be working, they find two weeks at the mine site difficult. This is mostly because they get bored there is nowhere to go other than their own rooms.
- Drugs have been a problem at Meadowbank. It is mostly white people who are bringing them.
- · Mining companies need to take the advice of Inuit on who to hire and who not to hire. The Inuit know everybody and can advise on whether people are doing drugs, have criminal records, are able to work well.
- Because of the nickel mine in Rankin Inlet 50 years ago, and because the people who worked there are very old and sick now, there is a correspondence made between working in mines and health problems.
- Single men can easily manage rotational jobs at mine sites, but how can a woman with children manage that?

- · Mine employment is probably good even for married men, as long as the mine site is kept dry.
- · Some men are not prepared to leave their families, particularly their grandchildren, to do rotational work.
- Some women may want to work for mines, but that would be on the condition that they were assured of good medical care.
- · Women go marine mammal hunting, particularly sealing.
- · People are getting more stingy with their harvests, it is getting harder to find people to give away caribou.
- · The project would be good thing because it will create employment opportunities and allow people to get off income support and care for their families better.
- It may be that girls graduate more than boys, probably because the girls are more mature.
- The addiction project sees men, women, and couples. Because it is the court that refers people, children are not part of the clientele. Substance abuse is often a family activity.
- Suicides will continue to increase many male suicides are linked to sexual assault of female family members.
- · Women are considered as property in traditional Inuit culture. This is problematical for spousal abuse programs and prevention as many elders, including women, believe that is a woman's role to submit to the will of men.
- · Tapestries are not done often in Rankin, which is too bad because it would be good for women to do more art. But women do make clothes and dolls, and sell these by announcing items for sale on community radio.
- · With their husbands women participate in caribou hunting but few women have the skills to hunt anything other than seals on their own.
- Women fish in the winter and in the spring they hunt seals.
- The school is a great facility, with all it needs to teach well and the teachers (11 in total, 4 are Inuit) are excellent. It had 3 graduates last year (two boys and one girl) and may have two or three this year
- Many of the female students are pregnant at some point.
- There is no women's shelter in Whale Cove and women can only leave the community to go to a shelter if the police lay charges.
- Bringing an end to spousal abuse will require women to stop accepting it.

- · There is no pattern as to who gets drunk and who doesn't men and women, young and old, employed and unemployed, they all drink.
- · One of the RCMP objectives in Whale Cove is to make very clear to men that they will no longer get away with beating women, that they will get caught and they will be charged.
- Rotation may not be a problem for some women, who are related to half the people in town so their children can be cared for.
- · Relationships with men get in the way of getting training and of working.
- · With a good paying job I can secure my son's future.
- · Women did not hunt sea mammals because it was dangerous. A women might learn to hunt if she did not have any brothers so her father taught her the skills. More typically, women would go out on the land with their husbands and stay at the camp to dry meat and cook.
- · People may be contaminated, deformed children born because mothers are contaminated from water and air.

# **Attachment D**

# Thelon River's Canadian Heritage River Status in the Context of the Kiggavik Project

This attachment provides an overview of the Thelon River as a designated Canadian Heritage River within the Canadian Heritage Rivers System (CHRS) as it relates to the Kiggavik Project.

# Canadian Heritage Rivers System and Thelon River Management Plan

The Canadian Heritage Rivers System (CHRS) was established in 1984 by federal, provincial and territorial governments to conserve rivers with outstanding natural, cultural and recreational heritage, to give them national recognition, and to encourage the public to enjoy and appreciate them. As of 2014, there are 42 Canadian Heritage Rivers (38 designated, and another 4 nominated) across Canada, and more are being added to the system each year (Canadian Heritage Rivers System 2014 internet site).

The Thelon River is the largest river in Nunavut flowing into Hudson Bay. From as far apart as 200 km east of Great Slave Lake and the northern Saskatchewan border, waters of the Thelon collect to flow for 900 km across the Northwest Territories' Mackenzie district, then through Nunavut into Baker Lake and Chesterfield Inlet. This 142,400 km² watershed is the largest unaltered drainage basin emptying into Hudson Bay.

The section designated a Canadian Heritage River includes the river's entire middle and lower reaches, consisting of the 545 km from Warden's Grove, 50 km from the river's junction with the Hanbury, to Baker Lake (Canadian Heritage Rivers System 2014 internet site). The upper reaches of the Thelon River lie within the Thelon Wildlife Sanctuary which is one of the most protected and longstanding conservation areas in the north. This has significantly contributed to the pristine character of the area and the wealth of natural resource values associated with the river corridor (Department of Sustainable Parks and Tourism Division, 2000).

The Thelon River was nominated to become a river within the CHRS in 1989 and was officially designated as a Heritage River under the CHRS in 1990. The values for which the river was originally nominated were:

- natural heritage values,
- human heritage values, and
- recreational values.

The planning and management program for the Thelon River is focused on protecting these values and includes information on land use framework, heritage management and protection, and visitor services and facilities. The Thelon CHRS Management Plan was issued in 1990 (Economic Development and Tourism, GNWT 1990) and the specific objectives of the plan were to:

- 1. Manage the heritage resources within a river corridor extending 1 kilometre from each bank, in accordance with CHRS objectives.
- 2. Conserve and interpret the heritage resources identified in the nomination, through existing legislation and regulations and, where appropriate and necessary, through the future establishment of Territorial Parks; heritage resources will be interpreted through a program of printed materials and a visitor centre in Baker Lake. These will foster understanding and appreciation of the heritage values of both the Thelon River and the Kazan River, which was also nominated to the system in 1989.
- 3. Encourage and monitor recreational use of the river, and to ensure its compatibility with the conservation of heritage resources.
- 4. Give a national perspective to visitors regarding the role of the Thelon and Kazan Rivers in northern native history, and the cultural development and evolution of the Keewatin region.
- 5. Foster an appreciation of the culture of the Caribou Inuit, and to foster pride for Inuit culture.

The goal of the river management plan is to define the framework for the sustainable use of the river (GeoVector 2008). The Thelon River CHRS Ten-Year Review (1989 to 1999) document was released in 2000 (Department of Sustainable Parks and Tourism Division 2000). The intention of the review was to assess the integrity of the values for which the river was originally nominated, to ensure that the river remains a viable and meaningful component of the CHRS, and to review progress towards implementation of the management plan. Some of the main findings of the review were that tourism and local activity on the Thelon remained low. Baker Lake community members expressed some disappointment that there has been little effort on the part of the CHRS to promote the Thelon; people's expectation was that tourism would increase as a result of CHRS designation and that there would be a measure of employment and economic benefits in the community that would accompany such increases. This sentiment was also expressed in 2008 by several interviewees in Baker Lake (GeoVector 2008): there is a need for a more organized effort to publicise the Thelon Rivers as a tourist destination and develop a cohesive strategy for developing tourism opportunities.

The Thelon River CHRS second ten-year review for the period from 1999 to 2009 has not been issued. It is anticipated that this ten-year review will be made available once ongoing negotiations for an Inuit Impact and Benefit Agreement are concluded.

## Regulatory Framework

It is important to note that no new legislation is created when a river is designated to the CHRS.

All protective actions on Canadian Heritage Rivers depend on existing laws and regulations. Governments retain their jurisdictional powers and management responsibilities throughout the nomination and designation process (Canadian Heritage Rivers System 2014 internet site).

The Kiggavik Project (the Project) has numerous obligations to departments within federal and territorial governments, Inuit Organizations and Inuit Institutions of Public Government. The Project is subject to a Nunavut Land Claim Agreement Article 12 Part 5 review which is coordinated by the Nunavut Impact Review Board (NIRB).

Numerous federal and territorial departments and Inuit Organizations participate in the NIRB review providing technical expertise. Non-governmental organizations and any interested person can also participate in the NIRB review. To be able to proceed, the Project must be compliant with any applicable uranium-related policies and land use plans, successfully obtain a NIRB project certificate through the environmental assessment process and finally obtain required permits and licences. Refer to Tier 2, Volume 2 Project Description, Section 2.3 Policy and Regulatory Framework for a description of the federal and territorial legislation and federal, territorial and Inuit guidelines applicable to the proposed Kiggavik Project. Examples of acts, associated regulations, and permits which may be applicable to or required for the Project include: Transport Canada's navigable water permit, transportation of dangerous goods regulations; Fisheries and Oceans Canada's Fisheries Act, fisheries authorization; Canadian Nuclear Safety Commission license to operate, general nuclear safety and control regulations; Nunavut Water Board Type A water license; Environment Canada Species at Risk Act, migratory birds regulations; Nunavut Wildlife Act; and Nunavut Act's Archaeological and Paleontological sites and regulations. AREVA acknowledges the public easement along the 1980-1990 winter road alignments between Baker Lake and Kiggavik, as described in Schedule 19-11 of the Nunavut Land Claims Agreement.

AREVA believes the objectives of the Thelon River Management Plan (Economic Development and Tourism, GNWT 1990) are met for the Kiggavik Project through the environmental assessment process, which includes commitments to comply with various legislation and guidelines (Tier 2, Volume 2, Project Description, Section 2.3 Policy and

Regulatory Framework), and an assessment of potential Project effects on the ecosystemic and socio-economic environments.

# Kiggavik Project and the Thelon River

One of the Baker Lake to Kiggavik access road options being assessed is the all-season road from the north shore of Baker Lake. This road will only be constructed if the winter road is deemed insufficient to meet the needs of the Project (Tier 2, Volume 2 Project Description, Section 10.4). If the all-season road is approved, deemed necessary, and constructed, the Thelon River will be crossed in the summer with a cable ferry and an ice bridge in winter. The natural shoreline on each river bank will be smoothed to create ferry landing sites or aprons for safe loading and offloading trucks and other vehicles. As noted in the Road Management Plan (Tier 3, Appendix 2M), a cable ferry is a simple flat bottom shallow draft barge type vessel with the bottom sloping upward at each end. The cable which would operate the ferry lies on the river bottom after the ferry passes. A hydraulic operated hinged ramp is fitted at each end to facilitate loading and unloading of wheeled vehicles. The maximum load and speed of the cable ferry will be 105 tonnes and 8-10 km/h, respectively. On each trip, the ferry will be capable of transporting two trucks.

In regard to the cumulative effects assessment, the Thelon River is included as a designated area in the Cumulative Effects Project Inclusion List in Tier 3 Technical Appendix 1E. Activities such as canoeing and nature tours are also included in project inclusion list for cumulative effects assessment (i.e. Canoe Arctic Inc. – offers outdoor tourism and adventure packages, including Thelon River system).

The Thelon's Heritage River values are *natural heritage*, *human heritage*, and *recreational values*. These are addressed in various sections of the Kiggavik Project EIS, as outlined in Table 1 below.

Table 1: Thelon River heritage values addressed in Kiggavik Project Environmental Impact Statement (EIS) through compliance with Acts and regulations

Thelon River heritage value	Kiggavik EIS section	EIS Tier 2 document and associated appendices	Example of an existing Act or regulation that may be applied to meet Thelon Heritage River management objectives
Natural heritage	Aquatic Environment	Volume 5	Fisheries Act

	Terrestrial Environment	Volume 6	Nunavut Wildlife Act
Human heritage	Heritage Resources	Volume 9, Part 2	Nunavut Archaeological and Paleontological sites regulations
Recreational value	Socio-economic environment	Volume 9, Part 1	Navigable Waters Act

# 1. Natural heritage

For context, it is important to note that the Kiggavik and Sissons deposits are located within the Anigaq River watershed. The Anigaq River watershed is adjacent to the Thelon River, e.g. the Anigaq River does not flow into the Thelon River.

The only potential interaction of the Project with the Aquatic Environment would occur at the location where the all-season road crosses the Thelon River. Potential impacts to fish and fish habitat from the winter road and all-season road are presented in Tier 2, Volume 5, Aquatic Environment, Sections 10.1.1 and 10.2.2. The optional cable ferry crossing is not expected to interfere with fish passage. The all-season road Thelon River crossing is also considered within the Conceptual Fisheries Offsetting Plan (Tier 3, Technical Appendix 5L). All projects, activities, and undertakings near water would likely be subject to Fisheries and Oceans Canada and Transport Canada regulations. Mitigation plans will be applied to the all-season road construction, including the section of road occurring within the Thelon River management corridor (1 km on either side of the river). Please refer to Tier 3, Technical Appendix 5O Sediment and Erosion Control Plan for an overview of best management practices which will be applied when working in and around the Thelon River.

Interaction of the Project with terrain, soil, vegetation, wildlife such as caribou and muskox, raptors, migratory birds, and species at risk are addressed in the terrestrial assessment (Tier 2, Volume 6). For example, changes in mortality, habitat, movement, and health were considered for caribou and muskox. Various mitigation measures are proposed to minimize Project effects on the terrestrial environment throughout the EIS including the Wildlife Mitigation and Monitoring Plan (Tier 3, Technical Appendix 6D) and the Road Management Plan (Tier 3, Technical Appendix 2M). Examples of mitigation measures include: giving caribou the right-of-way where possible and safe, and restricting land-based activities near active raptor nesting sites. The proposed Thelon River ferry crossing is not located near protected caribou crossings or known, unprotected crossings (Tier 2, Volume 6, Section 13).

## 2. Human heritage

An objective of the management plan relating to human heritage values is "to conserve and interpret heritage resources identified in the nomination document through existing legislation and regulations and, where appropriate and necessary, through the future establishment of Territorial Parks" (Economic Development and Tourism, GNWT 1990). The management plan identified the following existing archaeological sites:

- Pegetuag, located on the east end of Aberdeen Lake;
- the Isarurjuag Peninsula located near the entrance to Beverly Lake;
- Hornby's Cabin and grave located in the Thelon Wildlife Sanctuary; and
- Akilinig Hills located on the northwest side of Beverly Lake.

The plan also acknowledged the presence of archaeological sites along the length of the Thelon corridor representing Inuit activity, especially at Schultz and Aberdeen Lake (Economic Development and Tourism, GNWT 1990; Department of Sustainable Parks and Tourism Division, 2000).

With the exception of the ferry crossing, the proposed Kiggavik Project is located outside the Thelon Heritage River corridor. None of the archaeological sites identified in the management documents (described in above paragraph) are found at this location. The nearest site is over 130 km from the ferry crossing.

The plan encourages further archaeological research on the Thelon River so that data can be incorporated in the management of the Thelon River corridor. Important archaeological sites may, if their condition and significance warrant, be developed as a park or historic site (Economic Development and Tourism, GNWT 1990). This would include unique or rare historical or archaeological structures, or important archaeological sites representative of major themes and various periods of Inuit culture.

Archaeological reconnaissance of the proposed crossing carried out as part of baseline studies did identify two sites within the Project LAA at this location (Golder 2009, 2014). LcLb-11 is a single cache feature containing caribou bone located on the side of a bedrock outcrop. LcLb-12 consists of two stone tent outlines near the shore of the river. One outline consists of a circular configuration of rocks that are not well-sodded and associated with modern refuse, and the second outline consists of a square outline suggestive of a canvas tent. Both sites appear to be relatively recent and do not appear to fit the criteria for further interpretive or park development under the Thelon River Management plan.

Potential effects of the Project, including components of the site access road, on archaeological resources were considered in the assessment (Tier 2, Volume 9, Part 2). There are no expected Project effects on significant archaeological resources. With careful planning and implementation of mitigations plans such as the Archaeological Mitigation plan (Tier 3, Technical Appendix 9D) and the Road Management Plan (Tier 3, Technical Appendix 2M), it is expected that future effects to archaeological sites will be minimized, recorded and reported according to requirements.

#### 3. Recreational values

To date, the focus of AREVA's navigable water engagement activities has been the all-season road crossing at the Thelon River. This has been the topic of discussion at 18 Community Liaison Committee meetings from 2007 to 2011; at public meeting Kivalliq community tours by AREVA in 2009 and 2010, by the Kivalliq Inuit Association in 2010 and Scoping Sessions by the Nunavut Impact Review board in 2010; as well as at meetings with the Baker Lake Elders Committee and the Baker Lake Hunters' and Trappers' Organization. For more information, refer to Tier 2, Volume 3, Part 1 Public Engagement.

The majority of comments have been made in regard to a potential bridge. The Thelon River bridge option was eliminated prior to the DEIS submission. For the all-season road to cross the Thelon River, the assessed option was the use of a cable ferry in the summer and an ice bridge in the winter.

Interaction of the Project with the socio-economic environment is detailed in the Volume 9, Part 1; refer to Sections 9.1.6 and 12.1.3 for discussion of heritage resources and tourism, as they relate to the Thelon River. Navigation of the Thelon River would not be affected with the proposed ferry cable design: Transport Canada Navigable Waters will be consulted in regards to any potential concerns to Thelon River navigability should the all-season road be constructed. Application will be required for construction of cable ferry under the Navigation Protection Act at the time of licensing

It is acknowledged in Tier 2, Volume 9, Part 1 Socio-Economic Environment, Section 12 that any of the road options, including the use of a cable ferry, could provide some support to ongoing exploration and eventual mine development in the western Kivalliq; however, it is further noted that any residual or cumulative effects will depend on what are currently unknown decisions Nunavut will make with regard to land use planning. This is the critical factor in coming to conclusions on the cable ferry's potential for effects – the availability of a cable ferry is not a sufficient condition for effects on the Thelon. Thus cumulative effects cannot be determined.

The non-traditional land use of tourism is presented in Tier 2, Volume 9, Part 1 Socio-Economic Environment, Section 12 in which some potential disincentive to develop future tourism is acknowledged. From a tourism perspective, the ability of small craft to pass the crossing without interference and the possible facilitation of recreational activities along the Thelon River due to the improved access are considered.

With the single exception of the of the cable ferry for users of the all-season access road to cross the Thelon River, neither the Project nor any environmental effects will be observable to users of this river. The cable ferry, if constructed and operated, would have no residual effect on the non-traditional land use of commercial harvest (Tier 2, Volume 9, Socio-Economics and Community, Part 1 Socio-Economic Environment, Section 12). Similarly, effects of the Project on tourism are considered to be low. Aspirations of Baker Lake residents to develop the local tourism sector (Department of Sustainable Parks and Tourism Division 2000, GeoVector 2008) will not be impeded by the Kiggavik Project: it is not considered likely that a cable ferry across the Thelon would discourage tourist use of the river.

## Summary

The primary intent of the Thelon CHRS management plan is to maintain the natural, cultural, and recreational values for which the river was included in the system.

AREVA suggests that the potential impact of the Project on the Thelon River's natural, cultural and recreational value is considered throughout the Kiggavik Project EIS. Overall, the Kiggavik Project Environmental Impact Statement concludes that the Project will have no significant adverse Project, cumulative or transboundary effects on the biophysical and socio-economic environment. By conducting the environmental assessment and adhering to monitoring, mitigation and management plans, the Project complies with the requirements of the Thelon River management plan and ensures protection of the natural environment, heritage features, and recreational activities on the Thelon River and within the 1 km management corridor (Economic Development & Tourism, GNWT 1990).

All protective actions on Canadian Heritage Rivers depend on existing laws and regulations (Canadian Heritage Rivers System 2014 internet site). Existing laws and regulations can be used to help protect these values consistent with the Thelon River Heritage River Management Plan (Economic Development & Tourism, GNWT 1990). As described throughout the assessment, AREVA is committed to compliance with federal and territorial legislation and federal, territorial and Inuit guidelines applicable to the Kiggavik Project.

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