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RESOURCE-BASED ECONOMIES
STUDY

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Executive Summary

Introduction

The federal government's Aboriginal Action Plan, *Gathering Strength*, identifies the importance of innovation in natural resources including the traditional economies of country food harvesting and fur trapping to create jobs and generate wealth for Aboriginal communities.¹

This study, prepared by the Conference Board of Canada and funded by Indian and Northern Affairs Canada, examines the state of Aboriginal food production and fur trapping in Canada. In particular, it examines whether there are any innovative practices in country food harvesting and trapping by Aboriginal peoples that can fulfil either of two principal goals: (1) ensure there is an adequate supply of country food to meet existing and future demands in Aboriginal communities (food autonomy); and (2) be a source for community economic development consistent with sustainable development practices.²

Innovation is "a process through which economic value is extracted from knowledge through the generation, development and implementation of ideas to produce new or improved products, processes and services."³ Innovation has the potential to contribute to Aboriginal food production in several ways:

- increase economic and value-added activities at the community level;
- increase capacity building and the development of economic/physical infrastructure;
- increase autonomy in food production and use by remote communities;
- increase economic diversification;
- establish a base from which to attract investment and new economic activities;
- develop innovative workforce skills (e.g., food preparation, environmental knowledge);
- expand business opportunities at the regional, national and international levels; and
- facilitate information and technology transfers between Aboriginal communities.

Innovation in harvesting has always occurred in Aboriginal societies. It has led to the adoption of highly sophisticated hunting and distribution techniques consistent with sustainable development. Innovation, however, must continue, particularly in the face of rapidly changing socio-economic conditions in most Aboriginal communities, not to mention changes in the climate and environment.

This study identifies areas for innovation to further support country food production and the Aboriginal agri-food and trapping industries. The study ends with the identification of

¹ In this report, the term "country food" refers to marine and land wildlife, fish, fruit and legumes that is locally or regionally harvested. The term is used interchangeably with "wild food" and "traditional food". The term "harvesting" in this report refers to the collection of country food whether it be hunting, fishing, trapping, farming or picking.

² Sustainable development in this report refers to development that meets the needs of the present without compromising the ability of future generations to meet their own needs.

³ The Conference Board of Canada, *Investing in Innovation. 3rd Annual Innovation Report* (Ottawa: The Conference Board of Canada, 2001).

broader strategies (e.g., communities have stewardship over natural resources, building the capacity for community planning) that we believe are necessary to ensure successful implementation of our calls to action.

This study was not confined to a single region or activity, but rather considered activities throughout the country. This enabled our research to consider a multitude of innovative practices, and gain greater understanding of the many challenges and opportunities facing Aboriginal groups all across the country.

Four Forms of Capital for Creating Wealth

More and more economists, developers, and community leaders are recognising that achieving sustainable or balanced growth is a complex matter. Creating wealth has become a broad notion that embraces four forms of capital:

Human capital: Encompasses human labour, but extends beyond this to include a society's level of literacy, education and skills status, and knowledge, as well as health status.

Natural capital: Includes the *raw materials* required for economic activity, such as land, wildlife, fibre, minerals, energy and the knowledge derived from this capital.

Economic/Physical capital: Refers to the infrastructure and finances needed to support economic production—transportation infrastructure, structures and equipment required for business and industrial purposes, communications systems and so on.

Social and organisational capital: Encompasses the environment in which natural, human and physical capital interacts to create wealth. This form of capital includes the major players or sectors involved with wealth creation (e.g., government, private sector, non-governmental organisations), policy environments, levels of trust between players, and public security.

Having the necessary skills, wildlife, equipment and organisation are essential ingredients for harvesting and to ensure a community can fulfil its socio-economic goals.

A broad assessment of these four forms of capital in Aboriginal communities highlights a number of issues affecting the production and consumption of country food and fur trapping:

- There continues to be significant population growth among Aboriginal people including on-reserve populations. This will place additional demand on the food requirements and natural capital of communities (e.g., wildlife numbers) and communities' physical infrastructure, particularly if fewer people are involved in harvesting.
- Aboriginal populations have a high proportion of young people. There is concern that as more and more young people enter the wage economy they are not acquiring valuable land-based skills and traditional knowledge.
- Environmental contamination and its impact on natural capital is a source of major concern for Aboriginal communities.
- Many Aboriginal communities are small in size and are found in remote locations.

They suffer from poor levels of physical and business infrastructure and small economies of scale that do not allow them to compete with products and services in the south.

- Social structures in Aboriginal communities will have to adapt to new forms of economic production. Aboriginal communities have traditionally been organised around hunting and gathering activities and the sharing of food. These structures are coming under pressure as communities change due to higher levels of participation in the wage economy, income transfers, a lack of fit between the two modes of production, and as they take on commercial pursuits.

Harvesting and Its Supporting Values

Wildlife harvesting has represented a large portion of economic activity for many Aboriginal communities, particularly those in rural and remote locations. The regulation and management of harvesting can vary depending on the jurisdiction. In areas under a land claims settlement, the agreement usually specifies the rights of the beneficiaries to harvest and their involvement in both regulating and managing or co-managing natural resources with government through hunters and trappers organisations and through a wildlife management council.

Wage employment has greatly affected harvesting activities. On the one hand, it can constrain the time required to hunt, particularly those requiring several days. On the other hand, wage employment brings in cash required to pay for the supplies that are now required to be an effective harvester (e.g., snowmobile and gas). Some have suggested that the net result has been that harvesting has suffered in some communities since people with jobs are the ones with the supplies to hunt but not the time, while those who have the time to hunt do not have the necessary cash to purchase supplies. Others suggest wage employment has not had a major affect on one's interest to harvest—rather wage earners are increasingly viewing harvesting as a form of leisure or a lifestyle choice as opposed to a form of livelihood.⁴ The impact could be a reduced ability to undertake lengthy harvesting trips and a change in the food sources harvested.

At the heart of this examination of traditional economies are values. Values are strong beliefs that reflect our expectations about how people in a system should behave. They play an important role in influencing choices related to economic affairs in communities. There are several values related to harvesting and traditional economic activities that appear to be strong in most Aboriginal communities:

- A strong commitment by Aboriginal communities to the notion of sustainable development.
- A collective approach in the sharing of economic wealth. In the case of harvesting, this means that it is expected that harvested food will be shared within the family and community according to an established distribution network.
- A collective approach to socio-economic development. Economic development

⁴ Pamela Stern, "Subsistence: Work and Leisure", *Inuit Studies*, Vol. 24(1), 2000, pp. 9-24.

projects that are seen as “community-owned” tend to be preferred over those that are individually owned.

- Respect for traditional knowledge. A considerable amount of knowledge has been handed down from generation to generation. Maintaining elders' knowledge is an important ingredient in the preservation of Aboriginal land-based activities.
- Harvesting and a connection to the land as a form of leisure or livelihood are strongly associated with a high quality of life.
- Harvesting is to be foremost for subsistence purposes not for commercial purposes. Any commercial wild food activity can be pursued upon reassurance that the supply for subsistence purposes is not threatened.
- The production of furs should take place in the animals' natural environment. Ranching is not an acceptable alternative to trapping.

These values have been and will continue to face tension as socio-economic and environmental changes occur. For example, what level of harvesting for commercial purposes is acceptable for the community? Should individual entrepreneurs be encouraged or supported in the community?

Country Food Production

There is a wide variety of country foods consumed in Aboriginal communities including fish, wild meat, fowl and eggs, fruits (e.g., wild berries), rice and other flora (e.g., seaweed). The specific range of country foods produced obviously differs depending upon the flora and fauna available in the region.

Aboriginal country food production or harvesting serves several important purposes. In economic terms, country food can reduce the need to purchase expensive foods imported into isolated and northern communities. Second, country food can contribute positively to health status. Country food is highly nutritious and safe to eat. A diet involving country food has been associated with lower levels of heart disease and diabetes while the act of harvesting promotes physical activity. Third, wildlife and the production of country food can provide economic development opportunities for Aboriginal communities by producing food products for export or by supporting local sport hunting and fishing, as well as tourism. Finally, the production and consumption of country food fulfils spiritual, cultural and social purposes as well. It provides a connection to the land and sea and the teaching of valuable knowledge and skills required for human development.

A review of the research and discussions with officials in several Aboriginal communities indicates that a high proportion of Aboriginal people, particularly in northern communities, continue to rely significantly on country food and to participate heavily in harvesting activities. Most officials we interviewed indicated that country food contributed as much as 60 to 80 per cent of the total diet for many communities. And the Government of Nunavut, for instance, has estimated that between 54 and 60 per cent of its population aged 15 years and older are harvesters. This study reviewed previous attempts to quantify in monetary terms the amount of country food consumed. This is a difficult task due to methodology issues but it is perhaps necessary to assist

policy makers to formulate sound arguments and promote greater understanding of the importance of Aboriginal harvesting.

There are a number of programs and strategies in place to support country food harvesting for personal or community use. In previous years, country food production was often supported by income through trapping and sealing. The drop in prices for fur and skins since the early 1980s eliminated this source of income for most harvesters. Consequently, most support programs are directed at alleviating the high costs for those who actively harvest. But it can be very difficult in designing programs that reach those most in need of support. Some of the programs and strategies currently in place include:

- Country food stores employing harvesters to obtain country food which is then sold in the store;
- Providing support to harvesters (who are not actively participating in the wage economy) in the form of income support payments based on the amount of time spent harvesting (e.g., James Bay Cree Hunters and Trappers Income Security Program);
- Local governments paying harvesters to supply country food for the benefit of community members (e.g., Nunavik). The food is placed in community freezers accessible to all;
- Government or Aboriginal programs funding a portion of the harvesting costs incurred by harvesters or for community hunts; and
- Economic development agreements between different levels of government and/or Aboriginal organisations that fund a range of community harvesting activities.

There are several threats to harvesting and to the demand for country food in Aboriginal communities. First, demand for country food has been decreasing among young people and those with higher levels of education or income. Given that Aboriginal communities are facing large young populations and increasing levels of formal education, this trend must be closely followed. Second, the loss of harvesting skills is seen as another barrier to local production of food. Harvesting skills and knowledge are not being adequately transferred down to the next generation and there is a need to train young harvesters. Third, harvesting (using modern methods) is an expensive activity. Capital start up costs for hunters in Nunavut have been estimated to be between \$20,000-\$30,000. A fourth obstacle is the reduced availability to harvest due to such factors as reduced time for harvesting by wage employees and the need for families to remain in the community so children can attend school. Environmental changes, such as global warming, can also negatively affect the supply of wildlife or a move in migration patterns away from communities.

Despite the potential barriers, there are still many opportunities for innovation in the local production of country food. Some of the opportunities outlined in the report include:

- Promoting greater awareness of the nutritional value of country food;
- Promoting innovative working arrangements in the wage sector that support

harvesting;

- Considering strategies to support the professionalisation of harvesters based on the assumption that the supply of country food is not meeting local demand. One approach is to involve arrangements for communities, co-ops or local food stores to employ or hire professional hunters on a full-time or part-time basis. Another approach is to allow harvesters to act as small businesses that could be certified to hunt and sell country food to the community or for export.
- Implementing new governance opportunities that put more control over how land and resources are locally managed including the production of food. For many Aboriginal communities, the first step in promoting harvesting is greater control of their natural resources and having the capacity to develop a plan for their management.

The Aboriginal Agri-Food Industry

The “agri-food industry” for the purposes of this study includes country food (i.e., wild game, fowl and fish) and processed food products that are primarily connected to Aboriginal history and culture (e.g., wild rice, tea, corn) and which are intended for commercial use including sport hunting and fishing. However, it must be stated that it can be difficult to distinguish between traditional and non-traditional Aboriginal food products.

According to the 1996 Census, 13 per cent of the Aboriginal labour force was employed in the agriculture and agri-foods sector. A wide variety of traditional Aboriginal food products are being harvested for commercial purposes. In fact, there is a multitude of successful Aboriginal enterprises processing and selling country food products. Many of the operations are community run and intended to provide a source of economic development for their communities.

Commercial hunting has been seen as a source of economic development that allows Aboriginal people an opportunity to apply their traditional skills and knowledge while participating in the wage economy. However, some Aboriginal people feel that commercial hunting runs contrary to traditional harvesting values (e.g., harvesting only what you need). Others are opposed to commercial harvesting because they believe it provides only minimal economic value with a potential of harming wildlife numbers for subsistence purposes.

Generally, commercial enterprises in Aboriginal communities are a collective effort stemming from a community decision rather than a private pursuit. A broad review of Aboriginal commercial food enterprises found activities in a wide range of food products.

Fish products: Several Aboriginal communities are involved in the offshore, freshwater, and aquaculture fish industries. Many communities have been affected by the results of the 1999 *Marshall* Supreme Court decision which ruled that local Treaties signed in 1760 and 1761 by Mi'kmaq and Maliseet communities include a communal right to hunt, fish and gather in pursuit of a "moderate livelihood." As a result, the Department of Fisheries and Oceans has been entering into agreements with bands to build their capacity in the fishing industry. The pursuit of both salt and freshwater fish has been

hindered by threats to the fish supply (e.g., salmon on the Pacific coast and arctic char in northern regions).

Large game: Commercial hunts of large game meats have been occurring over the past several years in areas across northern Canada. Caribou and muskox currently exist in sufficient numbers to support commercialised hunts. The hunts provide a source of temporary employment for approximately 10 to 30 local hunters at a time. The number of animals hunted depends on the allowable quota (ranging from less than a hundred into the thousands). Chief markets are United States, Europe and Asia. Increasing desire for “natural” products including products derived from free-range animals, organically grown products, and less fat meats (as found with caribou and muskox) may lead to market growth beyond the niche market of exotic meats. A great deal of experimentation has taken place in trying to develop a viable commercial hunt. Most attempts have encountered the same obstacles beginning with a lack of control over the natural elements complicated with a lack of infrastructure and high costs to properly manage the hunts in meeting food safety standards, particularly with respect to the processing of the meat. Food safety will continue to be a major issue with respect to the production of meat products, particularly if export markets are pursued.

Flora and Agricultural Products: Aboriginal communities and enterprises have been involved with the complete gamut of flora and agricultural products for many years. Aboriginal communities have been exploring ways in which their traditional produce can exploit food trends such as the desire for organic foods and specialty foods. Wild rice, specialty products such as cranberries and herbal teas, and non-timber products (e.g., wild mushrooms) are just some of the types of traditional agricultural products being produced by Aboriginal communities.

Commercial Sport Hunting and Fishing: Commercial sport hunting and fishing in most cases is a larger economic undertaking than the export of commercial food products discussed above. Sport hunting and fishing provides economic benefits through the consumption of a variety of tourism-related services rather than just the food. Not surprisingly, sport hunting/fishing often takes precedence in terms of wildlife quotas over commercial food products for export.

Government programs, agreements and subsidies aimed at supporting commercial food enterprises have been in existence for some time. Some of these programs were initially aimed at supporting individual harvesters but eventually were directed to developing the renewable resource sector as a whole. Both the NWT Development Corporation and the Nunavut Business Development Corporation, funded by their respective territorial governments, provide support to community-based businesses with a commitment to employment creation and economic diversification. However, many government programs are not aimed specifically at the development of commercial food operations but the broad Aboriginal small business sector.

There is limited demand for commercial country food products within local communities, particularly in the north, as most people rely on family and social networks for their supply of country food. However, growing populations in many Aboriginal communities will likely increase demand for these products. Demand for country food products has been increasing at both the domestic level (Canada) and at the international level. The

United States, Europe, and Asia are the key markets of interest.

There are some international barriers to country food trade such as the European Union's 15 per cent tariff on imported caribou meat and fish products and the American ban on marine animal products. Yet, it would be unwise to focus attention exclusively on these issues to promote growth in the export sector. Attempts to increase Aboriginal food exports are generally not hindered by these barriers nor by a lack of demand in these markets, but rather by issues associated with the supply side here at home.

There has been a small core of people who have spent many years examining how to maximise commercial country food production for economic development purposes in northern and Aboriginal communities. There is now a prevailing attitude of "been there, done that" toward different possibilities for commercial enterprises. The obstacles to further developing the Aboriginal agri-food sector remain the lack of a solid supply for export, the high production costs due to a lack of infrastructure and small economies of scale, difficulties in accessing start-up capital, and the need to ensure a safe product.

However, we believe there are opportunities for commercial food production stemming from several domestic and international food trends such as increased demand for naturally grown or raised food sources and organic products. Innovative products that make the best use of Aboriginal communities' four forms of capital need to be considered. This can be done through the creation of a natural resources plan that considers the most appropriate use of available resources and the tradeoffs associated with each option.

The Aboriginal Fur Industry

This report focussed primarily on the trapping component of the fur industry—the sector most actively involving Aboriginal people. A review of the statistics reveals that Aboriginal and northern communities play a small role in Canada's overall production of raw furs—half of all furs are produced on ranches usually operated by non-Aboriginals while the majority of wild furs are trapped in southern Canada. Nevertheless, trapping remains very important to northern residents and wild fur production caters to a niche market of people who appreciate the look of wild fur or who support the natural approach used in wild fur trapping.

Inuit in Canada are also actively involved in the harvesting of seals and sealskins. Estimates in Nunavut suggest 500 hunters harvest approximately 20,000 seals each year. Like the fur industry, demand for sealskins dropped dramatically during the 1980s but has started to pick up again over the past two years. The Government of Nunavut launched an aggressive program in 2000 to promote the wearing and use of sealskins as part of its Nunavut Sealskin Strategy. The strategy is based on the sustainable use of sealing predicated on using the whole animal and humane harvesting.

Government programs do exist to specifically support trappers. Most are aimed at providing trappers/hunters with a guaranteed price for their fur or skin, or to assist trappers in adopting more humane traps that comply with internationally accepted standards.

Growth in Aboriginal fur production will be hindered by the continued controversy

surrounding the trapping of animals for fur, growing competition from fur ranches in Canada, and the fact that fewer Aboriginal young people are entering into trapping as a principal source of livelihood.

Opportunities for innovation discussed in the report include:

- improving the preparation of fur pelts before auction to improve quality and obtain a better price;
- greater marketing of the natural approach taken by Aboriginal people in trapping animals; and
- the development of new fur products that can be manufactured by Aboriginal people.

Priorities for Action

This report concludes with some calls to action specifically targeted to the production of country food, the Aboriginal agri-food industry and the Aboriginal trapping industry. The calls to action are as follows:

Call To Action

- Governments and other stakeholders recognise the value of food autonomy and food safety for rural, isolated and northern communities as a legitimate public policy priority and economic issue.
- Governments and other stakeholders recognise the health benefits of country food and support efforts to promote its consumption.
- Innovative arrangements be considered to support changes in harvesting approaches. These arrangements may be quite different than previous approaches to address the trends taking place within harvesting (i.e., reduction in harvesting intensity by people below the age of 45 years and the shift to harvesting as a leisure activity).
- Attention be given to product development for a range of cost-effective commercial products for different kinds of markets (e.g., Aboriginal people living in urban centres).
- Attention be given to certifying products as "natural" or "organic" where possible and that the cultural and traditional knowledge be incorporated as much as possible to the product for other markets.
- Country food harvesting and other traditional economic activities be considered an integral part of a tourism strategy for Aboriginal communities.
- Attention be placed on marketing the sustainable and cultural approach taken by Aboriginal fur and sealskin harvesters, on improving the quality of wild pelts produced, and in the design of Aboriginal clothing styles.
- Efforts be directed towards providing young people with basic harvesting skills either through community organisations or through the school system.

In addition, the report identifies some broader strategies that need to be addressed to ensure the successful implementation of the calls to action. These broad strategies include continuous assessment of communities' assets and further development of the necessary business and land-based skills to support country food production. We

believe it also requires attention to social and organisational capital in the following areas:

- stewardship over natural resources;
- having strong community leadership and governance;
- having the capacity for sound community planning; and
- encouraging economic development at the community level.

We believe that by addressing the above issues, the calls to action have an opportunity to be successfully implemented. Governments are not solely responsible for taking action on this issue. Aboriginal people themselves must choose how important country food will be to them in the years ahead and what action, if any, they are willing to take to support its production and consumption.

1 Introduction

The federal government's Aboriginal Action Plan, *Gathering Strength*, identifies the importance of innovation in natural resources including the traditional economies of country food harvesting and fur trapping to create jobs and generate wealth for Aboriginal communities.¹ While largely unrecorded using standard economic measurements, traditional economies are nevertheless important sources of economic activity for many Aboriginal communities. They also achieve social and cultural goals that are equally important. This report examines the current state of country food harvesting and fur trapping in Aboriginal communities, as well as potential areas for innovation in both of these traditional economic activities.

1.1 Country Food Harvesting

Food is obviously essential to human existence and has also served as the basis for trade and economic production world-wide. Canada's Aboriginal peoples have historically been very self-reliant in producing a wide array of their own nutritious food for their communities and increasingly for export. They do so by drawing on four necessary forms of capital: human (skills), natural (wildlife), economic/physical (tools and weapons), and social/organisational (networks for producing and sharing the food).

Promoting country food production and consumption is seen as a necessary step for communities to achieve a measure of food autonomy and food security—that is, ensuring members of the community have access to safe, healthy and affordable food (See Box A). There are several socio-economic benefits in doing so. First, notwithstanding programs to offset shipping costs (see Box B), reliance on country food can help reduce the need to purchase costly imported foods flown in from the south. While a family of four in southern Canada will need to spend between \$135-\$155 a week to buy a basic nutritious basket of food, the same basket is likely to cost as much as \$300 a week or more in most isolated communities in the Northwest Territories or Nunavut. Although food costs in Yellowknife can be 20 per cent higher than Edmonton, a smaller community in the Northwest Territories may experience food prices that are 25 to 50 per cent higher than in Yellowknife! And food prices in small communities in Nunavut can be as high as 2.5 times the prices found in southern centres. Furthermore, despite efforts to transport food as effectively as possible, the food that is imported is often in poorer condition than found in southern centres (i.e., less fresh or reduced shelf life).

¹ In this report, the term “country food” refers to marine and land wildlife, fish, fruit and legumes that are locally or regionally harvested. The term is used interchangeably with “wild food” and “traditional food”. The term “harvesting” in this report refers to the collection of country food whether it be hunting, fishing, trapping, farming or gathering.

Box A

Food Autonomy versus Food Security

“Food autonomy” and “food security” are sometimes seen as being synonymous. However, for the purposes of this report, we have separated the two. “Food autonomy” refers to the members of a community having access to enough food for an active, healthy life. This involves the following requirements:

- All people in the community have access to healthy food.
- Essential food items are affordable for residents.
- The community is able to produce, store and import sufficient food to meet current and expanding food needs.
- There is a degree of self-reliance by communities in providing for their own food needs.

“Food security” refers to having access to safe food that is:

- Made from low-risk compounds and ingredients;
- Free of contaminants and pollutants; and
- Produced in a clean, environmentally-sound and sustainable way.

Both concepts have been receiving increasing attention. Concerns over the lack of “food autonomy” have been most pronounced in the context of the new economy and the possibility of certain nations or segments of society within nations not having access to basic, healthy foods thereby contributing to health problems. Food autonomy has been an issue in Canada before—some Aboriginal families, notably Inuit people, experienced starvation up into the 1960s. “Food security” has been receiving increasing attention due to concerns over the impact of global warming and pollutants on the food supply, the safety of genetically modified foods, and threats of eco-terrorism on food supplies.

Reduced reliance on country foods can therefore lead to higher food costs for many Aboriginal people and greater economic hardship. A survey of two Arctic communities found that approximately 40 per cent of women were “extremely concerned” over not having enough money for food and over 50 per cent believed most people could not afford to buy enough food for their families.² In another study, 39 per cent of respondents among Yukon First Nations reported having insufficient resources to purchase the necessary store-food if traditional food was not available.³ The high cost of store bought food can be particularly hard on low-income families in the north who rely on social assistance or seasonal employment.

² Judith Lawn and Dan Harvey, *Change in Nutrition and Food Security in Two Inuit Communities, 1992 to 1997*. (Ottawa: Indian and Northern Affairs Canada, 2001). www.ainc-inac.gc.ca

³ O. Receveur et al., *Yukon First Nations Assessment of Dietary Benefit/Risk*. (Montreal: Centre for Indigenous Peoples’ Nutrition and Environment, May 1998).

Box B

Subsidising the Cost of Importing Southern Foods

Programs are in place to deal with the high cost of importing foods to northern and isolated communities. Indian and Northern Affairs Canada (INAC or DIAND) provides a Food Mail Program (Northern Air Stage Program) that subsidizes the air transportation of nutritious, perishable foods to isolated communities. The program provides the lowest postage rate for nutritious perishable foods such as vegetables, fruit, bread, meat and milk (\$0.80 per kilogram). Foods of little nutritional value, such as pop and chips, are not eligible. In 2000-2001, approximately 10.4 million kilograms of food and other goods were shipped under this program reaching approximately 90,000 people in 145 northern communities. The total cost of the program in 2000-2001 was \$22.5 million with Nunavut and northern Quebec qualifying for over 90 per cent of the subsidies.⁴ It would be interesting to know how this program is being used. For example, are Aboriginal people making full use of this program?

Air carriers providing air service to the north, also offer special rates for shipping goods that are of special importance to northerners including food shipments from southern centres and inter-community and southbound shipments of country food (60 per cent discount off of general cargo rate for country food).

Shipping by sealift is much cheaper than air but it is only feasible for dry and canned food goods, and the shipping season is very short. Ice roads can serve as a trucking route to remote communities but they are usually open for only 4-8 weeks per year subject to weather conditions.

Country food is also an important contributor to a healthy diet for many Aboriginal people. In addition, some country foods are used for medicinal purposes to improve health. As will be shown later in the report, country food is very nutritious with wild meat such as caribou being leaner than beef or pork. A wide range of vitamins and nutrients are found in traditional food. The substitution of country food with imported foods of lesser nutritional value is contributing to an increase in health problems, such as obesity and diabetes.

Country food production is also viewed as an opportunity for economic development through its commercialisation. There is a growing demand for country food products in Canadian and international markets. Where there is an abundance of wildlife, many Aboriginal communities are involved in harvesting and processing country food for export to these markets.

Finally, the production and consumption of country food also serves spiritual, cultural and social purposes. It provides a connection to the land and sea and the sharing of social norms and cultural beliefs. Therefore, a reduction in harvesting would mean a loss of connection to the land, and a substantial breakdown in the social and cultural order of communities that are organised in large part around the harvesting, sharing and distribution of traditional foods.

The key issue is how to produce and manage the food supply in a sustainable manner in light of several threatening factors such as:

- A growing Aboriginal population, particularly in northern communities and on-

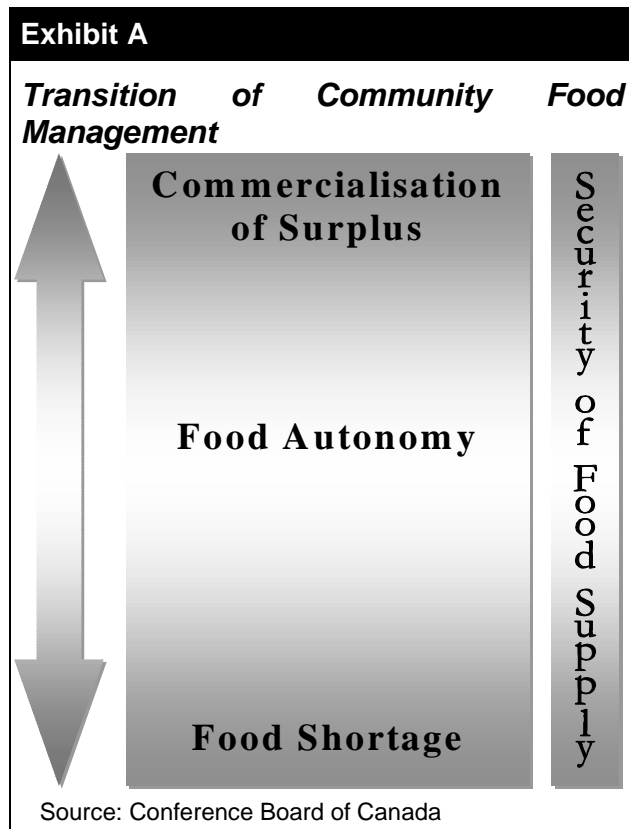
⁴ Indian and Northern Affairs Canada, "Food Mail", http://www.ainc-inac.gc.ca/ps/nap/Air/inf_e.html

reserves.

- A reduction in harvesting levels by Aboriginal people not out of choice but due to rising financial costs to harvest, a lack of the necessary harvesting skills, and a lack of access to the land.⁵
- Concern over threats to the supply of country food due to environmental pollution, climate change including global warming, and land management practices such as forestry that may threaten the supply of both flora and fauna.

With these risk factors in mind, Aboriginal communities must take care to manage their supply of country food. The production of country food can serve two populations. First, country food can be used to feed the members of the local community. Second, country food can be used for commercial purposes either for export and/or as a source of sport hunting/fishing. As such, country food is seen as a source of employment and income for communities.

Food autonomy and security are issues for all communities. However, it is recognised that each community may have its own range of food related issues (see Exhibit A). Northern communities might be concerned about both food autonomy in terms of the high degree of food imports, and about food security due to threats of pollution to the food supply. For other communities, particularly those in the south, food autonomy may not be an issue—there is an availability of food and the demand for country food is being met. For these



⁵ A decline in traditional food may also exist due to a lack of interest in pursuing traditional harvesting activities among some Aboriginal people stemming from changes in taste preferences, or changes in values and a desire for a different lifestyle. This is not a “problem” if so desired. It is only a problem when people seek traditional food or wish to pursue traditional harvesting but are unable to do so as outlined in the above paragraph.

communities, the bigger issues may be creating economic development opportunities from the commercialisation of surplus consistent with the principles of sustainable development. Still other communities may view food autonomy as being part of a larger land ownership and management issue that needs to be addressed first.

Many Aboriginal communities have had to make decisions on how to manage the food supply for these multiple purposes on a sustainable path. If no form of management is put in place, there is a risk of losing food autonomy and the use of food for commercial purposes, not to mention all of the other socio-economic impacts. Community organisation and the capacity for community planning are therefore required to make important decisions on how to use the available natural resources.

1.2 Fur Trapping

Fur trapping has long been a traditional economic activity for many Aboriginal peoples in Canada. In fact, harvesting activities have been associated with the market economy ever since the arrival of European fur traders centuries ago. Like country food production, however, there have been some key trends over the past decades that are threatening Aboriginal participation in the fur industry:

- Trapping is difficult, labour intensive work. Trapping is not preferable for many people, particularly young Aboriginal people, when faced with other alternative forms of wage related employment. This has been contributing to a loss in transfer of skills between experienced but ageing trappers and youth.
- The fur industry is relying more and more on ranch produced fur that provides a more consistent product. Generally, Aboriginal people do not operate fur ranches due to the belief that animals should be harvested in their natural environment.
- European and American bans and strict regulations on fur and sealskin products have lowered prices and income for many trappers and harvesters.

These challenges lead to the question, are there any opportunities for growth or innovation in the fur industry for Aboriginal communities?

1.3 Innovation

We define innovation as “a process through which economic value is extracted from knowledge through the generation, development and implementation of ideas to produce new or improved products, processes and services.”⁶ Innovation makes knowledge useful and turns it into wealth and prosperity. Innovation can involve changes in technology such as devices, tools, etc. It can

⁶ The Conference Board of Canada, *Investing in Innovation. 3rd Annual Innovation Report* (Ottawa: The Conference Board of Canada, 2001).

Box C

How does innovation happen?

Innovation can occur several ways as seen with trapping:

Innovation in technology: For example, a change in the type of trap used that results in an increase in pelts harvested, or an improvement in the quality of pelts. The adoption of new transportation technology such as with snowmobiles in the North is another example.

Innovation in skills: For example, a change in training that results in increased trapping capacity such as a new education program that transfers knowledge of elder trappers to youth.

Innovation in organization: For example, a change in how pelts are distributed or processed that increases production or that creates a more efficient system.

Innovation in nature: For example, a change in wildlife management that leads to increased availability of the animal being trapped or that ensures sustainable numbers over time.

also involve a change in skills or how processes are organised. For example, the adoption of snowmobiles in northern communities allowed people to travel further and quicker to better hunting/fishing locations (see Box C).

Innovation in harvesting has always existed in Aboriginal societies. It has led to the adoption of highly sophisticated hunting and distribution techniques consistent with sustainable development. Innovation, however, must continue particularly in the face of rapidly changing socio-economic conditions in most Aboriginal communities, not to mention changes in climate and the environment. For example, how can communities overcome rising costs to harvest traditional foods? Farmers, particularly in Western Canada, face somewhat similar changing conditions. Changes in climate, reduced world grain prices, and rising input costs such as fertiliser, are forcing farmers to seek new, innovative practices to maintain their way of life.

Innovation has the potential to contribute to Aboriginal food production in several ways:

- increase economic and value-added activities at the community level;
- increase capacity building and the development of economic infrastructure;
- increase food autonomy for remote communities;
- increase economic diversification;
- establish a base from which to attract investment and new economic activities;
- develop innovative workforce skills;
- expand business opportunities at the regional, national and international levels; and
- facilitate information and technology transfers in Aboriginal communities.

Innovation almost always conjures up positive connotations. However, there can

be trade-offs associated with innovation. For example, the adoption of the snow machine saves time but increases dependency on imported fuel that can only be attained through cash. An acceptable balance is therefore required for an innovation to take hold and be sustainable.

1.4 Purpose of Study

This study examines the state of Aboriginal food production and fur trapping in Canada. It also examines whether there are any innovative practices in country food harvesting and trapping by Aboriginal peoples that can fulfil either of two principal goals: (1) ensure there is an adequate supply of country food to meet existing and future demands in Aboriginal communities; and (2) be a source for community economic development consistent with sustainable development practices. This report is not advocating a return to subsistence living. Rather, it is an examination of the use of renewable natural resources that provide socio-economic benefits to many communities, and which can still have a place alongside wage based economic activity if so chosen by communities.

1.5 Focus of study

The focus for this study is innovation in the traditional economies of country food harvesting and fur trapping undertaken by Aboriginal communities in Canada. To best undertake this review, the scope of study was narrowed. In the case of country food harvesting, the focus is primarily, although not exclusively on country food (e.g., wild game, fowl and fish) and Aboriginal agri-food products that are connected to Aboriginal history and culture (e.g., wild rice, tea, corn, etc.). In the case of trapping, the manufacturing and design of clothing made from pelts will be largely addressed in a subsequent study of Aboriginal arts and crafts.

While it is recognised that there are many successful individually owned (Aboriginal) enterprises, our focus on commercial food products is primarily on community owned or sponsored enterprises and approaches.

This study was not confined to a single region or activity, but rather considered activities throughout the country. This enabled our research to consider a multitude of innovative practices, and gain greater understanding of the many challenges and opportunities facing Aboriginal groups all across the country.

1.6 Layout of the Report

This report is presented in seven chapters, including this introduction. Chapter 2 provides an overview of Aboriginal communities according to four forms of capital (human, natural, economic/physical, and social/organisational).

Chapter 3 provides an overview of harvesting and examines the values behind harvesting and those likely to influence policy choices affecting the development of country food and trapping in the future.

Chapter 4 examines the production of country food for community needs and the various support programs in place across the country. Chapter 5 looks at the Aboriginal agri-food industry. Chapter 6 examines the Aboriginal trapping industry including a discussion on trends in the trapping industry at the national and international levels. Throughout chapters 4-6, we identify best practices and potential models and innovative strategies to further develop country food and trapping production in Aboriginal communities.

Finally, Chapter 7 provides a summary of the findings with calls for action. It also identifies some of the key issues that will need to be addressed to implement the calls to action.

1.7 Approach/Methodology

The Conference Board of Canada has chosen to examine country food production and Aboriginal fur trapping by considering the four forms of capital necessary for wealth creation: human capital, natural capital, economic/physical capital, and social and organisational capital. The development of wild food and fur products cannot be considered without an understanding of the available human and natural resources, as well as the distribution networks both within communities and between communities (i.e., are there adequate road networks?). Similarly, we recognise that innovative strategies in food production and trapping cannot be examined without consideration of how land and natural resources are managed. Wildlife management and land management are central to any discussion on country food and fur production.

This study approach recognises that much of the economic activity involved in securing food for personal use or sharing by Aboriginal communities is not recorded by standard economical classification systems since there may not be any wages or purchasing of food involved, and which therefore cannot be counted. We refer to these legitimate economic activities—such as hunting, fishing and trapping—that do not involve wages and are more for subsistence purposes as the “land-based” economy. The fact that these economic activities are unrecorded does not diminish their importance. However, it does make it more difficult to estimate its size or extent in a community or jurisdiction. Although land-based economic activity may not be recorded, it is nevertheless closely integrated with wage based activity. For example, cash is required to buy gas for the motor boat to go and fish or for ammunition to hunt.

The methodology for this study was to rely extensively on the analysis of secondary information from existing studies and reports and some interviews with key officials as identified by stakeholders. However, it became apparent that much of the status of the knowledge on the trapping and wild food production is not written down, resulting in a need for additional interviews with key stakeholders.

Literature review: On-line searches were undertaken to retrieve reports and collect information about relevant organisations and enterprises. Statistics from several sources, including Statistics Canada and Indian and Northern Affairs Canada (INAC or DIAND) were reviewed. In addition, information was collected on existing programs offered by federal, provincial and territorial governments, along with those programs offered by Aboriginal organisations. An important component to this research was to review any assessments of these programs.

Interviews with Key Stakeholders: Interviews (both in person and by phone) were held with key officials from Aboriginal groups, government, and relevant corporations. This included trade officials, community economic development workers and program managers, analysts, and senior advisors. Attempts were made to speak with all members of the Steering Committee for the project. The Steering Committee members and other key stakeholders could validate the secondary information that was collected and provide up-to-date information on emerging trends and a first-hand account of the application of current support programs that could not be found in the existing literature.

2 Overview of Existing Capital in First Nation and Inuit Communities

More and more, economists, developers, and community leaders are recognising that achieving sustainable growth is a complex matter.⁷ “Creating community wealth is about more than making money; it includes the riches of family and friends, healthy workplaces, vibrant neighbourhoods, and the preservation of natural areas.”⁸ Whole wealth has become a broad notion that embraces human, social, natural and economic/physical capital, and balancing the long-term growth of all forms of capital is the best way to ensure a community will reach a viable and sustainable standard of living.

The whole concept of sustainability has evolved recently to encompass economic, environmental, and social issues. We believe this approach can be used in the examination of the Aboriginal food and fur industries, particularly with respect to the goal of economic development. Our interviews with key officials validated such an approach. Communities where all four forms of capital are present have greater opportunities to utilise food and fur production for economic development purposes than those with poor levels of capital. For example, a community that has well trained people in harvesting skills and which has strong organisational skills, strong transportation links and an abundance of wildlife is more apt to be involved in the sharing of country food and in the export of food (if so desired) than a community that does not possess these attributes. Contrast this with a community that may have an abundance of wildlife but is isolated in terms of transportation links, has few opportunities for elders to pass on harvesting skills to younger generations, and no structure to distribute or market the product.

One form of capital cannot be substituted for another, but rather they are often compliments. For this reason, it is considered essential that investments in society be broad based to ensure improvements in standard of living are sustainable over the long term.

2.1 Human Capital

Human capital encompasses human labour, but extends beyond this to include a society’s level of literacy, education and skills status, and knowledge. Health and general wellbeing come into consideration, as do attributes such as personal motivation, discipline and values.

While this research will not focus on the issues of population, education and

⁷ For the purposes of this report, “sustainable development” refers to development that meets the needs of the present without compromising the ability of future generations to meet their own needs.
(Source: Health Canada, Sustainable Development Strategy)

⁸ Community Initiatives, “On practising community capitalism” Tyler Norris, January 1, 2000.

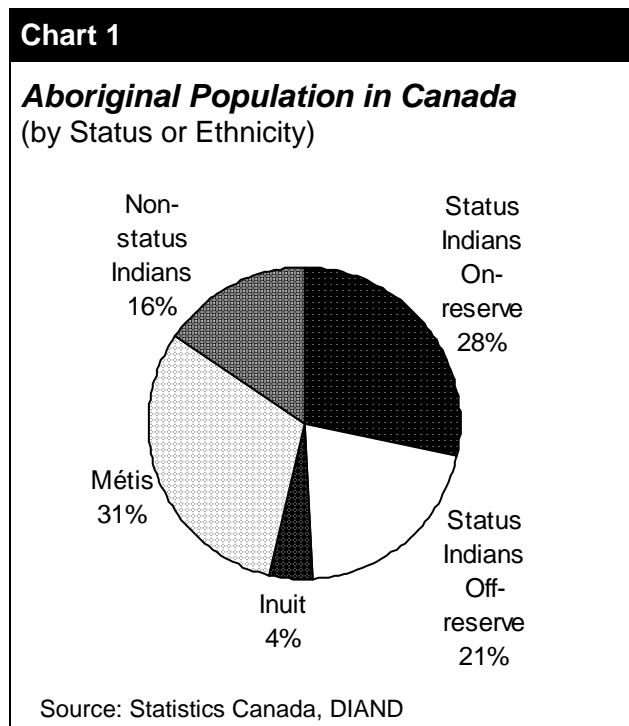
health status of Aboriginal people in-depth, these factors have an enormous impact on traditional harvesting and food production. The following information is meant to help understand the issues at hand.

2.1.1 Demographics

The term “Aboriginal people” represents widespread, culturally diverse, and regionally distinguishable groups of people. The Royal Commission on Aboriginal Peoples (RCAP) report describes correctly that Aboriginal people represent “Many Peoples, Many Voices.”⁹ First Nations people alone (excluding Métis and Inuit) represent 52 cultural groups and speak at least 50 different languages. There are 610 First Nations communities, of which 63 per cent have fewer than 500 residents and only 5 per cent have more than 2,000.

Canada's total Aboriginal population is estimated at 1,399,300 as of 2000, or 4.56 per cent of the national population, if you include Status and Non-status Indians, Métis, and Inuit (see Chart 1). Aboriginal people are also the fastest growing segment of the country's population. For example, the Registered Indian population is growing at nearly twice the rate of the rest of Canada and is expected to expand by 15 per cent over the next 8 years.¹⁰

There is a widely held belief that growth in Aboriginal populations in urban areas is due to movement of Registered Indians from reserves into cities. This, however, is not the case.¹¹ A surge in urban Registered Indian populations did occur from 1985 to the early 1990s; however, this movement was driven by restorations and registrations as a result of amendments to Bill C-



⁹ Government of Canada, *Royal Commission on Aboriginal Peoples*, “Perspectives and Realities,” Chapter 3. 1995.

¹⁰ *Indian and Northern Affairs and Canadian Polar Commission*, 2000-2001 Estimates, Part III – Report on Plans and Priorities.

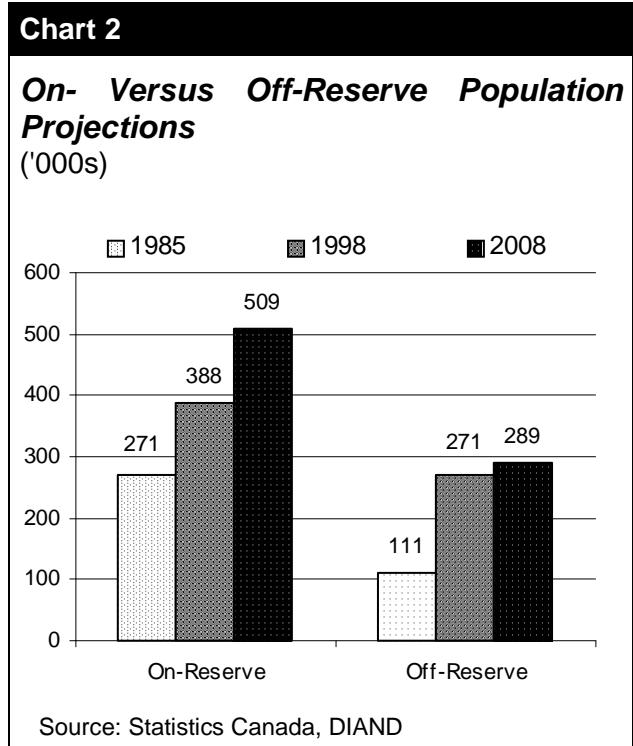
¹¹ Aboriginal mobility and migration facts provided by Mary Jane Norris et al, *Registered Indian Mobility and Migration: An Analysis of 1996 Census Data*, Strategic Research Directorate, Indian and Northern Affairs Canada, July 2000.

31.¹² Otherwise, the trend in population has been toward increases in on-reserve populations. In 1998, Canadian reserves received 2,570 migrants from other urban and rural areas. This annual net growth is expected to remain relatively constant over the 10-year period starting in 1999. Furthermore, the fertility rate is currently higher on reserves than off-reserves.¹³ The result is an estimated 31.2 per cent growth in the on-reserve population from 1998 to 2008 compared to off-reserve growth of 6.8 per cent (see Chart 2).

There is strong growth in populations in many northern Aboriginal communities as well. For example, Nunavik's population grew by 10 per cent between 1996 and 2001 according to recent 2001 Census figures. If this trend continues, Nunavik's population will double in size in only 35 years. Nunavut's population grew by over 16 per cent between 1991 and 1996 and by over eight per cent between 1996 and 2001.¹⁴

Growth in on-reserve and northern populations has many economic and social ramifications that tie into the prospects for greater food autonomy. Education, housing and health of Registered Indians living on reserves tend to be lower than those living off-reserves. Also, in communities that are dependent on country foods, the increased population is putting stress on the environment to provide enough food, not to mention the pressure on the communities' hunters and trappers, who are struggling to meet the increased demand.

Finally, the age of the Aboriginal population is noteworthy. Approximately 40 per cent of the Registered Indian population were below the age of 20 in 1999. In



¹² In 1985, amendments were made to the Indian Act that cleared the way for individuals who had previously lost their Indian Status and children born to a Registered Indian parent to gain Registered Status. Amendments also gave some authority to individual First Nations' to govern their own membership.

¹³ Indian and Northern Affairs Canada, *Registered Indian Population Projections for Canada and Regions*, Ottawa, 2000.

¹⁴ Nunavummit Kiglisiniartiit (Nunavut Bureau of Statistics), 2001 Census Population counts for Nunavut.

Nunavut, over 40 per cent of Inuit population were below 15.¹⁵ A young population, in itself is not a concern since many young people are active in harvesting pursuits.¹⁶ However, there is a concern with the changing tastes and preferences of these young people and its impact on the environment. Key informants have told us that young people are moving away from some foods (such as walrus and polar bear) and moving toward others (such as caribou and fish). These changing preferences can put a strain on certain species in the surrounding areas, leaving them endangered in some areas.

2.1.2 Education

There is a balance required in assessing formal education and the knowledge gained from working with elders and other community leaders on traditional Aboriginal activities. While improvements are occurring, Aboriginal people tend to have lower formal education levels than other Canadians, and education levels of on-reserve Registered Indians are lower than those living off-reserve. However, what is really most important is finding a balance between formal and traditional education. This could involve the integration of outdoor programs with in-class teaching. Again, this is particularly true in rural and remote areas of Canada.

Improving the level of education will be an issue for many Aboriginal communities particularly those communities with a large young population. As will be discussed later, an increasing amount of disposable income is required to support harvesting activities—income that will need to come from wage employment based on a certain level of education and/or training.

In addition, a lack of formal education becomes a problem when an individual or community wishes to transform traditional skills and knowledge into a commercial operation. Aboriginal representation in Canadian small- and medium-size business circles is very limited. There are currently 20,000 Aboriginal-owned businesses, but they are smaller and less profitable than the average business in Canada and often only serve local markets.¹⁷ There are a number of reasons for this poor representation, including a lack of access to capital and poor infrastructure, but included in this list is a lack of skilled labour within the community and limited business knowledge.

2.1.3 Intellectual Property Rights

Intellectual Property (IP) and Aboriginal people is a relatively new area of interest and study. Aboriginal people, over many generations, have developed an extensive knowledge of ecology, plants, animals, medicines and spirituality. There is a growing notion that this traditional human capital or knowledge has

¹⁵ Conference Board of Canada, *Nunavut Economic Outlook*, Ottawa, 2001.

¹⁶ Statistics Canada reports 51 per cent on First Nations people aged 15 and over reported that they participate in traditional Aboriginal activities, including harvesting.

¹⁷ Indian and Northern Affairs Canada and Canadian Polar Commission

value that should, to a certain extent, be owned and controlled by Aboriginal people, themselves. The problem is in how to own (in a property rights sense) knowledge. Through intellectual property rights, the government can provide a creator with the right to exclude others from making, using, copying or selling the holder's intellectual property.¹⁸ This property must be somehow recorded, and some degree of proof of ownership must be established.

There are many interesting areas of research within intellectual property rights and Aboriginal people that cannot be given adequate attention in this report. Many key elements must still be resolved before we see any significant improvements to the lives of Aboriginal people as a result of greater IP rights. These unresolved questions include who or what classifies as "Aboriginal"? What are the rules governing IP that were shared over the past 500 years (either to other Native groups or to Europeans)? Would the rights carryover to non-Status Indians? Would such laws bind or divide Aboriginal communities?

There are some communities and businesses that are already using existing IP laws to their advantage. For example, Aboriginal business names, designs and insignias are currently being registered as official trade-marks in Canada. This is a small but important first step for Aboriginal people to clarify the importance and uniqueness of their culture, language and art.

2.2 Natural capital

Natural capital refers to the *raw materials* required for economic activity, such as land, wildlife, fibre, minerals, energy and so on. It also refers to the *services provided by the environment*, such as waste management (storage of greenhouse gas emissions, biological treatment of wastewater and so on). Finally, natural capital can be "*natural knowledge*" or the knowledge maintained within biological systems, such as chemical configurations of plant proteins that serve as maps for the production of pharmaceutical drugs, as well as ecological relationships that have evolved to support life in harsh regions.

2.2.1 Natural Capital Management

Already discussed is the growth in on-reserve populations and the impact this can have on human capital. It also places a serious strain on the environment's ability to sustain this population growth. When 85 per cent or more of a population includes country food as a vital component to their diet, as is reported to be the case in the James Bay region, the carrying capacity of the land can be seriously jeopardised if the population exceeds the ability of food sources to adequately replenish. When this occurs, innovative mechanisms are required in order that nature can support the increased population (e.g., breaking new ground for farming or domesticating wild animals for consumption).

¹⁸ Indian and Northern Affairs Canada, *Intellectual Property and Aboriginal People: A Working Paper*, Research and Analysis Directorate, Fall 1999.

As a result, there is an increasing recognition that First Nations and Inuit people need to actively manage their resources better. With the increased demand for natural resources on Aboriginal land, communities need a more integrated strategy in order to make informed decisions on land usage. There is a need to combine traditional knowledge with western scientific knowledge. The Labrador Inuit Association's (LIA) Board of Directors recently spoke out about over hunting and fishing, stating there was a need for an information campaign on sound hunting and fishing practices, as well as an education program to teach youth how to hunt and fish properly.¹⁹ In this region, there are concerns of over-harvesting by Aboriginal people, themselves.

In other Aboriginal communities, management of existing natural capital goes beyond securing the flora and fauna of the land. It also encompasses the management of other renewable and non-renewable resources. Aboriginal communities that are situated on valuable natural resources such as forests, waterways, and minerals must decide how to manage the economic and social requirements of the community. Their decisions on land management can have dramatic impacts on the current and future state of natural capital as well as how the community will base its survival (e.g., timber management can affect trap lines). RCAP makes the case that an economic development strategy cannot be made without a strategy for land and resource use. As will be discussed in Chapter 3, finding solutions to these challenges often comes down to community values.

2.2.2 Environmental Contaminants

One concern for Aboriginal leaders, especially when considering industrial development on traditional lands, is the threat of environmental contaminants. Traditional food is as much the substance of social wellbeing as it is physical health. Harvesting, sharing, processing, and consuming traditional food is an important sociocultural process. Consequently, the contamination of country food raises problems which go far beyond the usual confines of public health, which cannot be resolved by health advisories or food substitutions.

Inuit Tapiriit of Kanatami's report on arctic contaminants found that current levels of toxins in Canada's north do not pose a threat to the health of adult humans, even when consumed over a long period of time.²⁰ However, close ongoing monitoring is required to ensure that safe levels are maintained at the community level.

This is a threat first and foremost to Aboriginal people's way of life. Currently, there are more advantages to eating country food than not. However, there is an additional concern relating to country food contaminants. That is, the negative

¹⁹ Nunatsiaq News, *Over-harvesting Worries LIA*, September 28, 2001.

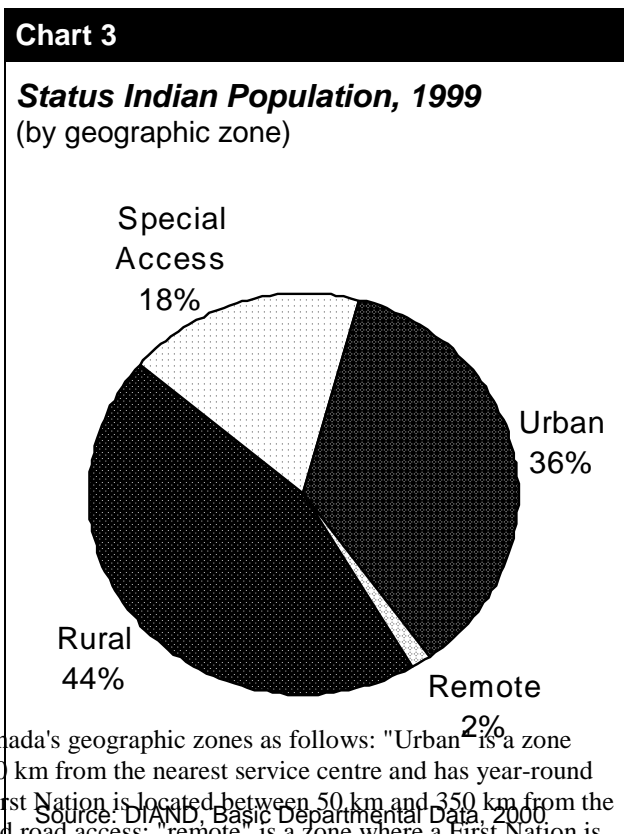
²⁰ Inuit Tapiriit of Kanatami, Indian and Northern Affairs Canada, *Arctic Contaminants Assessment Report*, Editors: Jension, J., Adare, K. and Shearer, R.

impact they have on the commercialisation of country foods. Agri-food operations that are marketing their products as "natural" or "Aboriginal" are often understood by the public to mean healthy and just as important, contaminant free. Any media coverage that casts disparaging remarks as to the safety of country foods hurts business, whether the report is on Aboriginal firms or not. One example of this is the current concern over an outbreak of mad-elk disease in western Canada. And although this deals with farmed elk, the public's perception of this food source, and anything remotely similar, can be severely damaged for many years.

2.3 Economic/Physical Capital

Economic/physical capital refers to the infrastructure and finances needed to support economic production—transportation infrastructure, structures and equipment required for business and industrial purposes, communications systems and so on. Housing stocks, recreational facilities, hospitals and other elements that contribute to human capital are also relevant, as are investments that serve to reduce draw-down from the stock of natural capital such as pollution-reduction systems.

There is a recognisable difference in the level and quality of economic capital between northern and southern communities, and between remote, rural, and urban communities. These differences have a direct impact on the economic potential of a community. In Canada, 44.4 per cent of the Registered Indian population lives in rural areas,²¹ 1.8 per cent live in remote areas, 18.1 per cent live in "special access" zones, with the remaining 35.7 per cent living in



²¹ Indian and Northern Affairs Canada define Canada's geographic zones as follows: "Urban" is a zone where a First Nation is located within 50 km from the nearest service centre and has year-round road access; "rural" is a zone where a First Nation is located between 50 km and 350 km from the nearest service centre and has year-round road access; "remote" is a zone where a First Nation is located over 350 km from the nearest service centre and has year-round road access; and a "special access" zone is where a First Nation has no year-round road access to the nearest service centre. A service centre is defined as a community that can provide supplies for home, office or construction; a pool of semi-skilled labour; a financial institution; and provincial and federal services.

urban settings (see Chart 3).²²

Transportation is a key element in business success. In the *1999 Housing and Infrastructure Assets Summary Report* it was found that of the 933 Aboriginal sites in Canada, 167 were deemed to have inadequate road access.²³ Without a viable transportation system, agri-food production becomes an expensive proposition, not only to ship final goods to market, but also to have industrial materials and equipment brought in. Furthermore, isolated communities have the added challenge of importing food at great cost and difficulty. For example, in Northern Manitoba, communities that rely on ice roads experienced delays this past winter in receiving food supplies due to warm temperatures that prevented the use of these transportation routes. With dry food stocks running low, prices on remaining goods goes up, and communities must decide whether to go ahead with the expensive proposition of having an airlift to deliver food. In one reported case of Poplar Garden First Nation, the price of 4 litres of milk escalated to \$11.

Another emerging concern in Aboriginal communities is connectivity. Access to e-health and e-learning is seen as an important opportunity for Aboriginal communities to remain in touch with the changing world. Currently, access to high-speed Internet service is lowest in communities in the Northwest Territories (+5 %) and Nunavut (0 %) compared to the national average, which is 20 per cent. Furthermore, smaller communities are less likely to have high-speed Internet access (8 % of communities under 1,000 people have this access). The recent *Report of the National Broadband Task Force* indicated that bridging the quality of life divide between Aboriginal and rural communities with the rest of Canada will come in part through an increase in Internet access.²⁴

There are a great number of programs at the federal and provincial levels that are dedicated to providing start-up capital to Aboriginal entrepreneurs or community initiatives. However, there remains an issue of access to this capital that is inhibiting some businesses from taking flight. There is a need to develop the technical capacity by Aboriginal communities to develop business plans. In many cases, however, the programs are geared to individual entrepreneurs rather than toward the community. In addition, sometimes communities spend more time responding to individual government programs each with its own set of objectives rather than the community developing an overall plan and seeking funding to meet its priorities.

2.4 Social (and Organisational) Capital

Social capital encompasses the environment in which natural, human and

²² Indian and Northern Affairs Canada, *Basic Departmental Data*, Ottawa, 2000.

²³ Government of Canada, "*The 1999 Housing and Infrastructure Assets Summary Report*," Corporate Information Management Directorate, 1999.

²⁴ The Report of the National Broadband Task Force, "*A New National Dream: Networking the Nation for Broadband Access*," 2001.

economic capitals interact to create wealth. For example, conditions of prolonged societal conflict and wars can lead to dramatic reduction in the productive outputs of existing human, natural and economic capital. Lack of entrepreneurial organisation into appropriate business structures may similarly impede the achievement of the potential that would be otherwise predicted. Also, do the environment and structures in place support innovation whereby additional economic value is extracted from knowledge? This form of capital includes the major players involved with wealth creation (e.g., government, private sector, non-governmental organisations), policy environments, levels of trust between players and public security.²⁵

Social sustainability means maintaining social capital, which are the investments and services that create the basic framework for society, cohesion of community for mutual benefit, connectedness between groups, reciprocity, tolerance, compassion, patience, etc. It can also include how people choose to form decision-making bodies, such as governments and community programs. Aboriginal communities have long been developing social structures to oversee economic development in their communities. However, in the past, there have been very few social structures linking reserves to nearby non-aboriginal communities.

Traditionally, Aboriginal communities in Canada have been thought to maintain a high level of social capital through traditional pursuits and lifestyles, maintenance of a traditional belief system, as well as contact with elders and the spirit world. Some communities are now seeing traditional pursuits such as trapping and food gathering losing their importance economically, which could have a damaging impact on their social structures. This is especially the case in southern First Nations' communities, but also exists in the North. The challenge for Aboriginal people is to effectively combine their knowledge, values, and way of life with that of the wage-based economy without compromising traditions. This is proving difficult in the face of the demands from the wage economy, but should not be considered impossible. It will require strong leadership and community support.

Linking communities in order to form an economic cluster could be a viable option in developing smaller communities' economies. It has already been pointed out that Aboriginal businesses tend to concentrate on their local market, which is not surprising given over 60 per cent of First Nations are populated with 500 people or less. This problem gives rise to the idea of pooling resources, knowledge and economies in order to create a larger base for economic activity. In British Columbia, the Central Interior First Nations are working together, and have developed a greenhouse that supplies their own communities first, with the surplus going to the Merritt food bank.

However, many communities have found organising and establishing common

²⁵ The Conference Board of Canada, *Nunavut Economic Outlook: An Examination of the Nunavut Economy* (Ottawa: The Conference Board of Canada, 2001).

Box D

T'Sou-ke First Nation Revives Tradition to Resolve Food Shortage

The T'Sou-ke First Nation is a small community on Vancouver Island near the town of Sooke. The community relies on salmon as a primary staple and as a source of employment. Recent declines in the fish stocks have made it difficult for the First Nation to meet its quota. What's more, the unavailability of a fishing vessel forced the community to find other means in which to catch fish. This prompted a community-based research plan to restore a traditional practice of fish-trapping, which would allow for a selective and sustainable harvesting of salmon as well as provide employment to community members. Also, because the fish are trapped, younger salmon can be tagged and released, helping government agencies' assessment of fish stocks.

Designing the fish trap required community leaders to call upon elder's traditional knowledge and values as well as professional biologists to help build the trap. They also consulted with the community of Petty Harbour, Newfoundland, where a similar project was underway. Finally, monetary support was required from the provincial government, to the tune of \$250,000 under the *Aboriginal Fisheries Strategy*, as well as other grants and private fund raising. The project successfully integrated traditional and scientific knowledge, provided training and employment for youth and fishers, and built a valuable partnership with separate parties interested in a sustainable fishery.

The fish trap, which was named Glung-U's after the last T'Sou-ke chief to fish with a reef net over 100 years ago, was an immediate economic and environmental success, proving the value of a holistic approach in turning a challenge into an opportunity.

Source: Council for the Advancement of Native Development Officers Conference 2001, *Closing the Gap*, October 10-13, 2001.

ground within the context of business to be difficult. There can be a divergence of opinion across generations or communities within a region. Often, the necessary condition to initiate change within these communities is strong and effective leadership, which stems from education, both formal and traditional. The T'Sou'ke First Nation was able to combine current leadership, elders and non-aboriginal communities and scientists to develop a solution to their food shortage problem (see Box D). This can be one of many models considered when considering economic development elsewhere; that is, solutions are often developed using multiple stakeholders, involving a variety of knowledge areas, and combining traditional and modern knowledge.

3 Wildlife Harvesting and the Importance of Values

3.1 Wildlife Harvesting

As stated in the introduction, wildlife harvesting has represented a large portion of economic activity for many Aboriginal communities, particularly those in rural and remote locations. It draws from all four forms of capital discussed in the previous chapter relating to skills, infrastructure and equipment, natural resources, and organisation.

Most wildlife harvesting (i.e., hunting, fishing and trapping) is undertaken by Aboriginal people for personal/family use, sharing or barter. While many of the inputs for these activities (e.g., the purchase of gas and other supplies) will be recorded, the output of their activities (i.e., the meat and pelt for personal use) will often be unrecorded and their value not officially included in standard economic recording classification systems such as Gross Domestic Product (GDP). There also have been few resources committed by funders to undertake research to quantify the size of traditional economies using other means. Consequently, the value of harvesting activities can be underestimated thereby hindering policy and program planning and also lead to it being undervalued by Canadians. This issue is discussed in greater detail in Chapter 4.

What is the role of harvesting in today's mixed economy (i.e., combination of wage-based and land-based activities)? Mention has been made in the past that subsistence living or land-based activity was a necessary compliment to wage employment. However, the opposite is true—the wage economy is necessary to support traditional activities since most of the inputs such as supplies and equipment must be purchased with cash. Either someone must earn cash to pay for the supplies or someone else in the family must earn income to be set aside for these purposes—either way harvesting is very much tied into the wage economy. Some argue that as the wage economy increases, more income will be obtained to actually support harvesting and develop local markets for products.

The regulation and management of harvesting can vary depending on the jurisdiction. In areas under a land claims settlement, the agreement usually specifies the rights of the beneficiaries to harvest and their involvement in both regulating and managing or co-managing natural resources with government through hunters and trappers organisations and through a wildlife management council. Such is the case for both the Nunavut and Inuvialuit land claims agreements which involve the creation of a wildlife management board or council that sets quotas for levels of total allowable harvesting for all available species for the year in the settlement area. They also identify and provide funding for wildlife research which is a crucial component to harvesting. Hunters and trappers organisations regulate harvesting practices, techniques, and quotas at the community level. They may organise community hunts/harvests and assist in the distribution of meat and fish, provide harvesting and trapping training to

students, and provide hunter and trapper input on community projects and planning activities that may affect their livelihood. Regional wildlife organisations oversee the management of hunter and trapper organisations on a regional basis. Under land claims agreements, beneficiaries usually have the right of first refusal to establish a commercial operation.

Where there are no land claims agreements in place, status Indians and Inuit in Canada can hunt on unoccupied Crown lands for subsistence purposes, provided the species has not been declared as endangered. However, the existence of co-managed mechanisms with provincial governments to monitor wildlife numbers and harvesting levels can vary widely. Co-managing natural resources, particularly in southern jurisdictions, continues to face a number of issues such as how to integrate traditional ecological knowledge and western science.²⁶

3.1.1 The Benefits of Harvesting

The economic benefits to harvesting include the production of a considerable amount of food for the overall diet. The result is less reliance on more costly imported foods and reduced outward flow of cash. Where wildlife numbers are sufficient, country food can be sold for export providing local employment. As well, the pelts can be used for clothing or sold to the fur industry for income. Arts and crafts are also derived from harvesting. As will be discussed later, harvesting also contributes economically by supporting the tourism sector either directly through sport hunting/fishing or by supporting a culture and way of life that is attractive to many tourists.

But animal harvesting goes beyond serving an economic need. It also serves vital social, developmental, and cultural roles such as transferring knowledge and teaching skills from one generation to another and supporting the social structure. Harvesting is learned to a large extent by observation and experience because of the high ratio of possible variables during each outing. Culture is transmitted via harvesting such as the importance of freely sharing portions of the harvest along complex kinship lines. This distribution includes the donation of food to elders and parents, for example, and therefore contributes to communal food autonomy. A disruption in animal harvesting can therefore lead to significant negative consequences for communities organised around harvesting.

²⁶ “The Evolution and Status of Wildlife Co-Management in Canada” Biodiversity Network Reports, 1999.
<http://cgi.www.biodiv.net/fulltext/canada/english/page2.html>

Box E

The Nutritional and Health Value of Country Food

Country food makes up a significant portion of the diet for many Aboriginal people. The selection of country food will depend greatly on the location of the community but can range from fish and game meat (e.g., caribou, moose, seal) to fowl, eggs, berries and plants and shellfish. Generally, meat and fish make up a large portion of harvested country food.

Research has shown that an average serving of wild meat or fish supplies all of the recommended daily requirements for most essential nutrients. For example, caribou meat is high in iron, high in protein (27 per cent) and low in fat. Arctic char (eaten in its entirety) is also high in protein and calcium as well as vitamin B and D. Marine animals provide several nutrients such as omega-3 fatty acids and selenium that are linked to protecting against conditions such as diabetes, heart disease and mercury toxicity.

Source: Inuit Tapiriit of Kanatami, "Country Foods". (www.tapirisat.ca/sitemap/atlas/CountryFoods/body_countryfoods.html)

Carole Blanchet et al., "Contribution of Selected Traditional and market Food to Nunanvik Inuit Women Diet" *Canadian Journal of Dietetic Practice and Research*, Vol. 61 (2), pp. 50-59.

Country foods also serve an important health function. Country foods are highly nutritious (see Box E) and historically have shown themselves to be capable of providing all of the necessary nutrients for nutritional health.²⁷ In fact, a diet involving a significant portion of country food is linked to better health indicators than the current western diet:

- The death rate for ischemic heart disease for residents in northern communities where country food consumption is higher is significantly lower than the national rate (see Chart 4). The lower rate is likely attributable to many factors but the high reliance on country foods (high protein, low fat) and the active lifestyle involved in harvesting appears to be playing a positive role.
- A study of the Inuit diet in Nunavik found that the consumption of marine products (fish and marine animals), rich in omega-3 fatty acids, was associated with low mortality rates from ischemic heart disease, visual acuity and increased birth weight. As such, their diet appears to beneficially affect some risk factors associated with cardiovascular disease. These findings are consistent with international studies of populations with similar diets.

However, it is recognized that nutritious market foods (i.e., purchased non-country foods such as vegetables, fruit and dairy products) are being relied on as important sources of vitamins and nutrients for some Aboriginal peoples' diets.

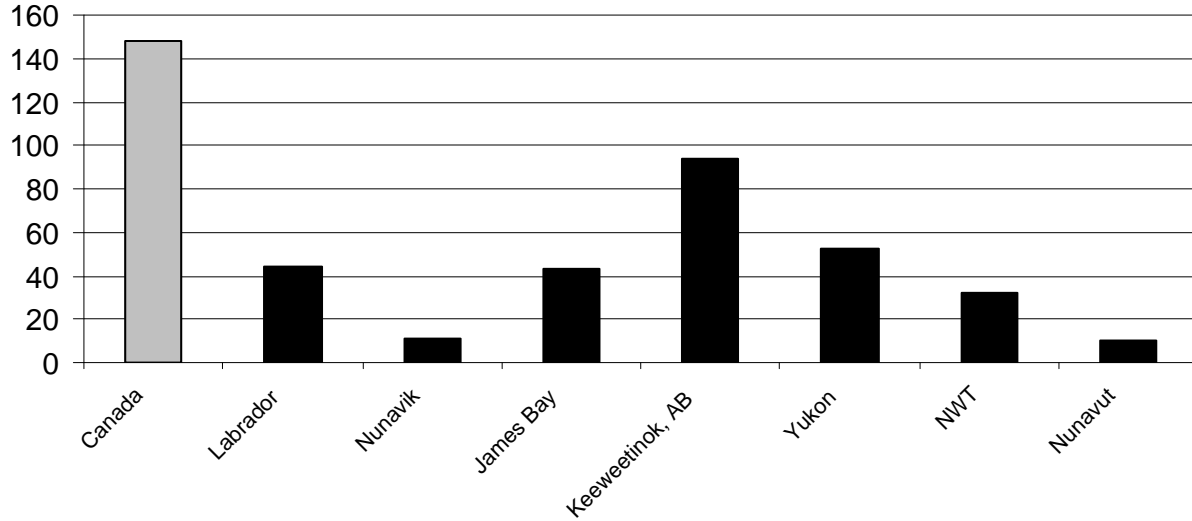
In addition, harvesting activities usually require a degree of physical activity, thereby contributing to an active lifestyle.

²⁷Draper, H. H (1978) Nutrition Studies: The Aboriginal Eskimo Diet – A Modern Perspective. In Jamison, PL, Zegura SL, and Milan FA (eds): *Eskimos of Northwestern Alaska: A Biological Perspective*. Stroudsburg, Pennsylvania: Dowden, Hutchinson, and Ross, Inc., pp. 139-145.

Chart 4

Ischemic Heart Disease Deaths for Canada, Select Territories and Regions²⁸

(rate per 100,000 population, 1996)



Source: Statistics Canada, Vital Statistics

Increased consumption of country food can counter some of the negative dietary habits taking place:

- The rising incidence of Type 2 or adult onset diabetes among Aboriginal populations has no doubt been affected by a decrease in physical activity caused by a more sedentary lifestyle, a reduction in country food and an increase in carbohydrates.^{29 30 31}
- A 1995 study of students in the Northwest Territories found that students, particularly Aboriginal students at all grade levels ate more “junk foods” than children in the rest of Canada with sugar consumption much higher than the national average.³²

²⁸ Labrador refers to the Health Labrador Corporation Region; James Bay to Terres-Cries-de la Baie James; Keeweenok to the Keeweenok Lakes Region.

²⁹ Eric Dewailly et al., *n—3 Fatty Acids and Cardiovascular Disease Risk Factors Among the Inuit of Nunavik*, *American Journal of Clinical Nutrition*, Vol. 74, pp. 464-473. 2001.

³⁰ Centre for Indigenous Peoples’ Nutrition and Environment, “Traditional Food- Physical Activity” <http://cine.mcgill.ca/TF/index.htm>

³¹ James H. Boschma III, *The Changing Nature of Inuit Nutrition and Dietary Patterns*. <http://www.as.ua.edu/ant/bindon/ant570/Papers/Boschma.htm>

³² M. Peart and A. King, *Health Behaviours, Attitudes and Knowledge of Young People in the Northwest Territories – Territorial Report* (Yellowknife: DECE, GNWT, 1995 in P.G. Sly et al., *State of Knowledge Report, West Kitikmeot/Slave Study Area*, p. 98.

- A review of the research literature indicates Aboriginal people have low intakes of many nutrients such as iron, vitamin D, calcium, folate, vitamin A, and fluoride.³³

A diet involving country food can contribute to the healthy development of people thereby leading to greater productivity and lower health care costs. Nutritional problems among Aboriginal people will only serve to widen socio-economic gaps within Canadian society.

There is also growing concern over the impact of environmental contaminants on the safety of country food. As reported in Chapter 2, while there have been reports of contamination in animals, particularly sea mammals, experts still maintain that the levels are low and have not yet become a threat to food safety—but it still remains a growing concern.

3.1.2 The Future of Harvesting

There have been several changes to harvesting practices over the past several decades.³⁴ For example, the move to permanent settlements lead to the concentration of hunters resulting in them having to travel further to get to better hunting grounds. Other factors that have affected harvesting over this period include: improvements in devices to support hunting such as snowmobiles; the growth of wage employment (depending on the region); the downturn in demand for furs by international markets; and the prohibition of hunting while collecting social assistance. The formal education schedule has also had an impact on harvesting activity, as family harvesting must wait for breaks in the school year for opportunities to take extended harvesting trips with their families.

Wage employment has acted as a double-edged sword. On the one hand, it can constrain the time required to hunt, particularly major hunting activities requiring several days. On the other hand, wage employment brings in cash required to pay for the supplies that are now required to be an effective harvester (e.g., snowmobile and gas). Some have suggested that the net result has been that harvesting has suffered in some communities since people with jobs are the ones with the supplies to hunt but not the time, while those who have the time to hunt do not have the necessary cash to purchase supplies. Stern has observed that wage employment has not had a major affect on one's interest to harvest—rather wage earners are increasingly viewing harvesting as a form of leisure or a lifestyle choice as opposed to a form of work.³⁵ The impact could be a reduced ability to undertake lengthy harvesting trips and a change in the range of food

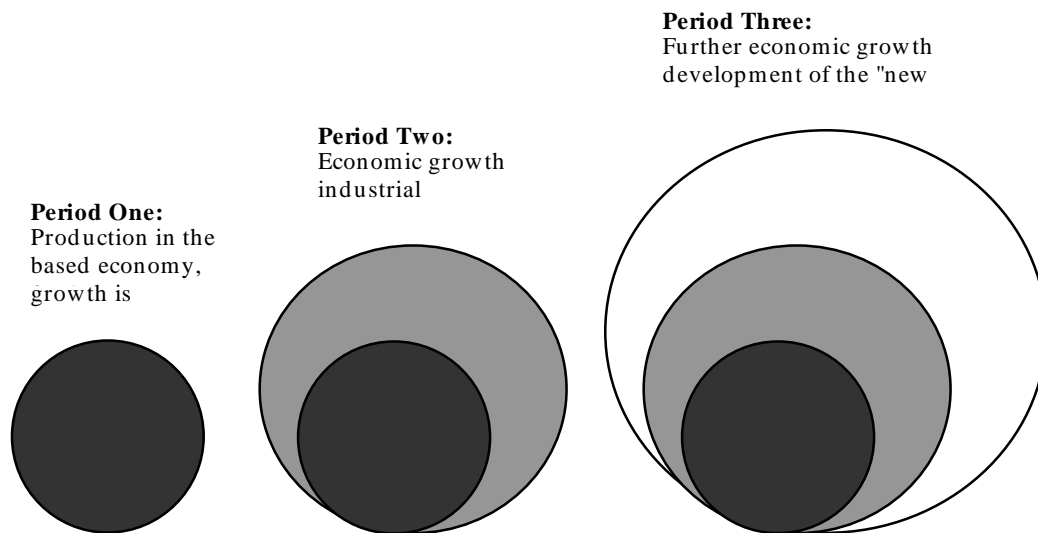
³³ Moffatt, ME (1995) “Current status of nutritional deficiencies in Canadian Aboriginal people”. *Canadian Journal of Physiology and Pharmacology*, 73(6): 754-758.

³⁴ For a summary of the changes in harvesting in the Arctic see Heather Myers, *The Changing Food Economy in Nunavut: Will Country Food Stores Secure Nunavut's Food Supply?* GETIC (Quebec City: Universite de Laval, March 2000)

³⁵ Pamela Stern, “Subsistence: Work and Leisure”, *Inuit Studies*, Vol. 24(1), 2000, pp. 9-24.

Exhibit B

Transition from Historical Land-based Economy to Modern Whole Economy



Source: Conference Board of Canada

sources available as some animals require more time and resources to harvest than others.

Will harvesting be ultimately replaced as the wage economy grows? In its recent Nunavut Economic Outlook, the Conference Board of Canada suggested that growth in the wage economy does not necessarily lead to a reduction in the land-based economy as innovation can make up for fewer people involved in land-based economic activity (see Exhibit B). While production increases during the transition from land-based production to industrial development and the new economy, the absolute level of production of the land-based economy can remain constant or even increase.

In summary, harvesting activity by Aboriginal people is unlikely to disappear—what appears to be changing are its characteristics such as who is harvesting, duration and the type of animal harvested. Much of these characteristics will depend on the values of the people, their social goals, and how they define a high quality of life.

3.2 The Importance of Values

At the heart of this examination of traditional economies are values: “For Inuit in particular, food is the juncture of values, economic practices, health-related behaviours and knowledge systems that reflect the relationship of the Inuit with

their environment.”³⁶ Values play an important role in influencing choices related to economic affairs in communities. Harvesting is not only an economic activity but is so tightly embedded in the social system that it reflects and reinforces existing societal values.

Values are strong beliefs that reflect our expectations about how people in a system should behave. While usually slow to change, values can shift in priority due to changes in environmental, social or economic conditions. More often than not, what occurs is a change in priority among values rather than outright changes. For example, there could be a decrease in support for following a collective approach to economic development over time and an increase in individual responsibility or vice versa.

It is therefore important to understand the dominant values in Aboriginal communities related to subsistence living and economic development, as they will likely affect the choices made by communities. For example, some communities or large segments of the population in a community may be opposed to producing country food for the export market (even if shown to be economically feasible) while other communities may find it acceptable.

How does one measure values? There is no universally acceptable method to identifying societal values. Examples of methods include surveying the population on attitudes, reviewing government and other public documents from the community in question, observing behaviours, or using focus groups where people are asked questions designed to identify dominant values at play. Unfortunately, there is little survey data available on the views and attitudes of Aboriginal people and people residing in Aboriginal communities. A key question is whether values are changing with each generation, particularly the large youth cohort in most Aboriginal communities.

There are several values related to harvesting and traditional economic activities that appear to be strong in most Aboriginal communities:

- A strong commitment by Aboriginal communities to the notion of sustainable development. There is recognition that natural resources must be used wisely or they will be lost forever.
- A collective approach in the sharing of economic wealth. In the case of harvesting, this means that it is expected harvested food will be shared within the family and community according to an established distribution network. It is not uncommon for hunters to announce the news via community radio that they have returned with some country food to share with the community. However, sharing practices have been changing with the population growth in communities and the emergence of the mixed economy.

³⁶ Carole Blanchet et al., “Contribution of Selected Traditional and Market Food to Nunavik Inuit Women Diet”. *Canadian Journal of Dietetic Practice and Research*, Vol. 61 (2), Pp. 50-59.

- A collective approach to socio-economic development. Economic development projects that are seen as “community-owned” are preferred over those that are individually owned. The impact of a growing class of Aboriginal entrepreneurs may challenge the dominant collective approach. This has important implications for funding programs. Many government programs are targeted to the individual entrepreneur rather than the community as a whole. Such an approach may not work for many societies where the collective approach is highly valued.
- Respect for traditional knowledge. Traditional knowledge is a continuous knowledge base covering all aspects of daily life including harvesting and living off of the land. A considerable amount of innovation has been handed down from generation to generation this way and is seen by many Aboriginal communities as key to ensuring harvesting is effectively undertaken in the future.
- In many Aboriginal communities, harvesting and a connection to the land are strongly associated with high quality of life either as a form of leisure or part of one’s livelihood. The key question is whether its importance is diminishing among the large young population.
- Harvesting is to be foremost for subsistence purposes not for commercial purposes. Any commercial wild food activity can be pursued upon reassurance that the supply for subsistence purposes is not threatened.
- With respect to trapping, animals should be trapped in their natural environment. Second, trapping for Aboriginals involves not only the fur or pelt but the food provided by the animal. In other words, for many species, the entire animal is used. Any operation that involves unused portions of the animal or waste can be unacceptable.

These values have been and will continue to face tension as socio-economic and environmental changes occur. For example, is any level of harvesting for commercial purposes tolerable for the community? Is there support for pursuing economic development on a regional level rather than on a community level whereby costs and benefits are shared among communities? How is country food to be distributed if fewer people are involved and the costs of harvesting incurred by the hunter are increasing?

4 Overview of Traditional Food Supply

This chapter looks at the state of country food harvesting among Aboriginal people and communities for non-commercial purposes. Specifically, it attempts to answer the following questions:

- Do communities still desire country food?
- What is the value of country food consumed in Aboriginal communities?
- Are communities adequately providing for their own country food?
- How are people supported to do so?
- What is the long term prognosis for harvesting?
- What strategies are required to further support communities' abilities to harvest?

Food production for commercial purposes is discussed in the following chapter.

4.1 Demand for Traditional Food Among Aboriginal Communities

Country food can be very diverse. There is a wide variety of country foods consumed in Aboriginal communities including fish, wild meat, fowl and eggs, fruits (e.g., wild berries), rice and other flora (e.g., seaweed). The specific range of foods eaten will obviously vary according to the flora and fauna of each region.

A review of the research and discussions with officials in several Aboriginal communities indicates that a high proportion of Aboriginal people, particularly in northern communities, continue to rely on country food and participate in harvesting activities. Most officials we interviewed indicated that country food contributed as much as 60 to 80 per cent of the total diet for many Aboriginal people. Here are some examples:

- A study on Inuit dietary practices in Nunavik using data from 1992 found that 73 per cent of the Inuit population reported eating country food the day prior to the survey. Consumption was highest for those who were married, were 40 years and older, or had less formal education.³⁷
- According to the Government of Northwest Territories, harvesting of renewable resources for domestic use is the largest economic activity undertaken by Aboriginal residents in NWT. More than 90 per cent of Aboriginal households consume country foods and almost 50 per cent of Aboriginal households hunt or fish.³⁸

³⁷ Eric Dewailly et al., Socio-Demographic Factors Influencing Nutrition and Contaminant Exposure in Nunavik. Final Report. Arctic Environmental Strategy (AES) Northern Contaminants Program 2000/2001 (Quebec: Laval University, August 2001)

³⁸ Government of Northwest Territories, NWT Labour Force Survey 1999.

- A report on the diet of Yukon First Nations found that a diverse range of traditional food was consumed on more than 50 per cent of the days.³⁹
- According to the 1999 Nunavut Community Labour Force Survey, 54 per cent of Inuit surveyed indicated they eat caribou—only one source of country food—3 to 4 times a week or more.
- Aboriginal peoples have been found to consume seven times more fish than non-Aboriginals.⁴⁰

Despite these numbers, many officials express concern that the consumption of country food has been significantly declining even in northern and isolated communities.

Empirical evidence supports the view that country food consumption is decreasing among particular segments of Aboriginal society.⁴¹ Foremost is a decline in country food consumption by young people. This is something affecting many cultures and Aboriginal people elsewhere—for example, all Inuit societies in the circumpolar regions are seeing a decrease in country food consumption by young people.⁴² A review of women's eating habits in Nunavik found that women between 18-39 years consumed more pizza, fried potatoes and chips, carbonated and sweetened beverages than women 40 years and older.⁴³ A survey of residents in the community of Sanikiluaq, Nunavut found that over 80 per cent of older adults ate country food every day compared with 45 per cent of those 18-34 years of age.⁴⁴ A study for the Keewatin region found similar results: 81 per cent of people 55 or older ate country food daily (land mammals), compared to 65 per cent of those between 35-55 years and 45 per cent of those under 35 years of age.⁴⁵

Many people we spoke to believed that not only are young people eating less country food, but they are also eating a more limited selection of country food than their elders. Young people are less likely to eat a wider range of animals and more parts of the animal.

³⁹ O. Receveur et al., *Yukon First Nations Assessment of Dietary Benefit/Risk*. (Montreal: Centre for Indigenous Peoples' Nutrition and Environment, May 1998).

⁴⁰ Fikret Berkes et al., "Native Subsistence Fisheries: A Synthesis of Harvest Studies in Canada" 1990, pp. 35-42.

⁴¹ For example, see Judith Lawn and Dan Harvey, *Change in Nutrition and Food Security in Two Inuit Communities*.

⁴² Eric Devailly, C. Blanchet and P. Chaumette, *Diet Profile of Circumpolar Inuit*, (Quebec: Public Health Research Unit, CHUL Research Centre, 1999)

⁴³ Carole Blanchet et al., p. 9.

⁴⁴ E.E. Wein, M.M.R. Freeman and J.C. Makus, "Use of and Preference for Traditional Foods Among the Belcher Island Inuit," *Arctic*, 49(3): 256-264. In Heather Myers, *The Changing Food Economy in Nunavut*.

⁴⁵ Moffatt. *Current Status of Nutritional Deficiencies in Canadian Aboriginal People*.

Another factor leading to lower consumption of country food, and one that is somewhat surprising, is the link with higher levels of formal education and income.⁴⁶ Half of Aboriginal households in the NWT with incomes of less than \$40,000 obtained more or all of their meat and fish through hunting of fishing compared to only 34 per cent of households earning \$80,000 or more.⁴⁷ Other studies have found that country food consumption is lower among people who live alone or who are separated/divorced or widowed.⁴⁸

Decreased interest in country food has been attributed to many factors, including the lure of southern processed convenience foods. Common market foods eaten in Inuit communities include tea, sugar, bannock, cookies, fruit drinks, evaporated milk and white bread.⁴⁹ Lower demand for country food also appears to be influenced by participation in the wage economy. In communities where wage employment is high, low levels of country food are consumed. Possible reasons for this are that people with high levels of wage employment may have fewer opportunities to harvest their own country food, and people with wage employment are in a better financial position to purchase market food if so desired. Also, country food can be more time consuming to prepare for eating than southern foods thereby acting as a disincentive for those pressed for time. The level of consumption may also be linked to the level of social engagement within the existing social structure in the community (kinship).

4.2 Assessing the Monetary Value of Harvesting Traditional Foods

*The subsistence food harvest has met local needs for countless years. It is important to support and encourage subsistence use instead of relying on costly imported products. A means must be developed of assigning appropriate value to the non-monetary benefits of wildlife.*⁵⁰

The task of evaluating the net worth of all Aboriginal subsistence food activities right across Canada is a difficult one to say the least. The work would involve the collection of information on every animal, fish, and plant acquired through traditional harvesting activities. Then, every parcel of food would have to be given a value. This is difficult given the absence of a market in many of the communities in which subsistence harvesting takes place. To date, work completed in this area has concentrated on one of two methodologies: the capital cost calculation or the replacement cost calculation (see Box F), and typically

⁴⁶ Eric Devailly et al., Socio-Demographic Factors Influencing Nutrition.

⁴⁷ Statistics Canada, *Canada Census*, 1991. As reported in P.G. Sly et al., *State of Knowledge Report, West Kitikmeot/Slave Study Area*, April 1999.

⁴⁸ Eric Dewailly et al., Socio-Demographic Factors Influencing Nutrition.

⁴⁹ Eric Devailly, C. Blanchet and P. Chaumette, *Diet Profile of Circumpolar Inuit*, (Quebec: Public Health Research Unit, CHUL Research Centre, 1999)

⁵⁰ Government of Northwest Territories, Economic Framework, Wildlife Sector
www.gov.nt.ca/RWED/ced/framework/wildlife/ingredients.html

looks at one region at a time.

What is clear after studying results produced by either methodology is that subsistence production of food holds a significant place in the survival of many Aboriginal communities, not to mention its countless social and cultural benefits. For example, the Kitigan Zibi Anishnawbeg First Nation (north of Ottawa) consumed \$600,000 worth of country foods (based on total replacement value) in 1988, which is \$1,715 per household.⁵¹ Converting this figure into 2000-dollar terms brings the value to \$2,065 per household.⁵² An older study (1981) estimated the annual country food value per household in 1979-dollar terms in some Aboriginal communities in British Columbia: East Kits, \$3,182 per household; Cannes, \$3,388 per household; and, Blueberry, \$5,648 per household. The value of country food consumed in the NWT in 1982-83 was estimated to be \$40 million—its replacement value (an equal amount of food imported from the south) was estimated to be \$80 million. Peter Elias has estimated that subsistence activities contribute 30-60 per cent of income in northern Aboriginal communities and country food being 80 per cent of total food consumption. The same study suggested the annual replacement value of this country food was \$20,000 per household.⁵³ Newer figures for Nunavut, using the replacement cost methodology suggest the value of country food is approximately \$30-50 million per year—although this is a rough estimate and further research in this area is clearly warranted. For comparison purposes, Statistics Canada indicates the average Canadian spent \$1,594 on food in 2000 (excluding pet food and restaurant meals).

In Alaska,⁵⁴ the Department of Fish and Game, Subsistence Division has estimated the State's level of subsistence both by weight and by replacement value. In 1994, this State Department estimated the average annual wild food harvest was about 375 lbs. per person for rural areas and 22 lbs. per person for

⁵¹ Unless otherwise noted, the figures for the value of subsistence production are taken from Richard Maracle, *Aboriginal Employment and Economic Development in Natural Resource Industries Wildlife Sectoral*, Royal Commission on Aboriginal Peoples, 1995.

⁵² Statistics Canada CANSIM database shows consumer price index for food (store bought, not including restaurants) in Canada has risen by 20.4 per cent from 1988 to 2000.

⁵³ Peter Elias, *A Framework for Understanding Northern Economies*. Faculty of Management, University of Lethbridge, Alberta, 1993.

⁵⁴ While the economies of Alaska and Canada's northern territories are not identical, some comparisons can be made, including the participation in subsistence production. Alaska's demographics can be best compared to that of Northwest Territories, in that 48 per cent of Alaskans are Native, while the bulk of non-Native Alaskans (84 per cent) live in urban centres. The major difference being Alaska's population in 1990 was 550,000.

Box F

Calculating the Value of Subsistence Production

Capital Cost Calculation

This method seeks to ascertain the cost of producing a pound of meat (for example) by adding all the costs associated with the four factors of production:

- Capital: What equipment was used? What is the cost of this equipment? And what is the rate of depreciation of the equipment?
- Labour: How much labour was involved? This would include preparation time, time used to fix equipment, time spent sitting and waiting while on the hunt, and time processing the kill. Then, on top of that, a value would have to be given to this labour, as well as a value on the skills and knowledge of the hunter.
- Land: Is there a cost (rent) for the land? In many cases there is not, but this is not necessarily a given. Licensing for hunting on certain lands would be included here.
- Entrepreneurship or profits: What is an acceptable profit margin for these activities?

It is understandable that this method suffers from a need for too much data; data that most often does not exist, and must be estimated.

Replacement Cost Calculation

This method attempts to find the cost to the hunter, if they should have to purchase their exact catch from the marketplace (store bought). Data requirements for this methodology are less than the capital cost calculation, but does require an accurate tabulation of harvest numbers. This can be fairly accurate when looking at large game such as caribou, moose, walrus or seal, but is more difficult for smaller game such as birds and rodents.

- For each species, one must determine the average edible content of that animal. For example, how much edible meat can we assume is contained within a 250-pound deer?
- Nutritional values and comparisons must be made. How much beef is needed to equal the nutritional content of one pound of moose meat? And, is beef the closest comparison to moose? It is not necessarily clear which domestic animal is most appropriate for comparison purposes.

What price should be used in the conversion? That is, should country foods be priced according to the price of comparable meat in the wholesale market? In a local grocery store? Or a southern market?

All of the above options have been studied, and provide remarkably different results. What is undeniable is the volume of country food produced. In determining its importance, whether its value is \$100 or \$1000 per person does not take away from the fact that country food is consumed everyday, and constitutes as much as 80 per cent of some Aboriginal people's diet. The attempt to give this food a dollar value is, in many ways, an academic exercise, but perhaps necessary for policy makers to formulate sound arguments to garner support and recognition for traditional Aboriginal harvesting as an important and valued pursuit.

Source: Bill Reimer and Chris Trott, et al., *Economic Integration and Isolation of First Nation Communities - Report I: An Exploratory Review*, for The Canadian Rural Restructuring Foundation, Concordia University, Montreal, December 1997.

urban areas.⁵⁵ They also found that in rural areas not serviced by State highways the annual harvest was 500-800 lbs. per person. An attempt was made to attach a dollar value to the harvest using a version of replacement cost calculations.

⁵⁵ Wolfe, Robert and Robert Bosworth, *Subsistence in Alaska: 1994 Update*. Alaska Department of Fish and Game, Division of Subsistence, Juneau, March 1, 1994.

Assuming a replacement expense of \$3 - \$5 per pound resulted in a total cost figure of \$131.1 to \$218.6 million, annually. In rural interior areas, the per capita cash value of this food is \$3,063 per person compared with a per capita income of \$6,205 for the average "Native" family - meaning that in Alaska, the cost of replacing subsistence foods would be 49 per cent of the average Native's income.

Looking at the average edible weight of country food is another interesting methodology used in calculating its importance in the diet of Aboriginal people. It has the benefit of simplicity and comparability regardless of the methodology chosen to attach value. Throughout the 1980s and early 1990s, many studies were conducted to determine the volumes of country food consumed by Aboriginal communities across Canada's northern regions (see Table 1). Most of the country food consumed in the north is meat or fish, which is significantly different than the diet of the average Canadian, who consumes approximately 67 kg of meat and fish per year.⁵⁶

While most of the research in the area of subsistence food production has been focused on northern communities, its importance is not exclusive to these locales. For instance, Walpole Island First Nation is Canada's southern-most Aboriginal community not far from Detroit. Its land and waters support hunting, fishing, trapping and recreation, which contribute millions of dollars to the local economy every year. Moreover, the environment still supplies the community with ample fish and game to support one-third of its 3,000 residents on a regular

Table 1

Aboriginal Consumption of Country Food
(by region and ethnic group)

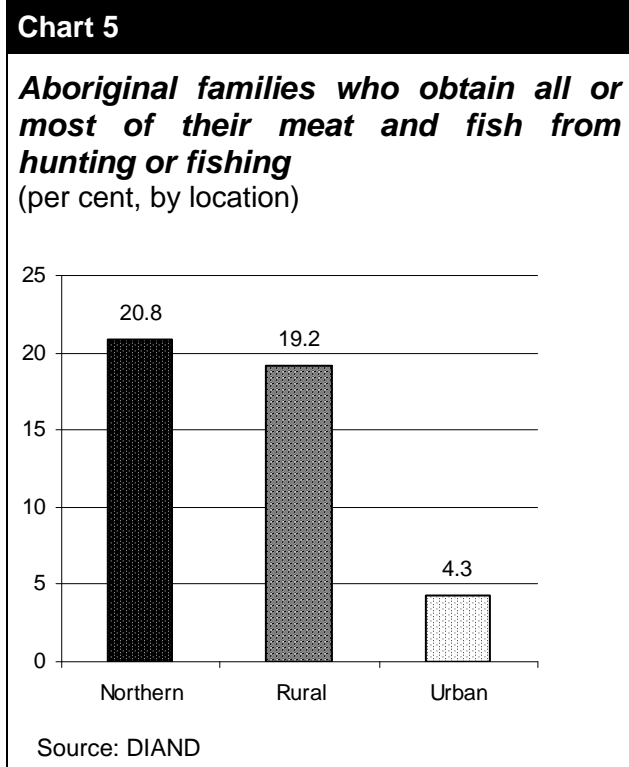
Region	Aboriginal Ethnicity	Annual kgs of meat per person	Year of Study
James Bay	Inuit	257	
James Bay	Cree	123	1980
Keewatin	Inuit	214	1980
Kitikmeot	Inuit	270	1985
Baffin	Inuit	275	1985
Western Arctic	Inuvialuit	164	1988
Labrador	Inuit and Settlers	147	1983
Yukon	Several First Nations	87	1988
Alaska	Several First Nations	170	1994

Source: Weihs et al., Robert Wolf et al.

⁵⁶ Inuit Tapiriit of Kanatami. www.tapirisat.ca/sitemap/atlas/CountryFoods/body_countryfoods.html

basis. There is definitely a greater emphasis on commercial options, such as duck hunting camps, but the community remains oriented toward the protection and preservation of this resource, first and foremost, for the community's use.⁵⁷

Where there is a noticeable difference in country food consumption is between Aboriginal communities that are northern or rural compared to those considered urban (see Chart 5). The limited consumption in urban centres does not imply Aboriginal people living there are uninterested in eating country foods. On the contrary, our key informants spoke often of the need for these people to have access to country foods in order for them to remain connected to their culture and traditions. Providing traditional foods to Aboriginal people residing in urban settings is difficult due to shipping and distribution costs. What we see more often is wild game being sold as a premium product in fine restaurants and butchers' shops. This effectively raises country foods' value well beyond the reach of most Aboriginal people. A country food store within an urban setting would likely have to be subsidised if the aim was to get the food into the homes of Aboriginal people.



4.3 Are communities adequately providing for their own country food?

Every community is at a different level when it comes to its own level of food production. Some communities, usually near urban centres, may produce little of their own country food, while those in northern, rural and remote areas often rely heavily on local country food production.

A review of previous studies and reports from key stakeholders indicates that the number of people participating in harvesting remains significant. According to the 1999 Nunavut Community Labour Force Survey, a significant portion of both employed (78.5 per cent) and unemployed (73.7 per cent) Inuit males between the ages of 15 and 54 harvested frequently or occasionally (see Table 2). The

⁵⁷ Walpole Island First Nation, <http://www-personal.umich.edu/~ksands/Warpole.html>

Government of Nunavut has estimated that between 54 and 60 per cent of Nunavummiut aged 15 years and older are harvesters.

In the NWT, 46 per cent of Aboriginals reported they hunted or fished in 1998. This included almost 60 per cent of Inuvialuit/Inuit peoples in the territory.⁵⁸

The Beverly-Qamanirjuaq caribou herd frequents the areas of northern Manitoba and Saskatchewan, the Keewatin or Kivalliq region of Nunavut and the Fort Smith region of the NWT.

There are approximately 13,500 people residing in this area and it is estimated that at least 11,000 of them are traditional users of these caribou for subsistence purposes. The value of caribou meat harvested (16,000 caribou) from these herds for subsistence purposes has been estimated at \$10 million per year.⁵⁹

However, there is a prevailing view among many officials that harvesting levels have been dropping or are likely to decrease as the cost of harvesting rises, wage employment grows and the necessary harvesting skills are lost. Others suggest that what is occurring are more subtle shifts in harvesting patterns. For example, Nunavut's Harvester Support Program has found that while a large proportion of the population harvests, participation is moving from intensive and active harvesting to harvesting on a more occasional basis (see Chart 6).⁶⁰ The level of harvesting will also be affected by such factors as international fur prices and quotas set for each species in a region.

Concern has been expressed about the lack of availability of country foods in some Aboriginal communities. For example, some communities in the James Bay region of Quebec import beaver meat from southern areas, as there is not enough in the region to meet demand. There are also reports of Aboriginal people in more urban communities unable to access country food.⁶¹ The

Table 2

Self-Reported Harvesting Activity of Inuit Males, Ages 15-54
(per cent)

	Employed	Not Employed
Harvests frequently	37.1	46.0
Harvests occasionally	41.2	27.7
Rarely or never harvests	16.5	23.7
Not Stated	5.0	5.6

Source: Nunavummit Kiglisiniartiit (Nunavut Bureau of Statistics), 1999 Community Labour Force Survey

⁵⁸ NWT Bureau of Statistics, 1999 Labour Force Survey

⁵⁹ NWT, Resources, Wildlife and Economic Development, Barren-Ground Caribou Population Status. <http://www.nwtwildlife.rwed.gov.nt.ca/NWTwildlife/muskox/muskoxtop.htm>

⁶⁰ Interview and documentation provided by Mike Webster, Senior Advisor, Traditional Economy (Nunavut), Community Economic Development and Trade Division (HQ), Department of Sustainable Development, Government of Nunavut

⁶¹ This includes Aboriginal people who are in southern urban centres to receive specialised health care treatment.

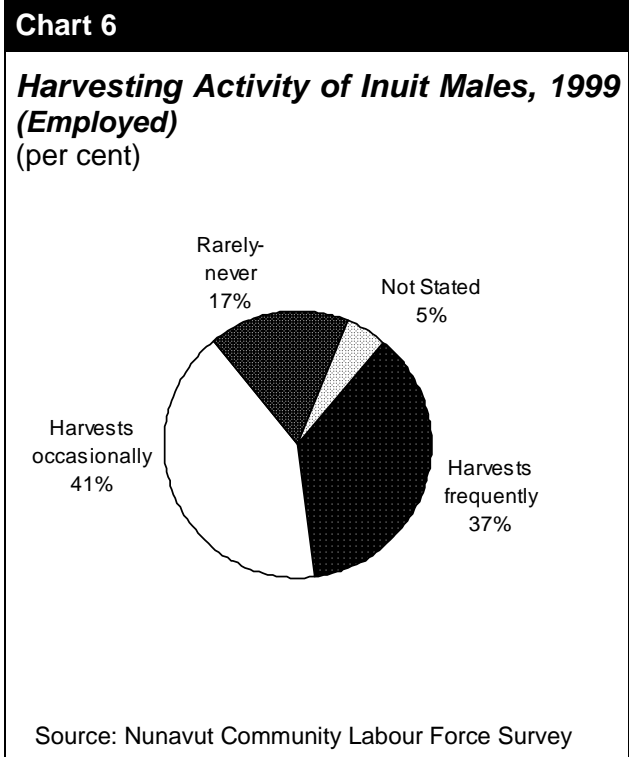
increasing movement by Aboriginal people within regions, such as in Nunavut or in the Northwest Territories, is leading to a demand for different country food not readily available in their new community. Some Aboriginal communities have been seeking ways to import country food from other regions as part of an inter-settlement trade strategy. As indicated previously, air carriers serving the North offer discounts on country food products shipped between communities or to the south.

4.4 Community Level Harvesting Initiatives and Support Programs

Programs specifically supporting trapping are discussed in Chapter 6. However, it is recognised that there is overlap since harvesting can often involve the harvest of wild furs for sale.

Harvesting support programs can have several objectives, from supporting harvesters to promoting greater consumption of country food. Most programs, however, are directed at alleviating the high equipment costs faced by hunters. Until the collapse of the fur industry in the early 1980s, many Aboriginal harvesters were able to support their activities through the sale of fur pelts and sealskins. In some communities, harvesting support programs may be an innovative adaptation of providing social assistance while meeting harvesting objectives. In the past, social assistance programs did not allow recipients to harvest but increasingly, social assistance program regulations have come to recognise harvesting activities as a “productive choice”. Finally, a few programs are aimed at facilitating the distribution of country food in and among communities (e.g., community freezers, airfare discounts for shipping country food).

Provincial/territorial governments offer many of the harvesting programs. Aboriginal organisations may also run harvesting programs, particularly in areas featuring a land claims agreement with a beneficiary organisation. Often these programs are organised in conjunction with the political jurisdiction (e.g., Inuvialuit Regional Corporation and the Government of the Northwest Territories).



A common issue with most programs has involved defining “harvesters” or “hunters” that should be eligible for support. How much time must be devoted to harvesting to qualify? What types of activities would be considered as harvesting? Should an elder helping a youth to harvest qualify as a harvester under a harvester support program? How often should a harvester be able to receive funding: on an annual basis or once every two or more years? There is some concern over ensuring that harvesting support programs reach those people and households most in need as opposed to those people who are already able to harvest by virtue of having the necessary resources and the skills to apply for a grant.

4.4.1 Country Food at Local Retail Level

One approach to supporting harvesting and the consumption of country food is through country food stores or stores selling country food. Such stores exist in some communities, particularly in northern regions (NWT, Nunavut and Nunavik). These retail operations enhance access to country food, particularly for those people unable to harvest. Country food sales have been in practice in Greenland for centuries where sharing practices are more restricted and there has been a longer presence of non-Inuit people.⁶²

According to Myers, country food stores in NWT and Nunavut have been very successful having both local customers and regional markets such as prisons, hotels and other retailers.⁶³ Hunters and fishers operating under the commercial licensing system provide the country food. The catch is delivered to the stores where it is then prepared for sale or processing into a number of products. The stores employ the hunters, processors and store personnel. One of its objectives is to supplement the income of hunters and fishers.

Myers concludes that the country stores provide a valuable role in making a wide range of country food more accessible via the wage market for people in the wage economy that cannot obtain the food otherwise. Other advantages of the country store model are:

- they provide a source of community pride as they demonstrate how cultural products can successfully fit into the modern world;
- they support the cash needs of hunters;
- they provide local service jobs, particularly for women and students;
- they reduce reliance on imports and the leakage of dollars flowing outside of the community; and

⁶² Heather Myers, *The Changing Food Economy in Nunavut: Will Country Food Stores Secure Nunavut's Food Supply?* GETIC. (Quebec: Universite de Laval, 2000).

⁶³ Ibid.

- they serve as a potential source for external markets and new revenues.⁶⁴

However, many stakeholders contacted for this study informed us that there is little demand among Aboriginal households for obtaining country food through local commercial operations. Preference is still given to obtaining country food through family harvesting and sharing. However, with an increase in people participating in wage employment, there may be fewer opportunities to do so, raising some interesting issues. First, what effect does the presence of country food for sale have on the social networks used in distributing country food that is harvested? Does a retail market pose a threat on the supply of country food in that region? Another interesting issue is that by selling country food within communities, a monetary value is now placed on the food.

4.4.2 James Bay Cree Hunters and Trappers Income Security Program

This innovative program, established in 1976 as part of the James Bay Agreement with the Government of Quebec, provides an income supplement to members who pursue traditional activities as their main occupation. (Defined as where the head of the household spent more time conducting harvesting related activities including hunting, fishing and trapping, than time spent in salary or wage employment.) The program is a form of a guaranteed income for those wishing to live a traditional way of life. The benefit is based on a per diem of up to 240 days spent harvesting in the bush and a supplementary amount or guaranteed basic amount, based on amount of family income. Initially, the basic amount accounted for 24 per cent of total payments. The program is not eligible for people who hold regular wage employment and wish to supplement their income. Seasonal employment, however, is acceptable.

There has been an increase in the number of single persons enrolled in the program and a decline in families with children. Participation is highest among those below 28 years and those over 68 years of age (see Charts 7 and 8). There is a concern that hunting skills could be lost, as few families with school age children participate—many remain in communities so that their children can attend school.

⁶⁴ Ibid.

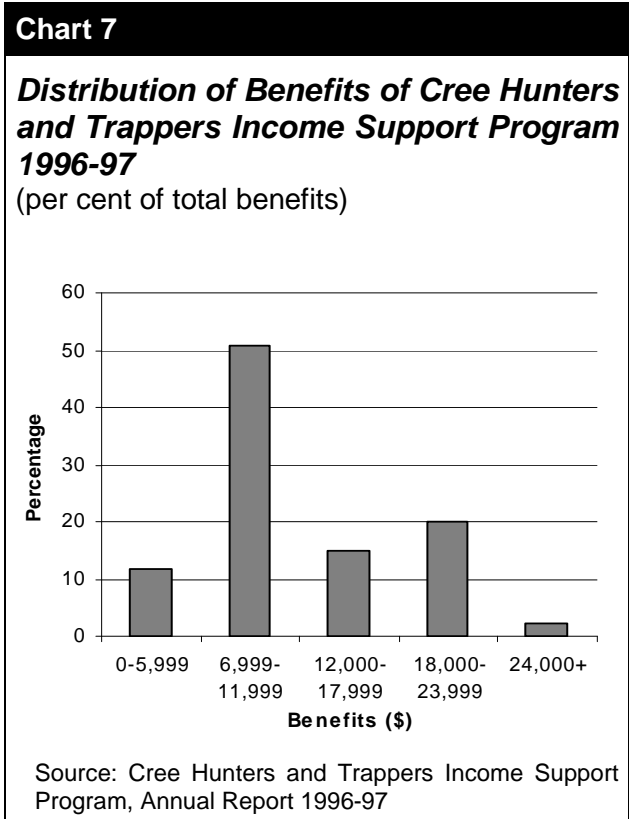
In 1996-97, 1,742 adults were enrolled in the program as beneficiaries, or 38 per cent of the Cree working population and approximately one quarter of the total population. Benefits totalled approximately \$14 million that year. Due to a decrease in the number of families participating and a rise in the number of people over 65 years participating who also receive old age pension income, the size of the basic amount has decreased to approximately 10 per cent of the total benefit. The average length of stay in the bush per adult beneficiary was 178 days.

The Cree use a system of hunting stewards for each parcel of territory. They have usually been raised on that particular piece of land and have a sound knowledge of its natural resources and can identify trends in animal populations, etc. The stewards can set restrictions on hunters in terms of animal species harvested and quantity.⁶⁵

Other Aboriginal communities have called for the revamping of social assistance programs to support harvesters and at the very least, not penalise them for hunting while trying to survive on social assistance income. The Royal Commission on Aboriginal Peoples called for amendments to how social assistance and unemployment insurance for seasonal workers are issued that will support harvesting activities for family and community consumption.⁶⁶

4.4.3 Nunavik Model

Funded by the Quebec government, the Kativik regional government provides for the supply of harvested food and the acquisition of equipment for harvesting.



⁶⁵ Harvey A. Feit, "Hunting and the Quest for Power: The James Bay Cree and Whitemen in the 20th Century", in *Native Peoples: The Canadian Experience*, (2nd ed.) edited by R. Bruce Morrison and C. Roderick Wilson (Toronto: McClelland and Stewart, 1995).

⁶⁶ Canada, Final Report of the Royal Commission on Aboriginal Peoples (RCAP), Vol. 2, Ch. 5 (Ottawa: Supply and Services Canada, 1994).

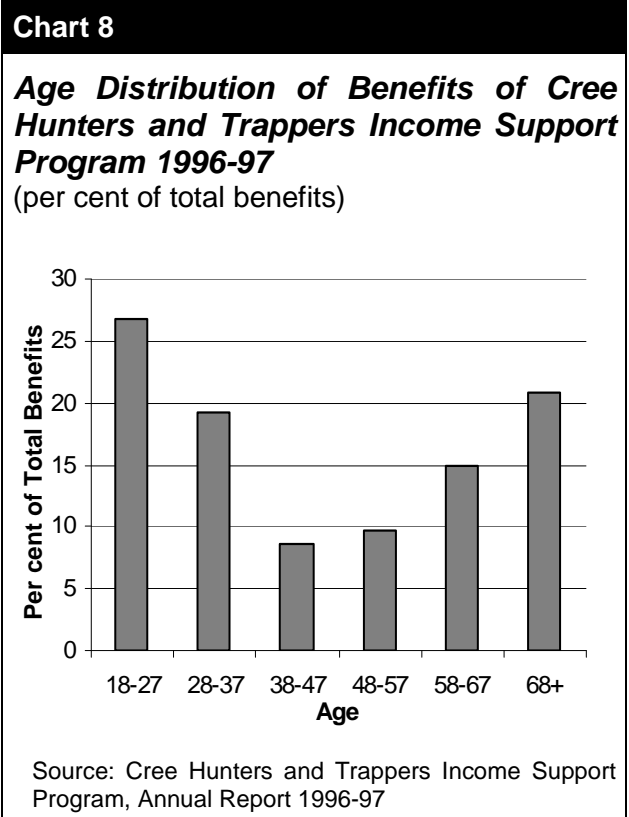
Hunters are compensated to harvest and they distribute their food in local community freezers. The food is available free of charge to residents but is used most by people who cannot hunt or access country food such as elders. Unlike the James Bay Cree approach, this program is not designed specifically for people who are unemployed. Each community in Nunavik receives funding based on population levels and the funding may be used differently according to the needs of the community.⁶⁷

4.4.4 Programs in the NWT and Nunavut

Both the Government of Northwest Territories (GNWT) and the Government of Nunavut provide a range of programs aimed at supporting harvesting related activities (those specifically aimed at trapping are discussed in chapter 6). The GNWT has provided a harvesting support program since the 1970s. The new Government of Nunavut adopted these programs when it began operation in 1999 such that both territories offer similar types of harvester support programs.

Both territorial governments offer programs that support community hunts, build administrative capacity of local hunter and trapper organisations and regional wildlife organisations (e.g., computerised bookkeeping systems, training office staff), and provide compensation to harvesters in the event of a natural disaster.

In addition to these programs, both territorial governments provide funding and or support for harvester assistance programs in conjunction with Aboriginal beneficiary organisations. The Inuvialuit Harvesters Assistance Program (IHAP) covering the Western Arctic was established in 1998. The program funds harvesters from the earned interest on a \$4.4 million trust fund set up by the Inuvialuit Regional Corporation (IRC) and the Government of Northwest



⁶⁷ Thibault Martin, Local Management and Regional Practices in Two Inuit Communities, Presented to MOST CCPP workshop. 2000.
http://www.google.ca/search?q=cache:opFVMxLPG3MC:www.uit.no/MostCCPP/Huhmari/joe_pap/JOE_Thibault-M.pdf+Kativik+hunter+support+program&hl=en

Territories (GNWT). In 1999, 44 beneficiaries received assistance ranging from \$500 to \$7,500 for a total program expenditure of approximately \$170,000. The funding is used to support capital items, fuel and supplies required for harvesting.

Established in 1993, the Nunavut Tunngavik's (NTI) Nunavut Harvester Support Program (NHSP) provides funding for a number of qualifying Inuit families who fish, trap or hunt for subsistence purposes in Nunavut. The fund was capitalised at \$30 million with equal contributions from NTI and the GNWT during the early 1990s.

The Harvester Support Program provides up to \$12,000 per harvesting household for equipment (i.e., boats, motors, all-terrain vehicles and snowmobiles), other capital costs and fuel for a limited number of the neediest full-time hunters in Nunavut. The program also offers discounts on supplies like floater suits and high-frequency radios. In recognition of women's role in harvesting, the program has allowed funds to be used for purchasing of sewing machines for the making of clothing and related products.

The program assisted 349 people in 1997. It contributed over \$2 million in 2000/01. An attempt was made to place a monetary value on the edible weight of country food harvested by the recipients of the program. Based on an imputed value of \$12.97 per kilogram, it was estimated that harvesters under the program harvested approximately \$3 million worth of country food.⁶⁸

While NTI is responsible for the overall administration and management of the program, local hunters and trappers organisations decide who requires assistance. The program is eligible to any beneficiary under the Nunavut Land Claims Agreement. They must be a Nunavut Inuk hunter "principally engaged" (actively harvesting on a full time basis for 6 months or more per year for subsistence purposes), and showing "demonstrated need" (limited means to obtain alternative sources of employment, resides over a large household, and has not replaced essential equipment with new equipment within the last two years). Applicants can receive equipment once every five years.

The Nunavut Harvester Support Program was originally intended to follow the approach taken by the James Bay Cree including its incorporation in the Nunavut Land Claims Agreement. In the end, it was not included on the grounds by the Government of Canada that "social programs" were not to be negotiated in the claim.⁶⁹ The program has gone through a number of reviews and changes to try and best meet the needs of the Territory's harvesters given the high demand for support. The Nunavut Harvester Support Program and the programs provided by the Government of Nunavut are currently under review.

⁶⁸ Consilium, *NHSP Evaluation*, 1998.

⁶⁹ *Ibid.*

4.4.5 Economic Development Agreements

Support for harvesting related activities has also been delivered via economic development agreements between different levels of government and/or with Aboriginal governmental organisations. For example, several agreements were signed between the Government of Northwest Territories and the Government of Canada to support country food production and commercial fishing in the NWT (Special Agricultural and Rural Development Agreement and Renewable Resource Demonstration Projects Fund). The agreements contributed approximately \$5 million toward country food production and \$4.2 million to support commercial fishing during the 1980s and early 1990s.⁷⁰ However, no subsequent agreement has been signed.

The Canada Ontario Regional Development Agreement is an example of a current economic development agreement involving several organisations and governments (see Box G). CORDA funds a number of projects aimed at supporting traditional Aboriginal lifestyles and community economic development at the grass roots level including the harvesting of wild food and commercial fishing operations. However, with the exception of CORDA in Ontario, there are no other provincial harvesting support programs.

Other federal departments offer funding programs that are used to support harvesting. Through its Aboriginal Human Resource Development Agreements, Human Resources Development Canada (HRDC) supports communities to provide job training and skills development assistance for Aboriginal peoples both on and off reserves. There are 79 multi-year agreements in place across the country, some of which are used to support training for activities that involve local hunting and food production (e.g., marsh management and duck hunting in Walpole Island in Southern Ontario).

Agriculture Canada provides funding through its Canadian Adaptation and Rural Development (CARD) program aimed at fostering the long-term growth, employment and competitiveness of Canada's agricultural and agri-food industry and agricultural rural areas. The program recognises the need for developing a balance among economic growth, food safety and environmental sustainability. Provincial or territorial councils (e.g., Nunavut Harvesters' Association) oversee the implementation of the CARD program and the funding of projects. The CARD program can be used to support harvesting related activities, the establishment of community gardens and greenhouses, and the development of commercial food operations.

⁷⁰ Myers, *The Changing Food Economy in Nunavut*.

Box G

The Canada-Ontario Resource Development Agreement (CORDA)

The Canada-Ontario Resource Development Agreement (CORDA) is a unique inter-governmental/inter-organizational agreement designed to support traditional Aboriginal economic activities including harvesting and trapping. CORDA is a five year (renewable) agreement between: Grand Council Treaty #3; the Nishnawbe-Aski Nation; the Union of Ontario Indians; the Association of Iroquois and Allied Indians; the Independent First Nations; the Government of Ontario (Ministry of Natural Resources); and the Government of Canada (Indian and Northern Affairs Canada). The Agreement was first signed in 1947 and has been renewed 10 times.

The budget for CORDA is \$1 million with half of the funding provided by the federal government and the other half from the provincial government. CORDA usually receives approximately 150 applications per year requesting \$3-4 million in funds. The maximum amount of awarded funding is \$35,000. Most projects receive between \$5,000-25,000 and usually have the support of the local band council.

CORDA funds a number of projects aimed at supporting traditional Aboriginal lifestyles and community economic development at the grass roots level. Funded projects include:

- the harvesting of wild food such as wild rice, blueberries and wild crops;
- assistance for traditional trappers;
- deer and moose hide utilization;
- commercial fishing operations;
- seed funding for small businesses involved in cultural or traditional activities that use natural resources; and
- other areas such as eco-tourism and forestry management.

For example, the program provides transportation for trappers along the western coast of James Bay to reach their trapping lines. Funding can also be used to upgrade trapper cabins and upgrade traps to comply with international standards. CORDA's Hats for Hides program takes in unwanted moose and deer hides from hunters and distributes them to Aboriginal artisans who use the hides to manufacture crafts and clothing (the hunters receive a hunting hat in exchange for the hides).

CORDA is an excellent example of a funding program aimed at Aboriginal harvesting related activities and which is guided with involvement from all stakeholders.

Notwithstanding these programs, this review has found few examples of public policy initiatives aimed principally at addressing the issue of food autonomy and the promotion of country food for Aboriginal communities. Areas that feature a land claims agreement are more likely to have harvester support programs, most of which are operated by Aboriginal political or economic development organisations (e.g., Inuvialuit Regional Corporation in Northwest Territories, Nunavut Tunngavik Incorporated in Nunavut, Makivik Corporation in Nunavik, Cree Regional Authority in eastern James Bay). That being said, there is agreement by most officials that better co-ordination and linkage are required between all of the various government programs that support harvesting.

4.5 Threats to Community Food Supply

Several threats to harvesting and the production of food for community use were frequently identified. These threats and their level of seriousness can vary by community.

The cost of inputs required to harvest was the most frequently identified obstacle. Contrary to what many southerners may believe, harvesting can be prohibitively expensive. Harvesting, using modern methods requires a considerable amount of equipment and supplies. Some of the major costs are listed below.

- Capital costs such as:
 - transportation (e.g., snowmobiles and sleds, all terrain vehicles, or boats);
 - firearms, traps, or nets;
 - shelter (tent or outpost cabin);
 - heater; and
 - special clothing and devices such as high-frequency transceiver radio.
- Operating costs such as:
 - gasoline and oil;
 - ammunition; and
 - vehicle repairs.

Capital start up costs for hunters in Nunavut have been estimated to be between \$20,000-\$30,000.⁷¹ A 1993 study on harvesting costs in Nunavut estimated that harvesting costs per family were \$11,648 per year (\$8,085 for equipment plus \$3,563 for gas and ammunition).⁷² A single day trip by snowmobile can cost between \$150-\$400 when all costs are included. Open water hunting can be more expensive due to the cost of a boat and motor. The high cost of gasoline and frequent problems with the quality of fuel in northern and remote communities have been frequently identified as a major factors affecting the level of harvesting undertaken.

The loss of harvesting skills is seen as another barrier to local production of food. Harvesting skills and knowledge are not being adequately transferred down to the next generation and there is a need to train young harvesters. There is also a rising concern about the unrecognised and unsupported role of female harvesters.

⁷¹ Interview and documentation provided by Mike Webster, Senior Advisor, Traditional Economy (Nunavut), Community Economic Development and Trade Division (HQ), Department of Sustainable Development, Government of Nunavut.

⁷² RT and Associates, Nunavut harvest Support Program: Background Document (Ottawa: Nunavut Tunngavik Inc., 1993).

A third obstacle is the reduced availability to harvest by the individual. This can arise for several reasons, particularly related to wage employment that can limit the time available to harvest. Workers may also be required to leave their community and region to secure wage employment making it difficult to physically access the land. The formal school schedule can also limit the time and locations available for families to harvest.

There are also supply issues related to the availability of game that are capable of threatening country food production. For example, the increase in population in many Aboriginal communities may put a strain on the supply of certain kinds of country foods if harvesting levels are not properly managed. Environmental changes, such as global warming, can impact wildlife numbers leading to a reduction in supply or a move in migration patterns, etc. The impact of environmental changes alone is a very serious issue that warrants attention. The supply of habitat may also be reduced or altered in the pursuit of other economic activities such as mining and forestry.

A final issue is how changes in harvesting patterns are affecting the social and cultural practices that are tied into harvesting and the sharing of food. How will country food be distributed and shared if fewer people are involved in harvesting? How will families and communities, traditionally organised around harvesting, be organised for other socio-economic pursuits? One official identified a dilemma that has emerged—while fewer people are harvesting, there are still expectations that food be shared. This can put enormous pressure on the smaller numbers of harvesters.⁷³

A key matter is whether any innovative techniques can be adopted to address these food deficiencies. This will be the subject of discussion in the following sections.

4.6 Opportunities for Country Food Supply

Despite the potential barriers, there are still many opportunities for innovation in the local production of country food. It should be clear that in outlining the ideas below, we are by no means advocating for a withdrawal from the wage economy and a return to a subsistence lifestyle. Rather, we see attention to local food production as a way to:

- mitigate the high cost of food imports;
- maintain or improve health through a diet that includes a significant portion of country food;
- maintain a connection for people to the land/sea;
- strengthen social and cultural ties within the community and between

⁷³ Correspondence with Larry Simpson, Sector Development Specialist, Renewable Resources, Department of Sustainable Development, Government of Nunavut.

generations; and

- develop and maintain valuable land and life skills.

Some of the suggestions below deal directly with innovation while others would help support the development of innovative strategies.

Develop human capital: As outlined in Chapter 2, many Aboriginal communities feature a significant young population. While the values and attitudes of this young cohort are subject to change, this next generation provides an incredible resource of human capital for the development of local economies. Presently, there are few opportunities for youth to learn harvesting related skills (e.g., navigation, hunting, fishing, and safety skills). The key will be for communities to ensure harvesting is seen as an important part in the development of youth (e.g., the celebration of harvesting success in communal ceremonies) and to provide opportunities for children and youth to interact with harvesters to learn the necessary skills to harvest. For example, the Government of Northwest Territories has been working with schools to provide opportunities for kids to trap. They have found youth are interested in participating in harvesting activities given the proper approach and emphasis. Another idea is to adapt the school calendar to seasonal activities. For example, summer vacations could be switched to fall vacations to allow students to participate in hunting activities with families or in optional “fall camps” where harvesting skills can be taught.

Greater awareness of the nutritional value of country food: As pointed out, country food is highly nutritious. There has been considerable concern about the effect of contaminants on country food. Thus far, research suggests that country food remains a healthy choice. However, some people may believe otherwise. For example, a study of the consumption of freshwater fish in Kahnawake on the St. Lawrence found that many residents believed it was unsafe to eat local fish. However, tests on local fish suggested that the local fish is safe to eat.⁷⁴ Local public campaigns to encourage country food may overcome these fears. One innovative approach in Nunavut has been its new food guide that emphasises the importance of country food. The meat section of the guide refers to traditional meat like whale, caribou and seal, while the fruits and vegetable sections refer to wild berries and seaweed. In addition, greater effort is required in developing and marketing convenience country food that takes little preparation time.

Innovative working arrangements that support harvesting: It is clear that while we speak of a wage-based economy and a land-based or traditional economy the two are separate in name only. Cash is required to support most harvesting activities. The problem is that while wage employment can provide income, it can reduce opportunities to harvest. An area that requires consideration for innovation is new wage labour arrangements that actually

⁷⁴ L.H.M. Chan et al., *Freshwater Fish in Kahnawake: Risks and Benefits*. Summary. (Montreal: Centre for Indigenous Peoples' Nutrition and Environment (CINE), February, 1997).

support both wage and harvesting activities. For example, some mining companies are operating on a 2 week fly-in, fly-out schedule whereby employees work for 2 weeks and then have 2 weeks off. This approach can provide people with more time to participate in longer harvesting trips. These types of arrangements can be part of discussions during negotiations for impact benefit agreements between companies and nearby communities.

Strategies to support the professionalisation of harvesters: One approach to address the need for country food in a changing environment is to consider strategies aimed at the professionalisation of harvesters. This could be implemented several ways but is based on the assumption that the supply of country food is not meeting local demand. One approach is to involve arrangements for communities, co-ops or local food stores to employ or hire professional hunters on a full-time or part-time basis. Another approach is to allow harvesters to act as small businesses that could be certified to hunt and sell country food to processing plants.

Regardless of approach taken, the professionalisation of harvesters would require the development of human capital skills by the harvester. As well, public education and promotion activities could be established that would celebrate the work and skills of the professional hunter so that it is recognised by the community, particularly young people, as a worthy and legitimate economic activity to pursue.

There would be trade offs with this approach such as how a professional hunter may affect harvesting activity by other community members and the social structure organised around harvesting. But the idea may be necessary if harvesting costs continue to escalate and activity drops significantly.

Improving supply of country food for select populations: Many Aboriginal people still rely on family connections for their supply of country food. However, Aboriginal people who move to other Aboriginal communities may lose this connection. Furthermore, Aboriginal people who move with their families to urban communities are likely to lose access to country food as well. There are few options for people in these cases to access country food. Either the country food is not available to them or the food is too expensive to purchase. Meeting this demand fits well with efforts by northern governments to promote inter-settlement trade. As previously identified, there are special air cargo rates available for country food flown between settlements within the north and for the shipping of country food to southern communities. This issue should not be overlooked as the availability of country food to people living away provides them with a link to their community and heritage and increases the chances that these people can one day return and give something back to their community if so desired.

New governance opportunities that put more control over how land and resources are managed locally including the production of food: Communities that have greater control over the planning and management of

their local resources are able to make resource allocation choices on how to support harvesting. A harvester support program exists with most land claims agreements reviewed for this study. The result has been the consideration and adoption of a wide assortment of approaches to support harvesting. This matter is discussed further in Chapter 7. For many Aboriginal communities, the first step in promoting harvesting is greater control of their natural resources and having the capacity to develop a plan for its management.

Reducing costs of inputs: Another area to consider innovation in food production is related to reducing input costs. Are there strategies that can be implemented that would lower some of the major costs associated with harvesting? Farmers and farm organisations have also been hit hard by rising input costs such as fertiliser, fuel, and pesticides. Some farmers are getting involved in group purchasing arrangements whereby a number of farmers join together to request tender bids to supply the group with fuel and/or other inputs. The idea behind group purchasing is that by pooling volume with one supplier, the group should be able to receive a lower price. These types of arrangements are not always successful and there are drawbacks (e.g., limits choice), but by bulk buying it may be possible for some communities to get more favourable deals for such items as vehicles, weapons, and fuel. The First Nations Buying Group in Manitoba, for example, is charged to obtain corporate discounts for many products and services for approximately 70 per cent of First Nations in that province. In Nunavik and Nunavut, floater suits and high frequency radios have been bought in bulk leading to lower costs per unit than if bought individually.

Greater use of information technologies: While it may seem to be inapplicable, there are opportunities for increasing the use of information technologies in the harvesting process. For example, the Kativik Regional Government's hunter support program has purchased several satellite handsets for harvesters to use when embarking on week or even month long hunting trips. Hunters can now be away from their families for extended periods while having the means to keep in touch or call in the case of an emergency.⁷⁵ Information technologies could also be used to track locations and numbers of wildlife populations, as well as support the sharing of traditional and scientific knowledge among harvesters and with those monitoring wildlife numbers.

Making the Link with Tourism: Increasingly, people are recognising that culture is a major factor affecting people's travel destination plans. Having country food available in local restaurants appeals to tourists. Similarly, many tourists are interested in seeing or participating in harvesting related activities as part of their trip. In some areas such as Nunavut, the promotion of culture is the backbone of the tourism industry. Support for harvesting is therefore an investment in tourism for many Aboriginal communities. The tourism industry would be hit hard if

⁷⁵ Globalstar, "Native Community Turns To Globalstar To Solve Remote Communications Issues"
http://www.globalstar.com/customer_stories:_remote_communities.html

harvesting activities were to greatly diminish.

5 First Nation and Inuit Agri-Food Industry

This chapter provides an overview of the Aboriginal agri-food industry. Specifically, it answers the following questions:

- Is there a demand for commercial country food products?
- What are the products and are there any production constraints?
- How are community operations being supported?
- What are the barriers for expanding commercial operations?
- What opportunities exist to expand commercial operations?

The “agri-food industry” for the purposes of this study includes country food (i.e., wild game, fowl and fish) and processed food products that are primarily connected to Aboriginal history and culture (e.g., wild rice, tea, corn) and which are intended for commercial use including sport hunting and fishing. However, it must be stated that it can be difficult to distinguish between traditional and non-traditional Aboriginal food products. For example, while fishing has been a traditional activity for Aboriginal communities, there has been increasing investment in the offshore fisheries—a new activity for some communities. And some Aboriginal communities, which have not traditionally been involved with wild rice production, are now operating successful wild rice enterprises.

5.1 Overview of Agri-food Industry and Aboriginal Involvement

Canada’s agri-food industry is one of the country’s top five industries accounting for approximately 8.5 per cent of total GDP. Canada’s agri-food exports were over \$23 billion in 2000. Principal markets were the United States (61 per cent), Japan (8.7 per cent), the European Union (5.3 per cent), and Mexico (3.3 per cent). The top five export products were bulk grains, meat and meat bi-products, live animals, oil seeds and seeds, and vegetables.⁷⁶

According to the 1996 Census, 13 per cent of the Aboriginal labour force was employed in the agriculture and agri-foods sector. Unfortunately, numbers are not available on the sale of country food products by Aboriginal people. However, a wide variety of traditional Aboriginal food products are being harvested for commercial purposes. In fact, there is a multitude of successful Aboriginal enterprises processing and selling country food products. Many of the operations are community run and intended to provide a source of economic development for their communities.

⁷⁶ Agriculture and Agri-Food Canada, *Canada’s Agri-food Industry*,
http://www.agr.gc.ca/cb/factsheets/2indus_e.shtml

5.2 Demand for commercial country food

Within local communities, particularly in the north, there is limited demand for commercial country food products as many people rely on family or friends for their supply. Growing populations in many communities and a reduction in harvesting activity could lead to an increase demand for these products. In such cases, country food must be competitively priced, highly visible and available in a variety of product forms to be attractive to local customers.

Outside Aboriginal communities, country food is often seen as exotic and can therefore command higher prices as a niche product, providing it is of high quality. As stated in the previous chapter, purchasing country food in urban centres can be prohibitively expensive.

According to stakeholders and reports from international food trade shows, demand for country food exports has been steadily rising. The United States, Europe, and Asia are the key markets of interest. By way of example, four Aboriginal food producers attended the Anuga 2001 Fair and Trade Show in Cologne, Germany in October 2001—the largest international food and beverage products trade show in the world with more than 144 countries participating. A special “Aboriginal Pavilion” was staged to showcase country foods available for export⁷⁷ and there was a high level of interest in the products.

The federal government (Indian and Northern Affairs Canada, Foreign Affairs and International Trade Canada, Agriculture and Agri-Food Canada and Industry Canada), and Aboriginal organisations have been working together to promote and expand exports of Aboriginal food products. This has included the development of an Aboriginal Export and Trade Directory and participation in an exporter database that links Aboriginal exporters with Canadian trade commissioners worldwide.

There are some international barriers to country food trade such as the European Union’s 15 per cent tariff on imported caribou meat and fish products and the American ban on marine animal products. Yet, it would be unwise to focus attention exclusively on these issues to promote growth in the export sector. For attempts to increase Aboriginal food exports are generally not hindered by these barriers nor by a lack of demand in these markets, but rather by issues associated with the supply side here at home.

5.3 Supply of commercial country food

Commercial hunting has been seen as a source of economic development that allows Aboriginal people an opportunity to apply their traditional skills and knowledge while participating in the wage economy. However, not all Aboriginal people support this view. Some Aboriginal people feel that commercial hunting

⁷⁷ Industry Canada, “Canadian Aboriginal Firms Offer ‘Tastes of Tradition’ at Anuga 2001 Fair and Trade Show”, News Release. Ottawa, October 4, 2001.

runs contrary to traditional harvesting values (e.g., you harvest only what you need).

Others are opposed to commercial harvesting because they believe it provides only minimal economic value with a potential of harming wildlife numbers for sustenance purposes. There can be great fluctuations in wildlife numbers and often we do not have an adequate understanding of the numbers available and whether the population will be naturally increasing or decreasing. In some cases, wildlife populations need to be culled, resulting in opportunities to export meat that might not otherwise be consumed. But the last thing that anyone wants to do is to contribute to a food shortage for the community. The issue of over-fishing on both the Atlantic and Pacific coasts serve as fresh examples of the substantial harm that can occur from over-harvesting for commercial purposes.

Generally, commercialisation tends to be more acceptable to Aboriginal communities when it involves foods that have not traditionally been a mainstay of the local diet. For example, there has been interest by Inuit in Labrador, northern Quebec and Nunavut to export shrimp and turbot. Aboriginal people particularly oppose the exporting of live wildlife unless for accepted research purposes.

In jurisdictions operating under a land claims agreement, such as the Inuvialuit and Nunavut, wildlife management boards determine the surplus available for commercial purposes with the support of hunter and trapper organisations. Quotas are set for local consumption as well as for sport hunting and for commercial operations—the first two taking precedence. Furthermore, the 1990 *Sparrow* decision by the Supreme Court of Canada ruled that after valid conservation measures Indian food fishing has priority over other commercial interests followed by recreational user groups. All game meat taken for commercial sale must be harvested under a commercial licence and commercial quota. Commercial enterprises are usually a collective effort stemming from a community decision to proceed rather than a private pursuit.

Outlined below are examples of commercial country food enterprises operating across the country by Aboriginal communities.

5.3.1 Fish Products

Canada's commercial fishing industry is worth almost \$5 billion per year, providing more than 120,000 jobs to Canadians. The Atlantic Canada fishery accounted for 82 per cent of total landings in Canada in 2000, while the Pacific fishery accounted for 14 per cent of total landings. The freshwater fishery accounted for 4 per cent of total Canadian landings in 2000.⁷⁸

The Department of Fisheries and Oceans (DFO) is responsible for managing the fishery where land claims agreements have not instituted a fisheries

⁷⁸ Agriculture and Agri-Food Canada, *Canada's Fish and Seafood Industry*.
http://www.agr.gc.ca/cb/factsheets/2seafood_e.phtml

management regime. The Department has an Aboriginal Fisheries Strategy whereby it will enter into agreements with Aboriginal communities to manage the fisheries including the setting of fish allocations. Aboriginal participation in the fishing industry has been greatly affected by the 1999 *Marshall* decision, which ruled that local Treaties signed in 1760 and 1761 by Mi'kmaq and Maliseet communities include a communal right to hunt, fish and gather in pursuit of a "moderate livelihood." Consequently, DFO funding is now being used to provide boats, gear, training, and capacity-building and fishery-related economic development initiatives.

Again, while there are no separate figures for Aboriginal fish production, all forms of fish production and processing (fresh and saltwater fish and crustaceans, and aquaculture) are being developed by Aboriginal communities right across Canada from sea to sea to sea.

Offshore fisheries:

Several Aboriginal communities are involved in the offshore fisheries from lobster and scallops to ground fish. As well, the development of emerging fisheries such as clams, scallops and sea urchins may provide a much-needed boost to local economies.

Band organisations receive their licences from the Department of Fisheries and Oceans. For some bands, the issue has been building up the necessary skills (both fishing and administrative) and infrastructure (e.g., traps, fishing vessels) to get underway.

As part of the implementation of the *Marshall* decision, more than 130 fishing vessels have since been allocated to Aboriginal communities and there has been a 174% increase in the number of commercial lobster enterprises owned and operated by First Nations. First Nations now have 10 tuna licences, 5 per cent of the shrimp in Québec, and 7 per cent of the crab quota for the southern Gulf of St. Lawrence and Scotian Shelf. The equivalent of more than 220 fishing enterprises have been transferred to Mi'kmaq and Maliseet communities leading to more than 520 additional seasonal jobs directly in the fishery, with a potential estimated landed value of \$21 million, or almost \$14 million in potential wages and profits for Aboriginal communities.⁷⁹

The shrimp fishery has been developing in Nunavut, Nunavik and Labrador. Katsheshuk Fisheries Ltd owned by the Sheshatshiu and Mushuau Innu of Labrador has been increasing its involvement in shrimp harvesting since 1998. The company owns a fishing vessel and is providing hands-on training for many community members.

In Nunavut, the offshore fisheries have the potential to be a pillar of its economy. Fisheries such as those for shrimp and turbot provide more than 150 jobs and \$5

⁷⁹ Government of Canada, *The Marshall Judgement and the Federal Government's Response*.
Backgrounder. February 2001.

million of income directly into community economies. Nunavut's allocations in the turbot fishery have recently been increased and there is the potential for additional allocations for Nunavut as well. Currently all of the vessels used in the shrimp fishery are from outside the Territory. One of the major obstacles to greater Nunavut participation is the large investment required to purchase vessels. As quota increases are achieved, opportunities may develop to expand into investment in vessels and docking facilities. If this happens, there will be the opportunity to land and process shrimp in Nunavut, which would provide significant employment and business opportunities.

On the Pacific coast, Aboriginal communities that have fished salmon are feeling the effects of reduced stocks and the need to reduce catches in order to preserve the fish. However, many are turning this into an opportunity by utilising innovative techniques (e.g., modern fish wheels, beach seines and mobile traps) to reduce the number of non-target species killed and to learn more about the state of the salmon fishing industry.⁸⁰ There is also a move in the industry to farmed salmon (discussed below) that will likely lead to reductions in wild salmon fishing levels and affect those communities that have been relying on wild salmon production for economic development.

Freshwater fish:

The pursuit of freshwater fish products varies depending upon the region and fish species. In some cases, the stocks are insufficient of supporting a viable industry. In other cases, the species are also available in southern markets at lower costs (e.g., whitefish). Arctic char is a species unique to the north and in high demand in external markets. We heard from several key stakeholders that char stocks can often be overrun due to high demand and over fishing of lakes near settlements, and that any commercialisation must be strictly controlled. For example, the hunters and trappers association in the Iqaluit area recently recommended a ban on fishing for five years in a local river to allow for the char stocks to rise.⁸¹ In fact, it has been suggested that the commercial char industry may have reached its highest level of economic exploitation due to the limited numbers of char.

All freshwater fish in the NWT, Prairie provinces, and part of Northern Ontario must be marketed through the Freshwater Fish Marketing Board. This federal crown corporation has a mandate to purchase all freshwater fish for sale from licensed fishers with the objective of increasing returns to fishers, and to promote markets and export trade in fish. Northern fishers may sell their catch directly to consumers or to licensed fish processing plants within the province/territory. However, any fish sold outside of the jurisdiction requires an export license and must be sent to packing facilities licensed by the Board (e.g., a local fish co-op) and subsequently sent to Winnipeg for processing.

⁸⁰ Eric Poole, "Our Home and Native Fish," *Outdoor Canada*, May 1999, Vol. 27, Issue 4, pp. 26-29.

⁸¹ Miriam Hill, "Iqaluit HTA wants Sylvia Grinnell River closed" *Nunatsiaq News*, December 14, 2001.

Fish Processing:

The processing of fish is also being undertaken and contributing to local employment.⁸² Torngat Fish Producers Co-operative Society Ltd, based in Happy Valley Newfoundland, purchases and processes snow crab, turbot, Arctic char, Icelandic scallops and rock cod for Canadian and international markets.

The largest processing plant in Nunavut is Pangnirtung Fisheries Limited. In 2000, it processed a record 306,178 kilograms of turbot and 24,000 kilograms of char. Pangnirtung Fisheries employs over 50 seasonal employees at its docking and plant facilities. Approximately 90 per cent of their product is sent to markets in the United States. Kitikmeot foods in Cambridge Bay processes arctic char into fillets and jerky. Keewatin Meat and Fish, located in Rankin Inlet, currently sells its fish products in California, New England, and the U.S. Midwest; and in Canada between British Columbia and Quebec. The products are generally sold in high-end restaurants and for functions, ceremonies and feasts held by Inuit elsewhere.

Aquaculture:

Aquaculture accounted for 10 per cent of total Canadian production of fish and shellfish in 1999.⁸³ Aboriginal involvement in aquaculture has been growing. There are several operations in place with more underway. For instance, with the assistance of INAC and DFO, Millbrook Fisheries of the Millbrook Micmac in Nova Scotia is developing an aquaculture operation that will raise 100 tonnes of Arctic char and which will be able to convert fish waste into fertiliser for a greenhouse. However, aquaculture is not without controversy. For Aboriginal people on the Pacific coast, there is great reluctance to move from wild salmon fishing to salmon fish farms even as wild salmon numbers dwindle and farms offer a source of economic development.⁸⁴

Seal products:

Seal meat and other seal products such as seal oil have been experiencing some growth in Asian markets. Natsiq Development Corporation co-owned by Makivik Corporation, Qikiqtaaluk Corporation and Sakku Investments, has received interest to have ringed seal meat and other by-products such as seal oil to be processed and distributed to Asian markets.⁸⁵ Sealskin exports are discussed in

⁸² Assessing the value-added contribution of food processing to an economy's output is rather difficult. For example, the act of catching fish is recorded under the fishing sector. The filleting of that fish is recorded under food processing, but then any kind of distribution would be divided between storage, transportation and wholesaling. Without accurate records, tracking these activities separately is next to impossible.

⁸³ Agriculture and Agri-Food Canada, *Canada's Fish and Seafood Industry*.
http://www.agr.gc.ca/cb/factsheets/2seafood_e.phtml

⁸⁴ John Stackhouse, "Trouble in paradise", *The Globe and Mail*, November 19, 2001

⁸⁵ Dwane Wilkin, "Nunavut Opens Commercial Seal Hunt in Canadian Arctic", *Environment News*, April, 1999. <http://ens.lycos.com/ens/apr99/1999L-04-01-06.html>

the next chapter.

5.3.2 Large Game (e.g., Caribou, muskox, bison and elk)

Commercial Hunts:

Commercial hunts of large game have been occurring over the past several years in areas across northern Canada including the Northwest Territories, Nunavut, Nunavik (Northern Quebec) and Labrador. Large-scale commercial hunting in NWT has increased two-fold since the early 1980s despite the fact that harvested numbers remain low.⁸⁶ Commercial hunting of caribou in northern Quebec has been occurring since 1994 following an amendment of the James Bay and Northern Quebec Agreement giving Aboriginal peoples the exclusive rights to do so. The largest commercial caribou hunt in Nunavut is based in Coral Harbour, located on Southampton Island in Hudson Bay. Some 2,200 caribou were harvested in the 2000 hunt. The Inuvialuit have harvested muskox for export from Banks Island since the early 1980s although it has had its share of interruptions due to relatively poor sales. And commercial muskox hunting in the Cambridge Bay area has been conducted for more than 15 years.

It must also be remembered that there have been times in the past when caribou and muskox numbers have been low, contributing to terrible hardship for families that have relied on them as their principal source of food. However, caribou and muskox currently exist in sufficient numbers to support commercialised hunts. There are approximately 1.5 million caribou in Canada and 150,000 muskox although there is no reliable way to count their numbers. Generally, the numbers harvested are much smaller than the permitted quotas for the region due to limited demand.

The hunts provide a source of temporary employment for approximately 10 to 30 local hunters at a time. The number of animals hunted will depend on the allowable quota (ranging from less than a hundred into the thousands).

Caribou has been well received in export markets while muskox has yet to develop into a niche market. Chief markets are United States, Europe and Asia. There has been little success in pushing these products at a mass level. However, increasing desire for “natural” products including products derived from free-range animals, organically grown products, and less fat meats (such as found with caribou and muskox) may lead to market growth beyond the niche market of exotic meats. Having said this, wild meat production in Canada faces competition from wild or free-range meat products in other countries such as New Zealand red deer and reindeer from the Scandinavian countries.

Most of the demand for caribou and muskox has been for choice cuts so ways to utilise the remaining parts of the animals need to be developed. To this end,

⁸⁶ Leslie Treseder et al., “Commercial Harvesting of Wild Ungulates in Northern Canada”.

Nunavik Arctic Foods has developed a caribou paté product that has been very successful thus far.⁸⁷

A key element of the hunts is the processing of the meat. In many cases, temporary abattoirs are built to process the meat into cuts and jerky. Previously, wild meat was processed in southern centres to meet federal inspection standards. However, processing of caribou and muskox has been undertaken in a few northern jurisdictions over the past several years including Nunavik, Northwest Territories and Nunavut although with varying degrees of success. For example, Kitikmeot Foods, a meat and fish-processing plant located in Cambridge Bay, processes muskox meat that is sold locally and to restaurants in larger territorial centres as well as southern Canadian and U.S. cities. The Keewatin Meat and Fish plant in Rankin Inlet has European Union certification that allows it to export directly to European markets. Consideration has also been given to portable processing facilities that can follow animal herds.

Food safety is obviously an important issue. Most operations need to sell their product outside of their jurisdiction if they want any chance of succeeding. Any meat that is sold outside of the jurisdiction must conform to federal meat inspection regulations. The Canadian Food Inspection Agency sets the standard for agri-food products and federally registered establishments that produce processed meats. Meat consumed within jurisdictions may also be required to satisfy regulations set for that particular jurisdiction (which may be very similar to federal regulations). For example, in the NWT, commercial harvesting is regulated by the Department of Resources, Wildlife and Economic Development (regulations for harvesting, processing, sale and service of game, environmental requirements for hunting operations) and the Department of Health and Social Services (sanitary conditions for preparing and serving food). The federal and provincial/territorial governments have been working on harmonising meat inspection procedures to enhance the flow of meat products across jurisdictions.

Meeting the federal regulations, while necessary, can be very expensive. Communities require the necessary infrastructure and human capital to properly implement them. There are also environmental regulations to follow, particularly in northern jurisdictions, where any industrial operation can have an impact on the local natural capital. For example, how should the animal waste be managed? There are also some logistical difficulties with the regulatory process. For example, inspectors must be available when necessary and this is not always easy.

There are many obstacles with the hunting of these animals that make it quite difficult to develop a reliable meat export on a large scale. Wildlife numbers can be difficult to control and priority will always need to go to meeting local sustenance needs. Because the numbers for commercial hunts are usually

⁸⁷ Interview with Neil Greig, General Manager, Nunavik Arctic Foods., Makivik Corporation of Nunavik, March 11, 2002.

cautiously low for sustainability reasons and hunts are often undertaken on an infrequent basis, the cost per unit to process tends to be high with expensive infrastructure costs.

Furthermore, the success of hunts can never be guaranteed. For example, poor weather conditions have in the past cancelled planned hunts (e.g., the 1998-99 harvest on Banks Island). In other cases, it may be difficult to locate enough animals to make the undertaking worthwhile.

Other problems with the commercialisation of wild meat have included:

- inadequate distribution network;
- limited processing capability;
- lack of information;
- an imperfect track record with regard to product quality and price;
- inconsistency of supply; and
- a lack of an effective inspection system, leaving a less than perfect impression among discerning consumers.⁸⁸

These are serious problems and point to the conclusion that caribou and muskox commercial harvesting have a very uncertain future. Our interviews with key stakeholders suggest that many attempts have been made to make commercial hunts more cost-effective. Indeed, Nunavik Arctic Foods has had to move the processing of its caribou to Montreal in recent years where it can be undertaken more cost-effectively. The company has also cancelled the commercial caribou hunt for the past two years.

Those that are in operation require considerable government support (e.g., through subsidies and investments) and commitment as has been the case in Greenland for many years. Innovative approaches will be needed to move this industry forward if so desired. For example, Nunavik Arctic Foods has produced a paté that has a long shelf life that is more accepting of an infrequent supply.

Wildlife Ranching (Domestication of Wildlife for Food Production):

There are also a number of Aboriginal game farming/ranching operations in Canada although it should be pointed out that not all Aboriginal communities and organisations are in support of this type of venture. The most commonly ranched species are bison, elk (wapiti) and white-tailed deer.⁸⁹ Reindeer have also been ranched by some Aboriginal communities (Tuktoyuktuk and Sanikiluaq). Bison ranching was supported heavily by GNWT until 1995. In 1996, the Manitoba First

⁸⁸J. Colford, *Background of the NWT Food and Meat Industry*.(Yellowknife: Department of Resources, Wildlife and Economic Development. GNWT Departmental Report, 1998) in Leslie Treseder et al., "Commercial Harvesting of Wild Ungulates in Northern Canada"

⁸⁹ Leslie Treseder et al., "The Status of Game Ranching Among Canada's Aboriginal People" *Biodiversity Network-Reports*. <http://cgi.www.biodiv.net/fulltext/canada/english/page6.html>

Nations Elk and Bison Council (MFNEBC) was established involving 17 Manitoba Aboriginal groups. It has been involved with the development and distribution of elk to interested bands.⁹⁰

The management of wild game ranching differs by province (some allow only native game while for others only non-native game could be farmed) but is moving away from a wildlife issue to an agricultural issue. Aboriginal management of game ranching tends to feature less interference with the animals.

Bison ranching has been receiving heightened interest. In 1991, there were 22 bison ranches in Saskatchewan, while a decade later there were 370 ranches. Bison meat is leaner than beef, pork or chicken. As far as exports go, wood bison provides the highest return. However, they are difficult to manage, requiring handling infrastructure.⁹¹

Elk farming in the prairie provinces has received a lot of attention from Aboriginal groups and communities over the past several years given its strong market value in Asian markets (particularly for antlers). However, in recent years, supply has been outstripping demand. Diseases have also ravaged many farm operations. The Alberta Elk Association and the Alberta Whitetail and Mule Deer Association have submitted a proposal to allow hunting on these ranges by sport hunters/tourists.⁹²

5.3.3 Flora and Agricultural products

Aboriginal communities and enterprises have been involved with the complete gamut of flora and agricultural products for many years. Although the Canadian agricultural industry is facing immense change and pressures from within and internationally, Aboriginal communities have been exploring ways in which their traditional produce can exploit food trends such as the desire for organic foods and speciality foods. Below is an overview of some of the types of agricultural and related products being produced.

Wild rice:

Many Aboriginal communities in the northern parts of the provinces, particularly Saskatchewan, Manitoba and Ontario, have taken advantage of their natural capital to develop wild rice production. With the assistance of the Saskatchewan Indian Agriculture Program (SIAP), wild rice production in northern Saskatchewan has flourished. Lac La Ronge and its enterprise Kitsaki Meats is now the largest producer and supplier of organic rice in the world. It has operated

⁹⁰ Ibid.

⁹¹ Sandra Ahenakew, "Building a Home for the Bison to Roam" *Seeds of Success-A Special on First Nations Agriculture*, November 2001.
<http://www.asksask.sk.ca/pdfs/Sof%20S%20FINAL%20Version.pdf>

⁹² "Alberta Urged to Allow Hunting Farms" *The Globe and Mail*, Monday, February 11.

a processing plant since 1983 thereby creating more employment for local citizens. A number of related value-added products such as rice sausages and wild rice flour have been developed as well.

Demand for wild rice is strong in Canada, the United States and Europe. The wild rice industry in Saskatchewan alone now involves approximately 160 producers harvesting about 2.27 million kilograms of crop (1998). However, Canada's wild rice production is small compared to production levels in the United States who set the price for wild rice. Due to environmental regulations, much of the wild rice grown in northern waters has been grown and produced without pesticides and chemicals. This has allowed producers such as Kitsaki Meats to have their wild rice certified as organic and have their product sold to a growing niche market.⁹³

Unlike many other products, a considerable amount of time has been invested into the marketing of wild rice products. For instance, Grey Owl Foods, owned by 72 bands in the province of Saskatchewan, was created in 1989 to market the product in Canada, the United States and Europe. The product is easy to access over the Internet and to place orders. It serves as an illustration of how marketing is an important part of any successful product.

Crop farming:

Although not the principal focus for this study, there are numerous Aboriginal farmers operating crops and livestock in all provinces. Much of the farming (i.e., cattle, milk, grains, and produce) is done at an individual level rather than the community level.

Aboriginal farmers face many unique barriers in addition to those barriers currently being experienced by non-Aboriginal farmers (e.g., input costs associated with farming rose 14 per cent for Canadian farmers between 1995 and 1999). The lack of land ownership on-reserves has been a barrier to farming. Some bands issue "certificates of possession" as a form of ownership but many band councils decide which farmers have access to the land making it difficult to farm on a long-term basis. And many band councils in the past have not viewed farming as a sector in which to invest resources on a community-wide basis. Much of the available arable land is not used for farming or may be subject to unresolved land claims (e.g., NWT). In many cases, the land is leased to non-Aboriginal farmers who farm nearby. Aboriginal people have also experienced problems in securing the necessary financing to enter into farming.

In addition to difficulties acquiring credit, there has been a two-to-three generation gap between the early successful Aboriginal farmers and today's potential farmers. More and more farmers have to compete in the global marketplace—it is not a matter of producing more raw products. More and more large corporations are dominating the food sector. Similar to the general farming

⁹³ Michael Fisher, "First Nation Riding the Wild Side" " *Seeds of Success-A Special on First Nations Agriculture*, November 2001.

population, the number of Aboriginal farmers is decreasing and many farmers don't have anyone in the family interested to assume the farm.

Some Aboriginal communities have been active in producing food for commercial purposes through community greenhouses. Most are only viable for local consumption as high-energy costs make it difficult for mid-northern communities to compete with southern producers. However, there are numerous farming initiatives that are flourishing. For example, Tahgahoning Enterprises on Walpole Island First Nation in southwestern Ontario operates a large collective farm with a board of directors from the community.

Speciality food products: Speciality food products are experiencing considerable growth. Demand for organic food products in Europe is relatively large. The organic food industry has been growing and is a great niche of which many Aboriginal products can take advantage. For example, the File Hills-Qu'Appelle Tribal Council in Saskatchewan has secured lands for the development of organic food products.⁹⁴

There is growing interest in commercial farming of alternative crops such as cranberries and high-end herbal teas for both Canadian and European markets (see Box H). A number of small Aboriginal enterprises across the country are producing tea products and other products such as jams that incorporate an element of Aboriginal knowledge and tradition (e.g., using local berries). As with wild rice, these products are easily marketed on the Internet.

Non-timber products: There is extensive traditional knowledge with grasses and other plant vegetation for medicinal and cultural purposes. Non-timber products (or alternative forest resources) are seen as having significant growth potential. Little attention to date has been given to capitalising on the potential of products such as morel mushroom harvesting. Generally, these activities are

Box H

Iroquois Cranberry Growers

Iroquois Cranberry Growers is owned and operated by the Wahta Mohawks in central Ontario. Since moving to the area, residents of Wahta have been picking and selling cranberries from a nearby bog. The area possesses all the necessary natural capital to support a commercial cranberry operation: a good water supply, a peat base and a sand base. The company began its operations in 1968 and has now become Ontario's largest cranberry farm with 68 acres under cultivation. Several types of cranberry products are produced, such as pure cranberry juice, cranberry sauce, chutney, jam and syrup. In addition, the company holds tours of its facilities and harvesting grounds and holds a cranberry festival as part of a tourism strategy for the community.

Source: Iroquois Cranberry Growers, <http://www.iroquoiscranberries.com/index.html>

⁹⁴ Lisa Nidosky, "Traditional Taste With a Modern Twist" *Seeds of Success-A Special on First Nations Agriculture*, November 2001.

very labour intensive offering substantial seasonal employment opportunities.⁹⁵

5.3.4 Food processing

Aboriginal people have always undertaken food processing such as drying and smoking meat for personal or community consumption. There is a considerable amount of commercial food processing activities now underway by Aboriginal communities as well. Much of it is with the processing of fish and seafood products. For example, the Scowlitz First Nation in British Columbia signed a deal with DFO to establish a fish processing plant in the community. Training will be provided to employees by Maple Seafood Inc. to enable them to operate a federally-approved seafood processing plant. Products from the plant will be distributed to supermarkets and restaurants in the lower mainland area as well as international markets, including the United States, Japan and Asia.⁹⁶

Processing is underway of other Aboriginal food products too. A well-known example is Kitsaki Meats in Saskatchewan. The company, under its Northern Lights brand, produces beef jerky for several markets including sports enthusiasts and tourists as well as grocery stores and foreign markets. The company uses the wood smoking technology to make a product that is healthy and which requires no special storage requirements.⁹⁷ Kitsaki Meats processes its foods in its local federally-approved plant.

5.3.5 Commercial Sport Hunting and Fishing

Commercial sport hunting and fishing in most cases is a larger economic undertaking than the export of commercial food products discussed above. Sport hunting and fishing provides economic benefits through the consumption of a variety of tourism-related services rather than just the food. Figures vary as to the amount of revenues per hunter or fisher but they can easily be in the range of \$3,000 to \$10,000 per person depending on the trip taken. Sport hunting for muskox on Banks Island brought in approximately \$327,000 into the community of Sachs Harbour during 1994-95 from sports hunters.⁹⁸ Not surprisingly, wildlife quotas for sport hunting/fishing often takes precedence over commercial food products for export.

Polar bear hunting in the Arctic can be particularly lucrative. It has been

⁹⁵ Economic Strategy Panel, *Common Ground: NWT Economic Strategy 2000* (Yellowknife: Government of Northwest Territories, 2000), p. 67.

⁹⁶ Indian and Northern Affairs Canada, "Canada and the Scowlitz First Nation Partner in Seafood Processing Plant" News Release, Vancouver, March 8, 2001.

⁹⁷ Heather Sherratt, "Kitsaki Expands Markets for Nutritional Snack", *Circles of Light*, Indian and Northern Affairs Canada, February 2001, No. 9.

⁹⁸ Government of Northwest Territories, Resources, Wildlife and Economic Development, *Muskox Population Status Report*.
<http://www.nwtwildlife.rwed.gov.nt.ca/NWTwildlife/muskox/muskoxtop.htm>

estimated that the polar bear sports hunt is worth at least \$8 million each year.⁹⁹ Even in the case of wild salmon, there is recognition by Aboriginal communities of the economic and environmental advantages of using wild salmon stocks for sport fishing over mass production.¹⁰⁰

5.4 Programs Supporting Commercial Food Enterprises

Government funding programs, agreements and subsidies aimed at supporting commercial food enterprises have been in existence for some time. Some of these programs were initially aimed at supporting individual harvesters but eventually were directed to developing the renewable resource sector as a whole. Between 1979 and 1992, over \$9 million was allocated to commercial fishing and country food development through federal/territorial economic development agreements alone.¹⁰¹

However, many government funding programs are not aimed specifically at the development of commercial food operations but the broad Aboriginal small business sector. Most of these government programs support the establishment of new businesses (preparing a business plan, seed funding, loan guarantees, information, etc.). For example, Aboriginal Business Canada, funded through Industry Canada, provides financial assistance, information, resource materials and referrals to other possible sources of financing or business support.

Other supports include:

- Community Economic Development Organisations (there are CEDOs operating in over 400 communities funded by INAC);
- Small business loans programs (e.g., SaskNative Economic Development Corporation assists in the development of viable Metis business ventures.);
- Funding programs and business support through regional economic development agencies such as FedNor (Northern Ontario) and Western Economic Diversification Canada;
- Agriculture Canada funds a number of Aboriginal harvesting related ventures from community gardens (e.g., The Little Salmon Carmacks First Nation Band community co-operative garden) to youth training programs on trapping. Many of these programs are funded through the Canadian Adaptation and Rural Development (CARD) Program. For example, the Aboriginal Farm Business Management Program, funded via CARD, is a pilot program to provide support to on-reserve First Nations farmers in Ontario; and
- Provincial funding programs such as Quebec's Aboriginal Development Fund to assist in the development of Aboriginal economies.

⁹⁹ Jane George, "Nunavut Scrambles to Help Kitikmeot Bear Hunters" *Nunatsiaq News*, February 2, 2001.

¹⁰⁰ Eric Poole, *Our Home and Native Fish*.

¹⁰¹ Myers, *The Changing Food Economy*, p. 6.

In 1999, Aboriginal Business Canada launched its Aboriginal Business Development Initiative. The program is intended to increase the number of Aboriginal exporters by assisting companies wishing to expand sales into regional domestic and international markets. Its goal is the creation of approximately 900 new businesses and over 2,000 new jobs over five years. The program funds promotion and marketing costs as well as travel to trade fairs and participation in trade missions.

The program is also aimed at improving access to capital by enhancing the lending services of Aboriginal Capital Corporations (ACCs) and Community Futures Development Corporations. Aboriginal controlled developmental lending organisations such as ACCs exist across the country. They inject approximately \$40 to \$50 million in Aboriginal business development per year,¹⁰² some of which supports food production, particularly Aboriginal farmers such as The First Nations Agricultural Lending Association in British Columbia.

Despite the existence of these lending institutions, Aboriginal businesses and stakeholders we interviewed noted that access to capital remains one of the biggest obstacles in doing business.

An Aboriginal International Business Development Committee has been formed to better support Aboriginal businesses interested in trade. The committee is comprised of representatives from several federal departments including Foreign Affairs and International Trade, INAC and Aboriginal Business Canada. The committee has been looking at increasing Aboriginal company interests in foreign trade missions and in its World Information Network (WIN) Export Database.

Both the NWT Development Corporation and the Nunavut Business Development Corporation, funded by their respective territorial governments, provide support to community-based businesses with a commitment to employment creation, economic diversification and stability and the development of economic opportunities which might not otherwise attract private investment. As indicated in the previous chapter, both territorial governments also provide funding for community organised hunts.

5.5 Barriers to Development of Community Commercial Food Enterprises

There are several barriers or limitations to further develop country food production for commercial purposes.

Lack of consensus in some communities to pursue the export of country food: As previously indicated, the commercial production of some traditional foods, particularly meat products, may not be acceptable by all residents. In many cases, the issue is not whether to partake in the activity but to what degree (i.e., how many animals should be harvested, how often, etc.).

¹⁰² Stelios Loizides and David Grenall, *Creating Value Through Corporate-Aboriginal Economic Relationships* (Ottawa: The Conference Board of Canada, 2001), p. 12.

Lack of solid supply base to establish dependable export markets and links: For any commercial enterprise to survive, it must have a dependable product. Food products based on wild animals and marine life is a risky venture since so much is dependent upon natural forces that we cannot control or always understand such as disease outbreaks. Given that priority for wildlife will always be for communities' sustenance purposes, these products can only be exported on a limited scale, thereby increasing unit production costs.

High costs due to lack of infrastructure: A lack of public and business infrastructure is an obstacle facing many northern and isolated communities to do business. This not only includes roads and shipping facilities but Internet access as well. Businesses in northern communities cannot depend on the sealift, yet airfreight for day to day operations can be very expensive. In a world where manufacturers produce goods using a just-in-time inventory system to save time and money, it is difficult, if not impossible, for a firm that relies on a sealift for delivery of inputs to compete in the global market.

Human capital: Although significant progress has been made, there is room for continued improvement in administrative and management skills by Aboriginal people to run commercial food operations. Business skills also need to be upgraded for those community members governing the corporations.

Ensuring a safe product: Food security is a major issue in today's world. A 2001 Ipsos-Reid international survey found that majorities of citizens in 19 of 34 countries believed that their food is less safe than it was ten years ago. "Consumers are at the point where many need constant reassurance about the safety of the food products in the market."¹⁰³ Due to increasing trade of food products around the world, greater emphasis on food regulations is taking place. Disease in any source of food has the potential to hurt many other food sources. Last year's problems with European meat producers and the recent problems with elk in Canada are strong examples of the volatility of the industry. Therefore, anyone involved in the industry can expect to face stringent safety regulations on a country-wide basis—with no exceptions for operators in smaller or northern venues that may face much more difficult conditions such as the lack of infrastructure.

Cost-Effectiveness and Sustainability: Many communities have tried to establish commercial food businesses as a source of economic development. Some have worked while others have not. Some enterprises may be receiving a considerable amount of government grants, particularly for start-up. But what happens if these enterprises cannot be profitable or at least break even after several years in operation? Should they still be supported? From an economic standpoint, such enterprises should be discontinued. A more difficult question is whether to support money-losing operations that still provide skills and opportunity for a community that faces high unemployment. By doing so,

¹⁰³ Ipsos-Reid, *Food Safety a Growing Concern in Most of the World*, Press Release, March 28, 2001

governments are essentially transferring money from the social envelope to the economic envelope with people participating in economic activity rather than collecting social assistance while not acquiring any new skills.

Difficulties in accessing start-up capital to develop businesses: Problems with accessing start-up capital were frequently identified by stakeholders. At the same time, there are a number of government programs designed to assist people and communities to get start-up capital. This discrepancy could either reflect a gap in program funding or a lack of skills to develop appropriate business plans.

The need for land management planning: Some Aboriginal communities may not be able to undertake any significant commercial food operations due to problems in accessing land under dispute or due to conflicting demands over the same land. There is an opportunity cost for using the land and some communities want to know how they can use their land to meet sustainable development objectives. Without a community plan that provides direction for development, communities will be reluctant to invest. The capacity to undertake land management planning is discussed below.

5.6 Opportunities to the Development of Commercial Food Operations

What is the future prognosis for commercial country food products? An analysis of trends in the broader food industry suggests the following food trends are occurring:

- According to Export Development Corporation forecasts, exports of agri-food products are expected to grow between 6 and 13 per cent in 2002.
- There is a growing demand for high-end convenient frozen food products (particularly exotic and “home-made” type foods) available in grocery stores. Related to this is the growing demand for store-prepared meal solutions (home meal replacements or HMR).
- Grocery distributors are constructing stores with larger shelf space allowing for opportunities to market a wider range of products.
- There is increasing concern over food safety including the production of genetically modified foods. Consumers want food products that are considered to be safe and of high quality.
- Consumers are increasingly interested in natural or organically grown foods. Related to this is concern over animal welfare in food production.

These trends play well to the strengths of Aboriginal food products that are suitable for freezing, are naturally developed and high in nutrition. Most Aboriginal harvesting is consistent with organically grown products and processes. Assuming food safety is addressed, demand for Aboriginal food products should be able to grow further.

Although infrastructure difficulties can often contribute to more expensive food products from northern and isolated communities, consumers are willing to overlook this if a unique, quality product is provided and if it is attached with a piece of cultural content. People are willing to pay more for a cultural food product. The key is to ensure the product reflects the culture in its packaging and marketing.

Marketing and distribution can make a difference in sales of products. For those products that have invested in both, the results have usually been good. As stated at the outset of this chapter, opportunities for growth in the Aboriginal agri-food sector can be enhanced most by addressing supply side issues as the demand for these products is strong, particularly if supported with appropriate marketing strategies.

Areas for innovation in the commercial food sector directed at the supply side are as follows:

Wealth creation capacity: Settlement of land claims and treaty entitlement negotiations have given Aboriginal people financial capital and ownership of lands and resources. "They now have the ability to participate in joint venture development projects, become important "customers of choice" for suppliers and consumer goods retailers, and pursue business activity both on and off reserve."¹⁰⁴ Canada's business community recognises the importance in dealing directly with Aboriginal communities as they acquire greater control of their land and resources and express an interest in partnering with others. More and more Aboriginal investors are becoming available to support the development of commercial activities including those in the food sector. In addition, Aboriginal people are more likely to take advantage of entrepreneurial opportunities than the general population.

The development of innovative products: As has been seen with many of the examples, consideration must be given to the strength of the four forms of capital to determine what types of products are most economically viable. A lack of human, natural or physical capital limits certain types of operations. In some cases, this may mean concentrating on sport hunting or fishing and integrating it with tourism opportunities. In other cases, it may mean concentrating on more processed and speciality foods such as the case of Nunavik Arctic Foods with its caribou pate and stews.

Innovative measures to ensure safety of foods that are effective and affordable: Safety has become the primary concern for the agri-food industry. As previously mentioned, Aboriginal and northern communities cannot expect standards to be less stringent for them given the repercussions this would have on other agri-food producers in Canada. Measures must be found that satisfy

¹⁰⁴ Stelios Loizides and David Greenall, *Creating Value Through Corporate-Aboriginal Economic Relationships*, p. 12.

safety regulations that can be easily applied in northern and remote settings. These measures can range from clarifying the applicability of regulations to new methods of cutting and processing game at the hunting grounds.

Greater use of information and communications technologies: As with the production of food for local use, information and communication technologies can provide assistance to the producers of commercial food products. Examples where technology can assist include providing e-commerce capability, improving in the sharing of knowledge between industry members, and better monitoring wildlife numbers for commercial harvesting.

Creating a natural resources plan to guide the development of country food opportunities: As previously mentioned, Aboriginal communities can be faced with developing their lands in several different ways with opportunity costs associated with each option. Commercial food potential needs to be included in any such plan. Geographic Information Systems (GIS) mapping is being used by Aboriginal communities to determine the range of potential resources available (e.g., timber, non-timber products, trapping, etc.) that can be developed in a sustainable manner. GIS uses computer technology to digitally integrate a region's geography, environment, natural resources, and socio-economic characteristics. This provides a comprehensive mapping of a region to support planning and decision making on the impacts of harvesting specific plants, wildlife or resources. It assists in understanding the impacts of different resource decisions and how they interrelate.¹⁰⁵

¹⁰⁵ For more information on the application of GIS to Aboriginal communities, see Michael H. Weiler, GIS "Applications in Aboriginal Claims Research and Negotiations in Canada: Prospects and Problems" in Dedenbach-Salazar Saenz, S. et al (Eds) *50 Years of Americanist Studies at the University of Bonn, Bonner Amerikanistische Studien*, Vol. 30 1998.

6 The Aboriginal Fur Industry

This chapter examines Aboriginal participation in the fur industry, along with potential areas for innovation. In so doing, it answers the following questions:

- What is the extent of Aboriginal participation in the fur industry?
- What programs exist to support Aboriginal trappers?
- What are the future trends for the fur industry?
- What opportunities exist for innovation by Aboriginal participants in the industry?

The fur industry is comprised of several components including:

- 1) trapping/ranching;
- 2) auction;
- 3) processing/manufacturing (tanning);
- 4) design; and,
- 5) retail.

For the purposes of this report, our examination of the industry centres principally on the initial activity in the fur industry—trapping or harvesting wild land and marine animals. This concentration was taken for three reasons. First, the vast majority of involvement by Aboriginal people is in the trapping aspect of the industry. Second, auction houses, fur processing, and retailing are secondary and tertiary components of the industry in which Aboriginal communities have had little involvement to date. And third, the design component is more closely linked to arts or crafts—a subject that will be addressed in a subsequent study. Further to this, little attention is given to ranching, since it goes against the values system of most Aboriginal communities in Canada.

Our research revealed that Aboriginal people do not play a large role in Canada's trapping industry, and even less in the overall fur industry. This does not diminish the importance of hunting and trapping within Aboriginal communities. In northern and remote regions of Canada, Aboriginal people make up the majority of active trappers, and the furs and food obtained from these activities continue to contribute significantly to their community's well being. Due to the isolation of these communities, the preservation of trapping as a full-time pursuit (as opposed to a hobby or past-time) is very important. Therefore, much of this chapter is focussed on activities in these regions where trapping remains a vital component to the economy.

Chapter 4 described harvesting in terms of its contribution to Aboriginal communities' food supply. There is an obvious overlap in harvesting animals for food and for furs. First, sales for pelts are often used to support food-harvesting activities. Second, most Aboriginal people are very conscious of using a harvested animal in its entirety. While there are differences in tastes and

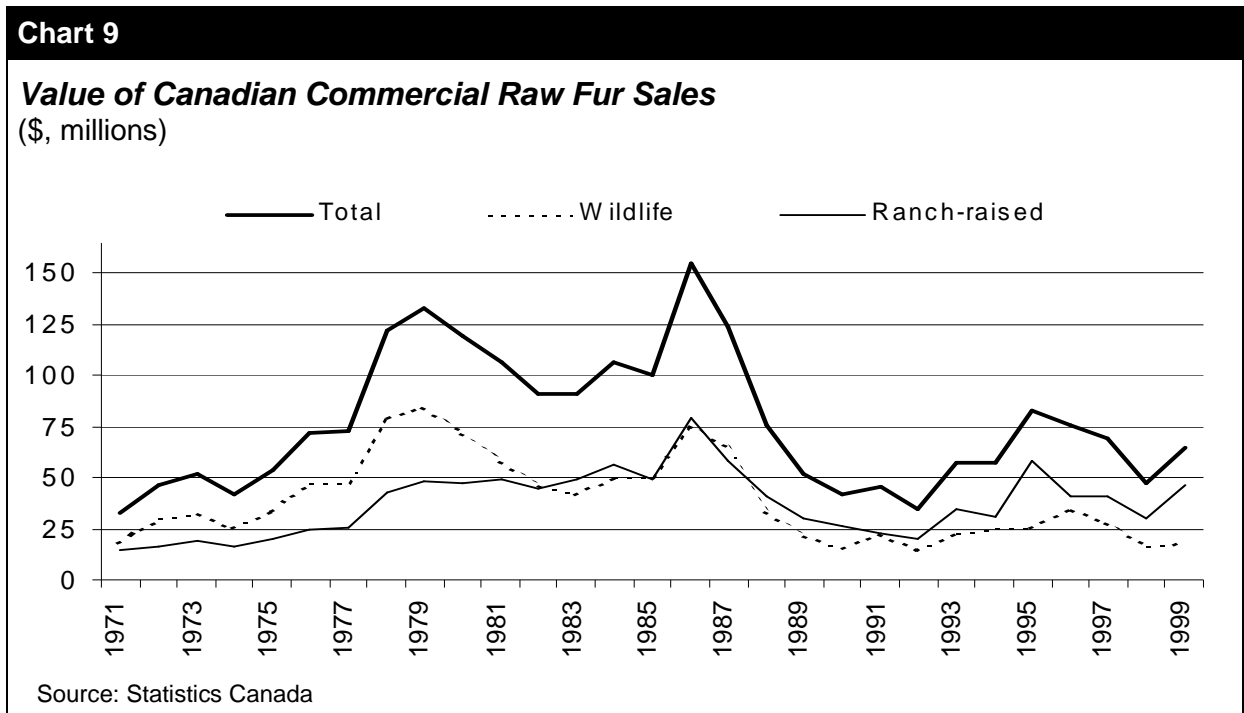
preferences between groups, Aboriginal trappers and their families tend to consume meat from many fur-bearing mammals they harvest. So, in conjunction with the preservation of trapping as a money-making venture for Aboriginal people, it also has the dual role of providing food for families and other community members.

6.1 Overview of Canadian Trapping Industry

The Canadian fur industry has been through some dramatic boom-bust cycles over the past quarter century (see Chart 9). Most commodities in today's global marketplace are traded in the international arena and are therefore affected by international trends. After peaking in 1979 and again in 1986, the value of raw fur pelts sold in Canada dropped dramatically. The international ban on the sale of sealskins, increased competition from subsidised fur ranchers in Europe, and the heavily publicised anti-fur movement in the early 1990s all shared a role in the industry's volatile history. A small turnaround came in 1996, and another is occurring now (2001-2002); however, the industry is a long way from its previous heights.

6.1.1 The Fur Industry

According to the Fur Institute of Canada, the fur industry contributes \$600 to \$800 million annually to Canada's economy. This includes all aspects of the industry, from trapping to retail. In addition to the licensed trappers, the industry



supports approximately 25,000 people working on ranches, in auction houses, as dressers or dyers, manufacturers, wholesalers and retailers.

Muskrat, beaver and marten are the most commonly trapped animals in Canada. In 1996/97, marten made up almost 40 per cent of all furs commercially trapped in NWT. Other animals commonly trapped include red squirrel, fox, lynx, racoon, and coyote. Harvest levels are affected by natural population cycles including prey population cycles.

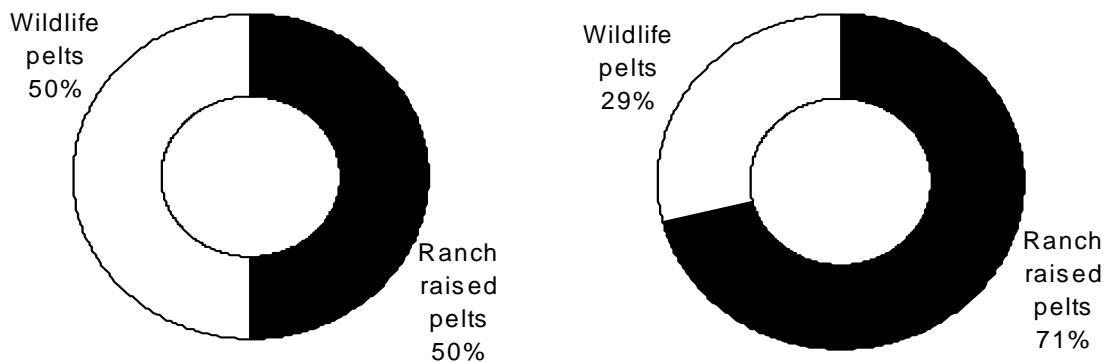
Half of all fur pelts produced now come via ranching. Canada produces approximately 1 million ranched pelts and an equivalent number of wild furs annually, which is quite unusual for the industry. Ranch-raised fur is by far the dominant product throughout the world, making up 85 per cent of the international market. Ranched furs are generally considered easier and more profitable to handle, and are more consistent in their colour, quality, grade and volume. Most ranches are located in Ontario, Quebec, Nova Scotia and British Columbia and primarily farm higher-priced animals such as mink or fox.

Aboriginal groups have not typically been involved in ranching because of their belief that raising animals in confined quarters is an unnatural and inappropriate way to harvest animals. Interestingly enough, much of the European anti-fur movement has been based on the belief that ranching was a more humane way of producing furs. This represents a challenge from a marketing perspective. One strategy has been to promote wild furs as part of a larger all-native product.

Chart 10

Difference in the Number and Dollar Value of Commercial Pelts Produced in Canada

(1999, per cent)



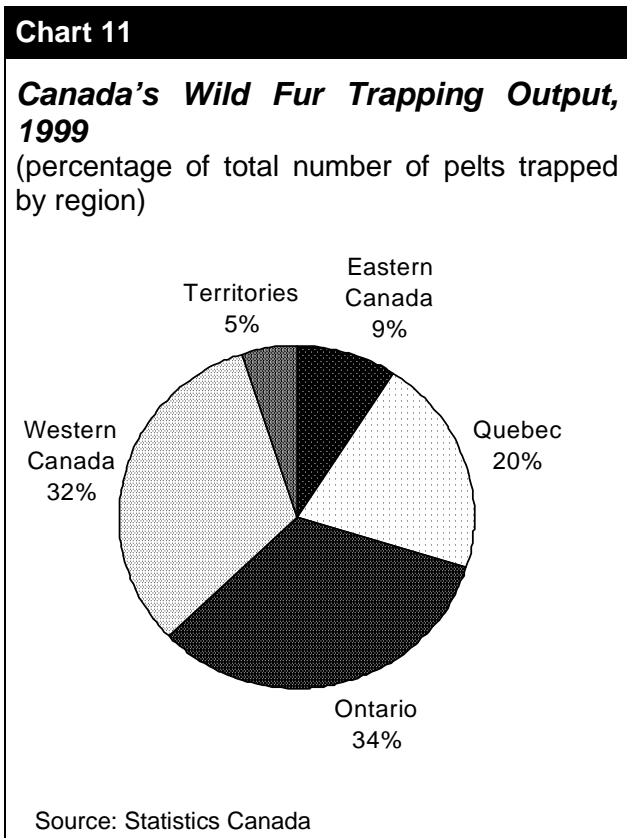
Source: Statistics Canada

The prejudice against trapped furs also means Aboriginal trappers receive a significantly smaller portion of the industry's revenues—although half the furs sold in Canada are trapped, their sale brings in only 29 per cent of the total revenues (see Chart 10). Combined, the export value of ranch-raised and trapped animal furs was \$318 million in 2000, more than double the value in 1992 (95 per cent of all pelts produced in Canada are exported).

Industry experts are now anticipating moderate to strong growth for most fur products such as beaver, marten and muskrat. Increased prices are already being seen for wild muskrat pelts.¹⁰⁶ Principal markets include North America, regions within Europe, and Asia. And while there are growing world markets for naturally produced foods, there appears to be little appetite for furs that were harvested naturally, adding an additional barrier for the wild fur market to overcome. Canada's wild fur industry has responded to this challenge by targeting a growing niche market of people who prefer the look of a wild fur or people who believe trapped furs are ethically acceptable.

While trapping is very important to many northern residents, the majority of trapping occurs in southern Canada with one-third taking place in the St-Lawrence basin in Ontario and Quebec. As shown in Chart 11, over half of all wild fur pelts come from Ontario and Quebec, while another third come from western Canada. Only 5 per cent of all recorded¹⁰⁷ wild fur pelts originate in the northern Territories. The value of pelts sold by region is similar: 48 per cent comes from Ontario and Quebec, 36 per cent from western Canada, and 8 per cent from northern Territories.

According to fur industry officials, there are 75,000-80,000 licensed trappers in Canada with



¹⁰⁶ "Thorunn Howatt, "Fur Prices Are Up", Northern News Service, April 17, 2002.

¹⁰⁷ The value of all trapped pelts is unknown due to the lack of recording by Aboriginal trappers using pelts and food from fur-bearing animals for personal consumption or community barter. This is changing with the introduction of Aboriginal-run wildlife management boards.

approximately half being Aboriginal (see Box I). However, very few of these people participate in the field on a full-time basis. According to Human Resources Development Canada, there were only 2000 people working as full-time trappers in 1998.¹⁰⁸ Aboriginal trappers often hunt and trap according to the confines of their wage-based job. Moreover, many find that their wage-based job provides enough security in terms of food that hunting and trapping are not desired activities. Others find their jobs do not pay enough to participate in traditional activities, which are increasingly becoming luxury past-times in some communities.

All this would seem to indicate that Aboriginal people are not major players in the commercial fur trapping industry in Canada.

Box I

Who's a Trapper?

A trapper is anyone who holds a license to trap. Trapper education is mandatory in all jurisdictions in Canada. Curriculum content includes humane trapping technology, trapper safety, wildlife biology, proper pelt preparation and government regulations and guidelines. The courses are prepared by government agencies in conjunction with trappers associations. Commercial trapping usually occurs in late fall and winter when the fur is in its prime condition.

Source: Fur Institute of Canada

6.1.2 Sealskins

Inuit in Canada are also actively involved in the harvesting of seals and sealskins. Approximately 20,000 seals (primarily ringed) are presently hunted in Nunavut per year by approximately 500 hunters, of which 7,000 are for commercial purposes. This represents a small fraction of Canada's overall sealing industry that features approximately 12,000 sealers in eastern Canada harvesting over 226,000 harp seals in 2001.¹⁰⁹

Up until 1982, Inuit in the Northwest Territories (including Nunavut) sold approximately 30,000-40,000 sealskins each year worth almost \$1 million. The ban on marine animal products in the United States and on baby sealskin products in Europe (even though Inuit sealskins were from mature seals) during the 1980s hit the industry hard. Sealskin sales in NWT went from almost 50,000 in 1977 to less than 1,800 in 1987.

¹⁰⁸ Human Resources Development Canada Job Futures, *Other Fishing and Trapping Occupations*, <http://jobfutures.ca/jobfutures/noc/844.html>

¹⁰⁹ Fisheries and Oceans Canada, *Facts About Seals 2001*, <http://www.dfo-mpo.gc.ca/seal-phoque/facts/facts2002.htm#2000>

Since 1994, the Government of NWT and now Nunavut have paid hunters a guaranteed price for cleaned sealskins of \$30 per seal pelt. In the first year, the Government bought more than 2,000 sealskins. In 1996, over 3,000 sealskins were purchased.¹¹⁰ In 1999, approximately 7,000 seal hides were purchased through the government's fur program and sold at auction.

Most recently, the seal market has seen a renewed interest in its products, particularly in Asia. Auction prices in recent years have been below \$30; but at a December 2000 auction, the sealskin prices reached \$45. And at the December 2001 auction, the price per sealskin had reached \$67 prompting an increase in the guaranteed prices paid by the government to hunters.¹¹¹

The Government of Nunavut launched an aggressive program in 2000 to promote the wearing and use of sealskins as part of its Nunavut Sealskin Strategy. The strategy is based on the sustainable use of sealing predicated on using the whole animal and humane harvesting. Attention has been given to training harvesters to prepare the skins to ensure the highest possible quality. The strategy also involves developing attractive yet functional clothing products both for local and international markets, and focusing on a more aggressive marketing campaign involving the use of models and attending key trade shows. Thus far, the number of skins and seal skin products sold has increased along with revenues for hunters.¹¹²

6.2 Role of Aboriginal Trappers in Canada

According to Statistics Canada's 1996 figures, approximately 15 per cent of all Aboriginal people are employed in trapping or fishing. 46 per cent of all Inuit and 31 per cent of Registered Indians living on reserves are involved in fishing or trapping, while only 13 per cent of Registered Indians living off reserves participate in these activities. Location has a significant influence on whether these activities are undertaken. Most of the licensed trappers in Canada's territories and northern regions are Aboriginal. For instance, 80 per cent of trappers in northern Manitoba are Aboriginal. This percentage is even higher in Nunavut or the Northwest Territories (see Table 3).

Because of the relative importance of these activities for isolated and remote Aboriginal communities, the collapse in fur prices that came about through increased competition and declining world demand had a particularly devastating impact on them.¹¹³ What exacerbated the impact further was the fact that for

¹¹⁰ Lynda Yonge, "Inuit Seal Harvests", *The Wild Times*, Spring 1997.

¹¹¹ Larry Simpson, Editorial: Seal Skins are Back! IWMC World Conservation Trust eNewsletter, January 2002. www.iwmc.org/newsletter/2002/2002-01-03.htm

¹¹² Government of Nunavut, *Nunavut Sealing Strategy*, http://www.nunavuteda.com/members/2001_conf/Tab%20I/sealpowerpoint1/sld001.htm

¹¹³ There are many examples of declining prices, especially in the late-1980s when the initial crash occurred. For example, according to Statistics Canada, the average price of a lynx pelt fell 87 per

Table 3

Aboriginal Hunting and Trapping Participation in Selected Regions across Canada

Province	Estimated Number of Trappers	Percentage of Aboriginal Involvement
British Columbia	3,500	Approximately 50 per cent
Alberta	2,300	Approximately 32 per cent of licenses are currently issued to people living in Métis and First Nations' settlements
Manitoba	2,500	84 per cent of trappers are located in the northern portion of the province, of which 80 per cent of these people are Aboriginal
Northwest Territories	1,800	Approximately 99 per cent of all persons 15 years and over who indicated they trapped during 1998 were Aboriginal according to 1999 NWT Labour Force Survey.

many of these communities hunting and trapping was the only opportunity to earn an income. Non-native trappers have historically been more able to react to the changing environment—trapping less during periods of low prices and more when prices are good. These individuals often possess other income-generating skills and are not solely dependent on trapping for income and food. For instance, in southern Canada, we heard that trappers could make more money in pest control than in trapping for furs. Aboriginal trappers, on the other hand, are more likely to have trapping as their only commercial pursuit—and if not trapping for furs, are still required to trap for subsistence purposes. This keeps them on the trap line, but lowers their only private source of income.

In the late 1980s and early 1990s, the collapse in fur prices forced many Aboriginal trappers onto social assistance, and at that time there were no provisions to allow recipients of welfare to also work on the land for subsistence purposes. The result of this policy was devastating. In the late 1980s after the collapse of the sealskin market, social assistance payments in traditional Inuit sealing communities increased in amounts ranging from 176 per cent to 445 per cent.¹¹⁴ Since that time, governments no longer impose such a restriction on Aboriginal people to engage in hunting and trapping for subsistence purposes, but do require that the individual hold a valid hunting or trapping licence.

It is difficult to understand why anyone would willingly work full time as a trapper

cent (\$605 to \$75 per pelt) from 1985 to 1990 - and as yet, has not recovered. The average price across Canada in 1999 was \$55 per pelt, while in NWT, the *Regular Advance Program* is insuring a price of \$45 for the current season.

¹¹⁴ Government of Northwest Territories, 1994 European Seal Skin Ban Impact. Fact Sheet 4/94. Department of Renewable Resources as quoted in Richard Maraacle, *Impacts of the European Union's Regulation 32594/91 on the Aboriginal Peoples of Canada*, Fur Institute of Canada web site – On-line Resources, www.fur.ca/online_resources/massett.html

during the past 15 years if his or her only motivation were to make money. Quite clearly, money is not the driving force behind the trapping industry. Lifestyle and feeding family and the community are the primary reasons for its preservation through hard times. For example, over half of the trappers surveyed in Yukon indicated that trapping was a way of life rather than a winter job.¹¹⁵ Approximately 50 per cent indicated that less than 10 per cent of their income was derived from trapping, while only 17 per cent relied on trapping for more than 50 per cent of their total income. Thus, the preservation of Aboriginal trapping is less about money than it is about heritage, culture, values, and subsistence.

6.3 The Role of Aboriginal People in Remaining Components of Canada's Fur Industry

There are certainly examples of Aboriginal involvement in other segments of the fur industry beyond trapping; Fur Harvesters Auction House Inc. of North Bay and D'Arcy Moses Design of Fort Simpson are two good examples. But when considered as a portion of the overall Canadian fur industry and its total value, the "Aboriginal fur industry" is indeed limited and concentrated at the lower value component.

Ranching is one possible area of innovation within the industry that was mentioned by some industry experts, but as already stated, this activity offers no opportunities for Aboriginal communities. Raising fur-bearing mammals on a ranch is seen as an inhumane method of handling animals, and goes against most First Nations' and Inuit culture and values. Even without this barrier, the ranching industry often suffers from subsidised competition from other parts of the world, making it a risky and not always profitable venture.

The secondary components to the industry include auctioning, processing and wholesaling (see Box J). As indicated, the Fur Harvesters' Auction House is owned, in part, by Aboriginal people. However, this is the only example, and the auction industry requires high volumes in order to turn a profit and attract top buyers. Bigger often means better reputation in the fur auction business, which translates into higher prices. Therefore, any segmentation of the industry would not likely result in increased profits for an Aboriginal operation. As it stands, most of the furs sold in Canada are auctioned through Vancouver or Toronto, where Canada's best known and biggest auction houses are located.

Processing is perhaps the one component of the industry that is being explored seriously for greater Aboriginal involvement. Properly preparing a fur before it is sent to a dealer or auction house can greatly influence its value. There are a few government programs and strategies underway that are aimed at keeping pelts in the community (through local purchasing and tanning initiatives) so that more of the value added steps remain in the hands of Aboriginal communities. Because of the active promotion of an "All-Native Product", it might be possible to pass the

¹¹⁵ Yukon Government, *Trapping in the Yukon: Results From the Trapping in Yukon Survey*, April, 1997.

additional cost of small-scale processing onto the consumer if marketed correctly. This strategy would also allow for greater opportunities for Aboriginal designers. However, there are many environmental issues involved with commercial tanning (i.e., the use of potent chemicals).

With respect to processing sealskins, a seal tannery was in operation in Qikiqtarjuaq, Nunavut until 1994. Consideration is being given to reopening it.

Box J

Where do pelts go after harvested?

Some pelts are kept by the trapper, hunter or sealer for their own personal use. But those pelts intended for commercial purposes need to be processed (i.e., tanned) and manufactured into consumer fur products. Normally, pelts are shipped to auction houses where they are sold to fur brokers. Trappers either ship their tagged pelts to the auction house or an organisation such as a band office or government program will pay the trapper the estimated market price for the pelt with a guaranteed floor price. If the fur goes for a higher price at the auction, the trapper receives a second payment to make up the difference. The trapper must pay a royalty to the province upon sale. There are only three auction houses in Canada, one of which is the Fur Harvesters Auction Inc. of North Bay. This particular auction house is co-owned by Aboriginal interests.

Once purchased, the pelts must be softened and cleaned prior to manufacturing. There are Aboriginal methods for tanning including the use of deer brains. However, most pelts are shipped to specialised tanneries in southern Canada where industrial chemicals are used. Once tanned, the pelts are sent to garment manufacturers, most of which are based in Toronto and Montreal, or to international centers. From there, the furs are sold as final products to retailers.

Source: International Fur Trade Federation; <http://www.iftf.com/about.asp> International Fur Trade Today

Community members are being trained to tan the hides so that the skins do not have to leave Nunavut for tanning, making it easier for local arts and crafts manufacturers to access. In Greenland, approximately 80,000 skins are purchased annually by the government's tanning and production centres (Great Greenland A/S), which subsidises the purchase of sealskins. There are also production centres that manufacture fur coats for export.¹¹⁶

Retailing is the final activity in the industry, but provides little opportunities for Aboriginal business. A fur retailer requires an enormous amount of financial backing in order to withstand prolonged downturns that are common in the industry. Also, a furrier requires a very large and wealthy market in which to operate successfully. In Canada, retailers who have been in business for generations and have a loyal customer base currently occupy these markets and it would be difficult to lure these customers away. And finally, few Aboriginal people wear designer fur coats. They are not considered traditional dress and even if they were, their cost is far too dear for the average Aboriginal family.

¹¹⁶ *This is Greenland*, Trade and Industry. www.greenland.dk/trade.htm.

Therefore, an Aboriginal retailer could not count on much in the way of patronage business.

Retailing on a small scale may have an opportunity to succeed if marketed correctly. Communities that attract a significant number of tourists may have an opportunity to sell their goods to them. For instance, the 13,000 Japanese tourists travelling to Yellowknife in the winter to see the Northern Lights might be perfect candidates for an Aboriginal-made fur coat. Research and increased marketing is required to determine if this market or any other exists.

In addition, There is a local demand for affordable fashion products made from traditionally tanned furs and skins. Traditionally tanned products are normally warmer and better suited for northern conditions than furs from specialised tanneries in the south. This local demand is for both traditional style clothing as well as new fashion designs.

6.4 Trapper Support Programs

Many of the harvesting programs discussed earlier also apply to Aboriginal trappers. However, there are several fur specific programs operating in Canada. Most are designed to facilitate payment to trappers for their furs, assist with cash flow difficulties, or finance equipment upgrades. For example, the *Fur Price Program* provided by the Government of Nunavut and the Government of Northwest Territories provides grants to harvesters in the form of a guaranteed minimum price for selected species of fur. The payments are often made in the fall when trappers require cash the most to prepare for the upcoming season. The CORDA program mentioned in Chapter 4 provides transportation for trappers in the western James Bay region to reach their trap lines. The Alberta Trappers Compensation Program provided \$66,000 in 2001 to trappers who incurred trapping losses due to industrial activity, theft, and vandalism, as well as for cabins destroyed in naturally caused forest fires.

The Makivik Corporation and the Kativik Regional Government in Nunavik provide financial support to trappers and sewers in the local communities. Makivik purchases furs from hunters and sells at a discount to local sewers who then use the furs to manufacture clothing. The clothing is then purchased by the Kativik Regional Government and sold in local stores to residents. The corporation also provides gas subsidies to support trapping and hunting activities.¹¹⁷

Several provincial and territorial jurisdictions and other governmental organisations in Canada provide grants to inventors working on the development of humane trapping devices. For example, the Government of Northwest Territories runs a program that provides trappers with new humane traps in

¹¹⁷ Makivik Corporation, "Makivik Corporation Creates \$1 million Fund to Spur Economic Activity and Job Growth in Nunavik", February 25, 2000.

exchange for old leg-hold traps. Hunters and trappers organisations may also receive funding to oversee the management of trapping practices for their area.

The Government of NWT also announced in its 2001 Budget a \$150 one-time rebate for trappers who harvested at least \$500 worth of fur in either of the last two trapping seasons to cover some of the costs involved in trapping.

In addition to direct income support programs, training and education have become an important focus in many regions aimed at supporting the future existence of the industry. The Inuvialuit Development Corporation contributed funding to Aurora College's *Fur Garment Program* in Tuktoyatuk and Aklavik. Also, their Land Claims' Agreement provides for the creation of hunters and trappers committees to oversee the local trapping industry.

There is a fear in many Aboriginal communities that young people are losing the skills and knowledge as well as the interest needed to live off the land for the purpose of income generation and subsistence (see Table 4). In response to this concern, the Department of Resources, Wildlife and Economic Development in the Northwest Territories ran a demonstration apprenticeship program in Fort Resolution (2000). Select students were given classroom instruction followed by a week of hands-on training in the bush under the guidance of an experienced trapper. Plans are now being made for similar programs in the Inuvik and Sahtu regions.¹¹⁸ Other programs in the Territory are rooted in child development. The "Take a Kid Trapping" campaign is aimed at getting children off the streets and onto the land to provide them with an opportunity to gain some traditional knowledge that will first and foremost build confidence and provide lifelong skills and an appreciation for the outdoors. Subsistence living and full-time employment are only a secondary concern for this program.¹¹⁹

The Government of Northwest Territories has also been actively promoting a fur marketing strategy under the name "Genuine Mackenzie Valley Furs" that distinguishes the high quality of wild furs trapped in NWT from fur products trapped in other jurisdictions. The idea is to gather all NWT furs at one auction house—the Fur Harvesters' Auction in North Bay—in order to deliver a product that can be consistent and reliable. The long-term plan is to move more phases of production north, in order to capture greater portions of the value-added industry.

¹¹⁸ Brad Heath, "On the Rebound", *Prospects North*. NWT Chamber of Commerce, Yellowknife, 2001. Page 58.

¹¹⁹ Interview with John Colford, Resources, Wildlife and Economic Development, Government of Northwest Territories, January 28, 2002.

Table 4

Graduates Plans After Secondary School, 1996

(per cent)

	Nunavut		Northwest Territories	
	Males	Females	Males	Females
Working	44	35	27	18
Unemployed	7	6	4	5
Self-employed	5	3	3	2
Attending College	11	23	21	24
Attending University	23	28	33	46
Leading Traditional Lifestyle	4	0	2	0
Other plans	5	3	8	4

Source: Health Behaviours, Attitudes and Knowledge of Young People in Northwest Territories, Technical Report, Department of Education, Culture and Employment, GNWT, 1996.

Finally, there are programs to support research into the sustainability of fur trapping. For example, the First Nations Furbearer Monitoring Project, funded by Human Resources Development Canada, will employ local First Nations trappers and youth to gather data to monitor the population density of fur-bearing mammals in Yukon's Kluane National Park.

6.5 Barriers and Opportunities for Growth and Innovation

One of the most difficult problems faced by program co-ordinators, marketers and wholesalers of wild furs has been supply. To build any market, a seller must be able to ensure a reliable and consistent product. With the average age of Aboriginal trappers between 55 and 75 and the current lack of interest from young people to trap as their principal form of livelihood, the programs aimed at promoting Aboriginal-trapped furs could be in jeopardy in the coming years because of a lack of product.

There are also environmental concerns. Information on wildlife numbers tends to be inconsistent, if available at all. The example used earlier is that of beaver in the James Bay region. The local community has now exhausted its supply, and is importing beaver meat from non-native trappers in other jurisdictions. Clearly, the beaver pelts harvested from this region are currently at their limit. We see an increased role for wildlife management boards that are co-managed by Aboriginal groups as well as other wildlife experts. There is a need for close monitoring of wildlife populations and the population of the communities they support.

There have been enormous changes in the trapping devices used in Canada and in other countries due to international agreements on humane trapping standards. In response to a European Union regulation banning the import of pelts and manufactured goods from countries using leg-hold traps and other

traps not considered humane, Canada signed the International Agreement on Humane Trapping Standards (IAHTS) in 1997 with the European Union and Russia. The Agreement came into effect in 1999 and established a process to test and approve current traps against the standards identified in the Agreement. The Agreement applies to beaver, muskrat, otter, badger, marten, fisher, weasel, racoon, wolf, coyote, lynx, and bobcat. Traps are to be tested by June 2004 to determine if they meet accepted standards. Effective June 2007, all traps will need to be certified as meeting accepted international standards (unless no new acceptable trap to replace them can be agreed upon). New trapping devices must be efficient and humane (e.g., quick time limit to render the animal irreversibly unconscious). Federal, provincial, and local officials have been meeting with trappers and other stakeholders regarding the new international regulations.

The new standards are an initial barrier due to the high cost of replacement; however, they also represent an opportunity from a marketing perspective. Much of the anti-fur sentiment was derived from the use of inhumane traps. With their replacement should come an opportunity to educate the market on the changes and re-open some doors that have been closed for 20 years.

6.5.1 Future Trends and Innovation

It became apparent through our research that most promotional programs dealt more with the preservation of hunting and trapping as a traditional knowledge area within Aboriginal communities than they did with furthering the trapping industry. While some pockets of expansion exist, much more is being done to provide greater marketing opportunities for existing trappers and ensure their knowledge is preserved than there is to attract a significant number of newcomers. We found little evidence of any untapped areas for growth in wild fur trapping among Aboriginal people on a commercial basis:

- Demand for furs remains volatile—The State of Washington recently became the fourth state to ban trapping despite the fact that it is home to the Seattle Fur Exchange.
- Competition with ranchers and fur producers in other countries is strong. Ranching, which is predominantly done in the south by non-Aboriginal people, is a competitive threat to wild fur trapping. Ranches have the ability to produce furs on a mass scale lowering the price of all furs—wild and ranched.
- There are fewer Aboriginal people entering the trapping sector as the main form of employment. As one government official stated, there are simply too many other employment options for the young adult population to pursue, many of which are organised around a 9 to 5 work day and which fit better with formal schooling needs of their children. Trapping will remain as a secondary source of income for the vast majority of Aboriginal trappers. Unlike non-Aboriginal trappers, trapping activity is influenced less by fur

prices given than it is part of the overall harvesting process and the high reliance on country food and its role in connecting people to the land.

- The number of pelts taken is subject to the availability of the wildlife population, which is usually cyclical. Harvesting fish and game for commercial purposes will always be secondary to traditional uses of wildlife by Aboriginal people.

Human Resources Development Canada's (HRDC) Job Futures 2000 identifies those sectors with the greatest potential for employment in the coming years. In terms of wage employment in the fur industry, limited growth is expected. Despite our assessment for limited growth, we believe there are several areas within the Aboriginal fur industry that can benefit from innovation to increase the value of pelts and potentially increase income for participants. These areas include:

- Greater marketing/public education (i.e., the public in the export markets) of the natural way of trapping by Aboriginal people and how the acquisition of pelts is part of a larger process in which all of the animal is used with no waste. A successful example appears to be the re-emergence of demand for sealskin products following the Government of Nunavut's aggressive marketing campaign based on quality and sustainable development.
- The development of new products and product lines for export. A good example is the use of exotic fibres such as qiviut from muskox (see Box K).
- The development of publicly acceptable trapping devices. Aboriginal people have extensive knowledge on humane trapping techniques and should be

Box K

Qiviut: The Growth of Exotic Fibres

Exotic fibres are increasingly being seen as an area of growth over the next five years.¹²⁰ Llamas, alpacas, sheep, angora goats, bison and muskox all fall into the category. Combined, they are generating \$8.8 million in fibre sales across Canada. World-class designers are looking to fibres such as mohair and bison down to create new fabrics for their clothing. Included in this emerging market is qiviut, the wool fibre from muskox. Although most qiviut sold to designers comes from farmed muskox, there is potential for Canada in this niche market since this country is home to 75 per cent of the world's muskox herd. As it stands now, there are very few muskox farms in the world.¹²¹

Other opportunities for muskox-related products exist. For instance, Muskox Leather Incorporated of Yellowknife was established in 1998 to develop a market for muskox leather. The corporation is co-owned by the Northwest Territories Development Corporation and the Inuvialuit Community Economic Development Organisation. The company purchases tanned muskox leather for resale as either tanned leather or a finished product. The year 2000 was the first full year of operations, with the company purchasing 1,450 hides from the 1999 harvest.

¹²⁰ Agriculture and Food Council, *The Catalyst* (www.agfoodcouncil.com/resource/fall01.shtml) Alberta, Fall, 2001

¹²¹ Purvis, Mifi, "Home on the Range", *Up Here*, Canadian North Magazine, Jan-Feb 2002.

able to capitalise on this area of research.

- The development of affordable fashion products for local markets.
- The development of better preparation and handling of raw furs at the trapper/hunter level to increase quality and subsequently the price received by the trapper.
- Greater use of innovative purchasing practices, such as bulk buying, for hunting and trapping related equipment.
- Greater use of information and communications technologies. Hunters and trappers appear to operate more on a “word of mouth” basis than through electronic networking as found in the United States. American hunter and trapper organisations are well connected and appear to have developed a culture of sharing information electronically. There are also very few Canadian websites where one can purchase Aboriginal fur products compared to United States, particularly Alaskan products. There may also be some gains made through a first-class, highspeed satellite system that allows hunters and trappers to check prices, regulations and weather forecasts. Such an idea was put forward in the Government of Northwest Territories *Common Ground* report, but is prohibitively expensive.
- The development of cost-effective processing methods (e.g., tanning) that can be undertaken at the local level to produce both a better quality product as well as contribute to a true *bona-fide* Aboriginal fur industry whereby more of the process and value-added inputs are undertaken at the community level. As such, this could help contribute to the development of the Aboriginal crafts and fashion industry that is seen by many as having considerable economic and cultural potential.

We also believe that there is a potential for innovation in the management of wildlife through greater management control by Aboriginal communities. The Assembly of First Nations passed a resolution at its July 1999 Annual General Assembly calling for greater inclusion of First Nations in the implementation of international fur trapping standards in Canada and their socio-economic impact on First Nations’ communities.¹²²

While direct trapping-related jobs will be limited, there is some promise for other sectors that can draw upon the skills acquired in harvesting and trapping. Harvesting skills could serve as a solid base and link for those Aboriginal people wishing to apply traditional knowledge with wage employment. For example, it is expected that there will be substantial growth in jobs related to the environment over the medium term (see Table 5). It is clear from this table that a high degree

¹²² Assembly of First Nations, “International Fur Trapping Standards – July 23, 1999” Resolution. Annual General Assembly, July 20-23, 1999.
<http://afn.ca/resolutions/1999/aga%20resolutions%201999/res16.htm>

of skills are required if one wishes to work on the land in the wage economy.

Table 5

Examples of Specialised Occupations related to the Environment
(organised by educational requirements)

University	College/Technical	High School or less
Biophysicist	Air quality specialist	Landfill equipment officer
Agrologist	Environmental technologist	Sylviculture and forestry worker
Forest management	Pollution prevention officer	Aquaculture and marine harvesters
Specialists in geomatics	Soil technician	
Geologist	Watershed officer	
Geographer	Environmental inspector	
Hydrogeologist	Hazardous materials officer	
Environmental engineering	Wildlife conservation officer	
	Forestry technologist	
	Regulations officer	

Source: Human Resources Development Canada: Job Futures: Emerging Sectors and Occupations: New Work: Opportunities

7 Overall Conclusions/Calls to Action

7.1 Overall conclusions

This report provides an overview of two important sources of traditional economic activity for many Aboriginal communities: country food production and the fur industry. This study was not confined to a single region or activity, but rather considered activities throughout the country. This enabled our research to consider a multitude of innovative practices, and gain greater understanding of the many challenges and opportunities facing Aboriginal groups all across the country.

While food security and food safety are becoming a more prominent issue around the world due to environmental concerns and enviro-terrorism, the notion of communities becoming more self-sufficient with food has not been seen as an important public policy issue in this country. Food production is often overlooked as a source of economic development be it for local consumption or for commercial opportunities. This could be due to several reasons:

- attention for economic development is often given to larger, more visible projects;
- the food supply is often seen as more of a private matter than a public policy issue;
- numerous efforts to commercialise country food have already been tried and found to be unprofitable or too costly to maintain; and
- many Aboriginal communities see food security and trapping as a subset of efforts to acquire greater control over land and wildlife management rather than an opportunity for community economic development.

We suggest there are still several reasons for country food production and consumption to be pursued as a legitimate public policy priority. First, on purely economic grounds, country food consumption reduces the reliance on costly food imports, particularly for those families surviving on low or moderate incomes. The high cost of imported food is a serious concern for many northern and isolated communities.

Second, there appear to be significant health advantages in a diet rich in country food. Country food has been linked to lower levels of heart disease and other types of health conditions. Contrary to this, poor diet and inactivity can lead to serious health conditions such as diabetes, which places considerable stress on publicly funded health and social programs.

This health advantage receives little recognition in public policy circles. For example, *The NWT Health Status Report – 1999* provides a comprehensive examination of the health and health practices of NWT residents. While the report speaks to physical activity levels, it says very little about the NWT's'

historical reliance on country food and the issue of increased reliance on southern processed foods. We recognise there is concern in some communities over the health and safety of country food sources such as fish and other marine animals. However, these sources remain a healthy choice for residents and education efforts may be required to inform the public of the low risks involved in its use and consumption.¹²³

A third legitimate reason for supporting harvesting as an important public policy priority is its contribution to the social and cultural fabric of Aboriginal societies. Harvesting develops human capital. It provides activities for young people while developing important skills that can be applied to future wage-based employment or more traditional pursuits.

Call To Action

- Governments and other stakeholders recognise the value of food autonomy and food safety for rural, isolated and northern communities as a legitimate public policy and economic issue.
- Governments and other stakeholders recognise the health benefits of country food and support efforts to promote its consumption.

Our study began with a look at the state of four forms of capital required for economic growth: human capital, natural capital, economic/physical capital and social/organisational capital. Many Aboriginal communities (but not all) have access to natural capital. Acquiring management of natural resources and the threat of environmental contamination are the biggest natural capital issues for most Aboriginal communities. While there have been deficiencies in the human, physical and social forms of capital, the trend has been toward steady improvement in all three. We believe that the current increase in population for most Aboriginal communities could lead to an increase in demand for country food and place a major strain on its the natural capital (food supply) and physical capital of communities, thereby threatening its food autonomy.

This analysis included an overview of the values held by many Aboriginal societies related to harvesting and country food production. Among the values most strongly held include a commitment to sustainable development, a collective approach to economic development, harvesting wildlife populations in their natural environment, and priority of country food for sustenance purposes over commercial pursuits. It was noted that there is little general survey data available on the attitudes of Aboriginal people regarding issues affecting their communities such as how much harvesting is valued by today's Aboriginal societies, particularly its young people.

¹²³ Still, the adoption of healthy market foods must also be considered since not everyone will eat country food.

Chapter 4 looked at the state of country food harvesting—both demand and supply—for sustenance purposes. It is safe to say that country food consumption remains significant for most northern and isolated Aboriginal communities. Participation levels in harvesting also remain high. However, it would appear that demand has been decreasing by those with higher levels of formal education and income. At the same time, there are a number of pressures on the supply side such as a decreased availability to harvest and the loss of necessary skills to harvest. Increased costs incurred to harvest limit opportunities to participate for people on low and moderate incomes. In some communities, harvesting appears to be becoming less of a livelihood and more of a leisure activity around wage employment, affecting the type of harvesting undertaken and changes in the organisational capital of communities that have been traditionally organised around harvesting.

Programs to support harvesting by Aboriginal people vary across the country. There are a number of harvester support programs in the North. In some cases, these programs are small and fractured into a number of sub-components with little knowledge of their effectiveness. These programs also have to keep up to date with changes in harvesting practices themselves. There are few programs provided by the provinces specifically aimed at supporting harvesting with the Canada-Ontario Resource Development Agreement being the obvious exception. Assessing the effectiveness of these programs depends on the criteria used to assess what is effective. The program evaluations obtained for this study suggest beneficiaries find the programs to be of great assistance to them. For example, a review of the Nunavut Hunter (Harvester) Support Program found that an overwhelming majority of harvesters and stakeholders in the communities found the program was meeting its objectives. A main concern remains defining the target group for the program to ensure those people who truly rely on harvesting receive assistance.¹²⁴ These programs do appear to be helping a segment of the population including elders and those that are tied closely to harvesting activities. Despite the existence of these programs, several stakeholders informed us that many harvesters are still finding the cost to harvest to be prohibitively expensive.

Given its importance in the lives of many Aboriginal people, some researchers and academics have called for recognition of harvesting as an occupation or a form of self-employment. There have also been calls, such as that by the Royal Commission on Aboriginal Peoples, to revamp social assistance programs into harvesting support programs to legitimise and encourage harvesting activities.

¹²⁴ Consilium and Qikiqtaaluk Corporation, *Recommendations to the Board of Directors of Nunavut Tunngavik Inc. on the Nunavut Hunter Support Program*, October 1998

As has been outlined in this report, the James Bay Cree and Inuit of Nunavik have adopted innovative strategies to overcome the barriers to harvesting. The approach thus far with programs has been to apply funds to the greatest number possible. Consideration may need to be given to investing in fewer but more active harvesters so that they can be more productive. This could include such things as increased professionalisation of hunters.

Call to Action

- Innovative arrangements need to be considered to support changes in harvesting approaches. These arrangements may be quite different than previous approaches to address the trends taking place within harvesting (i.e., reduction in harvesting intensity by people below the age of 45 years and the shift to harvesting as a leisure activity).

At the outset of this analysis, the issue of whether communities should invest in exporting country food versus local consumption to reduce import replacement was considered. Upon review of the issues, the matter is clear—communities place greater priority on country food for sustenance purposes. Commercialisation should occur only when there is a clear excess of supply. And even then, priority is usually given to sport hunting/fishing given the amount of new money these activities generate in the community.

Stepping back for a moment, one can see that a great deal of experimentation has taken place with commercial wild food production, particularly meat and fish, and in trapping over the past twenty years. There is now a prevailing attitude of “been there, done that” by many experts in the field in terms of looking at different possibilities for commercial enterprises. Most attempts have encountered the same obstacles beginning with a lack of control over the natural elements complicated with a lack of infrastructure and high costs to properly manage the hunts in meeting food safety standards. Even the recent NWT report, *Common Ground*, noted that commercial opportunities linked to traditional pursuits have been limited.¹²⁵

So, are there any opportunities left to uncover for commercial food? We believe that enough changes have occurred to provide opportunity for commercial development. Many of these changes arise from improvements to human capital and social/organisational capital. First, Aboriginal people continue to improve their educational and business skills necessary for economic growth. Subsequently, household income is rising, resulting in the growth of an important consumer market for country food products both within Aboriginal communities and in urban centres. Third, many Aboriginal people and their institutions (social capital) have accumulated considerable financial wealth that can be used to

¹²⁵ Economic Strategy Panel, *Common Ground*.

support investment. Increased business skills and investment capital will be required to develop country food products that are more economically viable.

Call to Action

- Attention be given to product development for a range of cost-effective commercial products for different kinds of markets (e.g., Aboriginal people living in urban centres).

Aboriginal agri-food producers face stiff competition from producers in Canada and around the world. However, food trends suggest that Aboriginal products are very consistent with prevailing consumer attitudes. For instance, there is a demand for products that are naturally and organically grown using traditional knowledge.

Call to Action

- Attention be given to certifying products as "natural" or "organic" where possible and that the cultural and traditional knowledge be incorporated as much as possible to the product for other markets.

The Aboriginal Agri-food industry must not be viewed in isolation of other industries, particularly tourism. Environmental and educational tourism and community activities such as food production used to be viewed as two distinct things. Now they are seen as compliments to one another. Opportunities to observe harvesting activities and the production/processing of country foods contributes to the cultural and natural package that tourists are looking for.

Call to Action

- Country food harvesting and other traditional economic activities must be considered an integral part of a tourism strategy for Aboriginal communities.

Our assessment of the Aboriginal fur industry indicated that very few Aboriginal people could make a living solely from trapping. It is a lifestyle choice that fewer and fewer Aboriginal people appear willing to make. While ranch furs have become a dominant supplier of furs, the "natural" form offered by wild fur trapping will still be in demand and could grow somewhat if the consumer moves to naturally produced goods. A common suggestion we heard is that higher prices for pelts could be received if the fur pelts were in better condition prior to auction. There is also potential in the design end of fur products by Aboriginal people.

In the case of sealskins, there has been a recent upsurge in demand. No doubt the Government of Nunavut's aggressive marketing strategy has played a role in this positive change. The campaign focussed on quality and the sustainable development approach used in sealskin harvesting.

However, just as with food autonomy, the ability to produce clothing for local use should not be sacrificed for the sake of exports. Efforts need to be encouraged to develop affordable fashion from furs and skins for local use. Traditionally tanned skins and furs are often warmer and better suited for northern conditions but require skills that need to be passed on from elders to the younger people.

Call to Action

- Attention be placed on marketing the sustainable and cultural approach taken by Aboriginal fur and sealskin harvesters, on improving the quality of wild pelts produced, and in the design of Aboriginal clothing styles.
- Efforts be directed towards providing young people with basic harvesting skills either through community organisations or through the school system as part of an educational strategy.

7.2 Strategies to implement the findings of the study.

*Aboriginal people must have stewardship of their economies; be able to plan the development of their economies, develop the projects, implement them, monitor them and change them if necessary.*¹²⁶

The previous section provided a summary of the main findings and identified specific strategies for the Aboriginal agri-food sector and the Aboriginal fur industry. This section addresses broader issues that we believe are necessary to implement the above findings and which deal with the four forms of capital. As noted, economic development cannot be created in a vacuum—a community needs assets, comparative advantages, entrepreneurs, and an administrative capacity to achieve a unity of purpose.¹²⁷

Natural capital is the most vital element to this story. Without natural capital harvesting is not possible. Although efforts are being made to capture traditional knowledge on wildlife numbers and patterns and to improve western science in this area, there is still a need for greater understanding on natural capital and potential environmental threats in many regions. There are initiatives looking at how contaminants reach and circulate through the Arctic such as the Arctic Environmental Strategy involving the Council of Yukon First Nations, the Dene

¹²⁶ Royal Commission on Aboriginal Peoples, Volume II.

¹²⁷ Donald Savoie, *Community Economic Development in Atlantic Canada: False Hope or Panacea*. The Canadian Institute for Research on Regional Development., 2000. p. 49.

Nation, the Métis Nation-NWT, the Inuit Tapiriit of Kanatami (ITK) and the Inuit Circumpolar Conference. In some cases, the issue is not developing the knowledge but sharing it (e.g., the low health risks in eating country food).

Human capital for the purposes of this study speaks very much to the development of both formal education such as business skills, as well as traditional knowledge and land-based skills. Business skills and administration capacity are required to establish businesses and commercial enterprises. As identified by the RCAP report, there is a need for management development and skilled management support (operations, financial and marketing) for Aboriginal enterprises. These business skills are an essential ingredient to compete on the world stage.

Similarly, land-based or harvesting skills should be maintained to support harvesting activity and related activities such as eco-tourism and sport hunting and fishing. The passing on of traditional skills has been hindered by parents' move to wage-based employment with little time to teach skills, and by the formal school schedule that limits the time available for children to participate in harvesting with the family.

Physical infrastructure, a part of economic/physical capital, is an issue for many Aboriginal communities but in different ways. Harvesting can be very expensive with some people being unable to afford the necessary supplies to harvest. For communities, the problem can be the lack of physical infrastructure to support trade be it the absence of an all weather road or a fishing vessel, or the funds necessary to adopt information and communications technologies to support traditional economic activities. Who pays for infrastructure upgrades? In some cases, government has been forthcoming (e.g., DFO is building up fishing capacity in some Aboriginal communities). In other cases, the costs can be shared such as through the sharing of equipment provided by the co-op or community.

Physical capital also involves financial resources. We heard frequently that Aboriginal communities lack access to capital. This could be due to several reasons, one of which is the lack of capacity by some communities to oversee the business project. Alternative financing models may be required that are consistent with community development principles. For example, lending circles in the Manitoulin Island area have been very successful in supporting small businesses, particularly by women and related to traditional economies. The loan circles involve members of the community contributing to a loan fund along with other partners (in Manitoulin's case it has involved the Calmeadow Foundation and local banks).

Social capital is a very important element to the future development of traditional economies. Moving from a society principally organised around hunting and gathering will continue to place pressure on existing social structures. We see this form of capital as being vital to the support of traditional economies since

how a community is organised and governed affects its development. Communities that are in a position to take a broad approach to their development have the best opportunity for supporting traditional economic activity on a sustainable basis. We believe the following elements are necessary to support this approach:

Stewardship over natural resources: Stewardship refers to the notion that no one owns anything, “rather an opportunity exists to use the environment in ways that support and please people, and this opportunity transfers from one generation to the next.”¹²⁸ Having the capacity for stewardship requires traditional knowledge, scientific knowledge and management skills. Communities that are involved in stewardship or the co-management of their resources have a greater likelihood to make holistic and responsible decisions. Co-management of resources is a way to involve all stakeholders and integrate the management of natural resources with support for traditional economies. Regions that have a land claims agreement are likely to have formal structures and co-management practices in place.

At the same time, stewardship often involves the existence of a regulatory regime that applies in a fair manner to all stakeholders. As being seen with the fishing industry on both coasts, the lack of an acceptable regulatory regime for both Aboriginal and non-Aboriginal interests is a disservice to all.¹²⁹

Having strong community leadership and governance and the capacity for sound community planning: Communities are faced with competing demands for investment and development. Often there are competing uses of land such as forestry vs. tourism or forestry vs. non-timber forest products. Land management planning is now being undertaken by many communities to help manage resources and competing objectives. Having the capacity to handle these competing requests that is supported by knowledge and acceptable to the community will increase the chances of investing wisely. These qualities also apply to community enterprises that essentially act on behalf of the community members and in the establishment of partnerships between stakeholders. As the Royal Commission on Aboriginal Peoples’ stated, “history shows that communities have done well in economic development when they are making decisions rather than responding to program funding initiatives from government.”

Encouraging economic development at the community level: Government programs are often directed to the individual entrepreneur or a private enterprise. As shown in Chapter 3, Aboriginal societies place great value in the collective approach to economic development involving the community. Individual entrepreneurs are often seen as too independent and apart from the collective resulting in lost opportunities in the community. Government programs need to

¹²⁸P.G. Sly et al., West Kitikmeot/Slave Study Area, p. 150

¹²⁹ Thomas Issac, “The Marshall Decision and Government’s Duty to Regulate” *Policy Options*, June 2001.

take this value into consideration. Government funding must be accessible for community level action and not just for the individual entrepreneur. For example, the Federal Economic Development Initiative for Northern Ontario (FedNor) established a grant process based on an individual approach. The result lead to few Aboriginal projects being funded. FedNor has since adopted a community economic development approach. Consequently, 22 per cent of funding now goes to Aboriginal projects.

We believe that by addressing the above issues, the calls to action in section 7.1 have an opportunity to be successfully implemented. Governments are not solely responsible for taking action on this issue. Aboriginal people themselves must choose how important country food will be to them in the years ahead and what action, if any, they are willing to take to support its production and consumption.