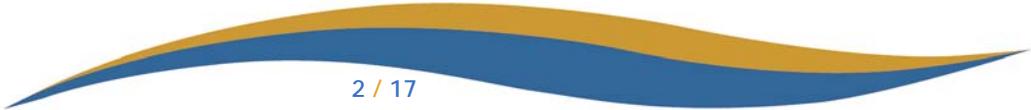


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1. Introduction / Objectives

The QINIQ Financial Services project is part of an ongoing commitment to ensure cost-effective access to essential services across Canada's most remote territory.

In 2005, the QINIQ broadband network achieved connectivity across Nunavut's large land mass creating a virtual highway in an area where no connecting roads or highways exist. This achievement was recognized by the Intelligent Community Forum¹ in naming Nunavut as one of its 21 Smart Communities² for using broadband to stimulate community and economic development.

With reliable high speed capability established, QINIQ launched the Financial Services project to examine the opportunities for delivering basic banking services to all Nunavummiut³. Currently, only three of the territory's 25 communities have teller service and none ensure a consistent level of service in the Inuit language.

Nunavut represents Canada's fastest growing population with the majority of its residents at the earliest stage of their earning potential. Nunavut's population is 85% Inuit. There are two written forms of the Inuit language. The majority of Inuit in Nunavut speak Inuktitut with the western portion of the territory using a dialect called Inuinnaqtun⁴. In the 2001 census, 70%

Broadband for Nunavut: From Vision to Reality

The QINIQ network delivers Broadband connectivity to the 25 communities in Nunavut, Canada. Servicing a population of 29,000 people dispersed over 2 million square miles, the QINIQ network improves the lives of Nunavummiut by providing access to cost-effective Broadband connectivity. This enables residents of Nunavut to access on-line services, educational content, electronic commerce and in general, utilize modern Internet technologies. This was previously impossible, as no Broadband infrastructure existed that the average person could readily use.

The QINIQ network is the culmination of the work of many individuals and organizations over many years. QINIQ itself was largely conceived of and deployed by two organizations, the Nunavut Broadband Development Corporation and SSI Micro. The path to QINIQ, however, is much more complicated. Many people and organizations helped shape its ultimate design and model of this network.
From www.qiniq.com

¹ See <http://www.intelligentcommunity.org/>

² See <http://www.intelligentcommunity.org/displaycommon.cfm?an=1&subarticlenbr=46>

³ Inuktitut word meaning "residents of Nunavut".

⁴ Both Inuktitut and Inuinnaqtun are recognized as official languages of the territory along with English and French.

reported Inuktitut as their mother tongue. Ensuring access to cost-effective banking services in the Inuit language is essential to enable Nunavut's youthful population to participate and lead the territory's economic development and create sustainable opportunities for the future.

"The number one opportunity that broadband can bring to Nunavut residents is the ability to buy and sell goods and services on the Internet. We need to use broadband tools to address the barriers to banking, so that people can really participate in the economy."

Board of Directors
Nunavut Broadband Development Corporation (NBDC)
March 2006

Through funding provided under the Strategic Investments Program through the Department of Economic Development & Transportation and the support of the Department of Indian and Northern Affairs, the QINIQ Financial Service project has produced a set of recommendations contained in this paper that, when implemented, will deliver full banking services in the Inuit language to all Nunavut communities.

2. Approach

The QINIQ Financial Services project was undertaken by a five person team which, together, offered an extensive knowledge of Nunavut and a complementary set of skills and expertise.

The project team is comprised of Lorraine Thomas, Secretary-Treasurer and David E. Smith, President of Nunavut Broadband Development Corporation, the not-for-profit organization that led the initiative to launch the QINIQ network from its earliest concept. The third project team member is Dan St-Denis, a technology consultant and project manager who has extensive experience in implementing electronic banking services, most recently with Alterna Bank in Ottawa. A fourth member, Glenn Cousins, the Executive Director of Nunavut Economic Forum offers a broad perspective on economic development opportunities and obstacles across Nunavut in his current role in supporting the implementation of the Nunavut Economic Development Strategy and through his previous experience in managing a large retail operation in the territory over several years. The

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team is further supported by Robbin Sinclair-Chenier, an Iqaluit based consultant/accountant who provides financial management and related services to both public and private sector interests in Nunavut.

The project itself extended over several weeks with the most significant focus being late 2005 through early 2006. Team members consulted key contacts with the federal government -

Department of Finance, Industry Canada; the territorial government - Department of Economic Development & Transportation; Inuit organizations - Nunavut Tunngavik Incorporated,

“Technological change is one of the key drivers of change in the financial services marketplace in Canada and around the world. It has revolutionized the delivery of financial services, adding new and more convenient delivery channels and enabling Canadians, whether they live in urban centres or in rural or remote communities, to have “anytime, anywhere” access to their financial institution by telephone or personal computer.”

~ CBA Submission to the Task Force on the Future of the Canadian Financial Services Sector
October 29, 1997.

Nunavut Trust; and other key stakeholders - Atuqtuarvik, Royal Bank among others.

Through these discussions, the project team assessed the obstacles to broadening banking services and the opportunities for overcoming them.

The team also reviewed recent studies commissioned as a result of a renewed interest in a “made in Nunavut” solution to provide banking as well as lending services for Nunavut residents. Such studies reference much earlier assessments. Despite advancements in banking which now provide for 24/7 access to urban Canadians, many Nunavummiut are still shut out through an inability to engage direct teller service necessary to open an account, make deposits and obtain resolution of key issues. The project team has provided recommendations in the paper which, when implemented, enable even those in the most remote locations to access basic banking services.

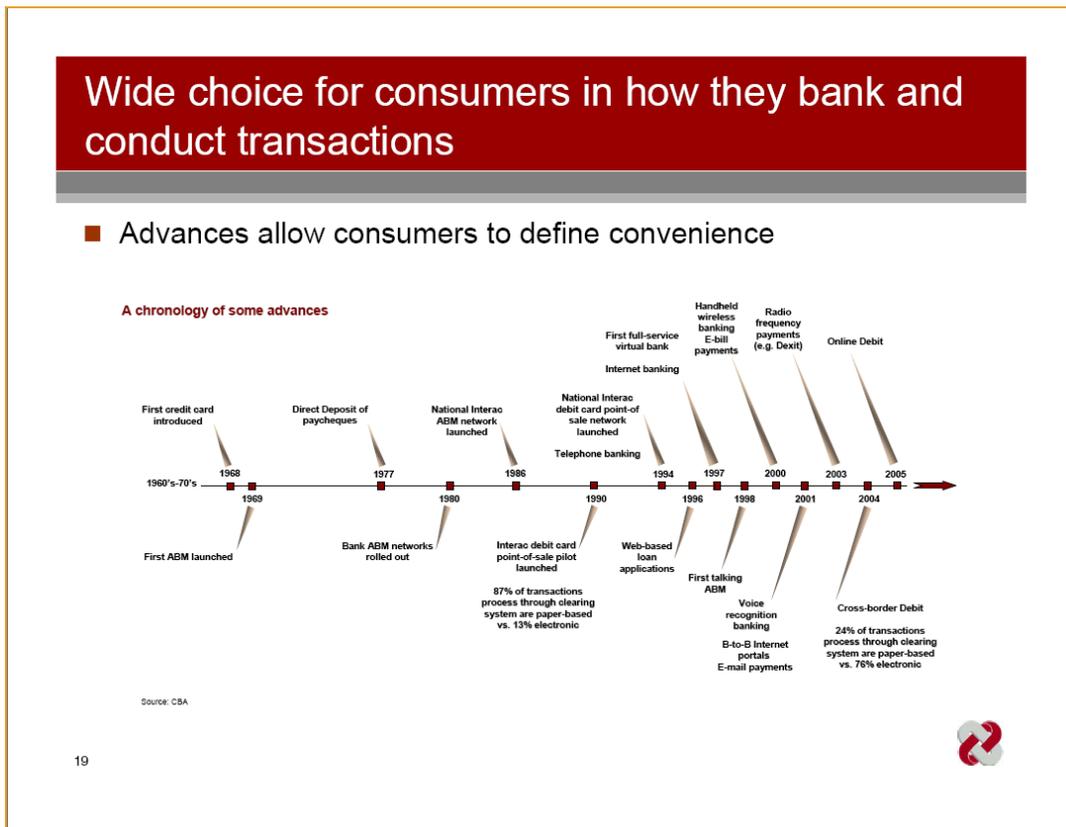
“Banking services need to be extended to remote and special access communities through the use of the various new electronic technologies.”

The Royal Commission Report on Aboriginal Peoples: Challenges and Opportunities for Corporate Canada
Sponsored by:
RBC Royal Bank & CANDO October 23, 1997, Toronto, Ontario



3. Background / Context

Over the past 30 years, the delivery of financial services has changed dramatically. With the introduction of automated banking machines (ATM), electronic bill payment and online money transfers, banking can now be done conveniently at the click of the mouse any time of day or night. The adoption of technology has enabled banks to move from a “bricks and mortar” to “point and click” approach to servicing many of its retail customers’ needs. The only requirements to participate in this increasingly cashless world are a bank account and a secure internet link.

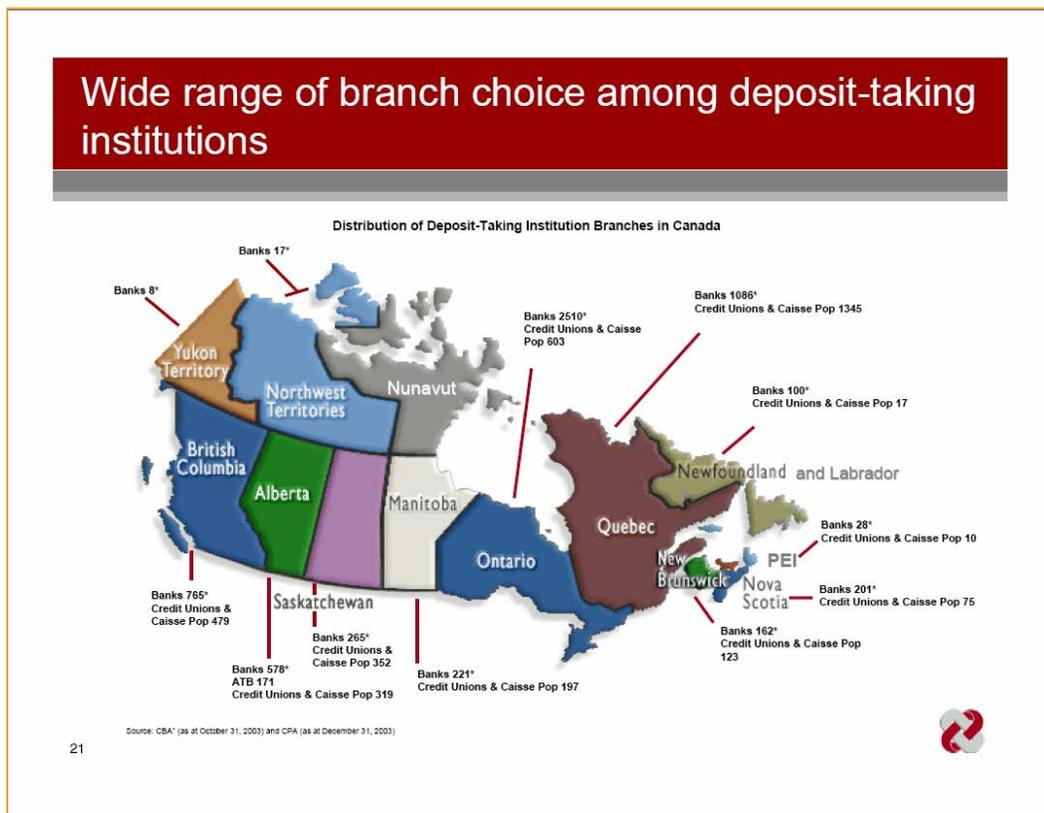


In the face of the changing landscape in the delivery of financial services, Canada like other countries has brought in certain protections to ensure that individuals have the opportunity to obtain banking services as a basic right. In 2003, Canada introduced the *Access to Basic Banking Services Regulations*⁵ under the Bank Act to ensure requests to obtain services were not unjustifiably refused and that service fees do not impose a

⁵ The Regulations can be viewed online at <http://laws.justice.gc.ca/en/b-1.01/sor-2003-184/17976.html>

barrier⁶. Canadian financial institutions now report annually on their practices with particular focus on services for low income earners, the elderly and the disabled. In April 2005, the Canadian Banker's Association reported to the Senate Standing Committee on Banking, Trade and Commerce that 99% of Canadians have an account with a financial institution⁷. This is only marginally surpassed by Denmark and Finland.

What is not reported, however, is that banking in Canada's newest territory remains effectively unchanged despite these advancements. While there are bank branches in three communities, these are largely inaccessible by Nunavut residents in the other 22 communities. In the face of great distances and no connecting road infrastructure, the only means to meet the provisions under the Bank Act for obtaining a bank account at a physical point of service is a return airline ticket. This in effect becomes a service fee for obtaining banking services and a prohibitive one at that.



⁶ According to the CBA, eight major Canadian banks now offer low fee accounts to serve basic banking needs such as a debit card.

⁷ As per CBA's presentation entitled "Financial Services in Canada: The Consumer's Perspective" April 21, 2005.

Despite the growth in access points and a wide range of branches across Canada, Nunavut's experience is in sharp contrast with one major bank⁸ having withdrawn from the territory within the past 16 months and much of Nunavut still under serviced.

Retail outlets such as community co-op stores under Arctic Co-operatives Limited and North West Company have provided cheque cashing and money transfers on a fee basis. While this has enabled consumers to maintain credit accounts for local store purchases and obtain limited cash, it is generally viewed as unsatisfactory and does not provide access to services most Canadians take for granted. Not surprisingly then, these northern communities still rely heavily on cash transactions that, given their nature, remain largely untracked and therefore difficult to fully assess.

As a result, much of Canada's fastest growing population is unable to establish a credit history, safeguard surplus cash, pay bills or transfer cash on an electronic and cost effective basis. It also means that income may not be well documented and is therefore largely unrecognized within Canada's tax system for CPP and GST credits as well as federal training dollars for developing economic sectors such as arts and crafts. Therefore the inability to fully access banking services has impacts which go much further than the individual level and has potential impacts on the economic development of the territory overall.

4. Issues / Discussion

The real issue is enabling Nunavummiut to gain control over their personal finance resources. Control means the ability to determine where funds will be held and how they will be used. Despite the advancements and convenience of electronic banking, the ability remains largely unavailable to those who are unable to open a bank account and is essentially inaccessible to unilingual Inuktitut or Inuinnaqtin speakers. Previous studies with a primary focus on introducing a Nunavut financial institution or credit union have attempted to address these issues but, as yet, have not fully attracted the needed capital or support to bring this into reality despite much interest. Instead the QINIQ Financial Services project proposes a new approach that can make basic banking services a reality for all Nunavummiut despite their location through the use of QINIQ's secured broadband network and revisions to existing banking regulations in addition to other supporting recommendations. Each of these is presented further in this section.

⁸ The Bank of Montreal closed its Iqaluit branch in November 2004 after many years of serving Nunavummiut. The Iqaluit accounts were moved to Pembroke, a small community in the Ottawa valley.

4.1 Needs

Under the current approach, individuals are highly dependent on community-based retail operations to provide bank-like services such as cheque cashing, payment handling and money transfers in those communities where a bank branch is not present. Such services are provided for a fee which typically exceed normal bank handling charges and limit the individual's control over his or her own money. As an example, cheques made payable to an individual may be accepted by the retailer who then credits the individual's account at the store. The credit may then be used to purchase groceries, clothing, hunting supplies and equipment at that local store. Depending on the source of the funds, the individual may not have the flexibility to seek outside means of meeting his or her requirements.

Lack of access to banking services also limits an individual's ability to establish his or her income stream from cash-based activities such as the sale of prints, carvings and art pieces which is a mainstay for many Nunavummiut. This same limitation applies to hunters and trappers and workers who create clothing for external sale or local use. The impact of using cash continues to be felt later in life as income can not be clearly established for pension purposes. Further, the inability to access cheque verification or accept credit card transactions limits such income-earning activities to those transactions that can only be completed in cash.

Impacting Individuals

During the course of the project, team members were provided firsthand experiences which highlight the real impact to Nunavummiut. In 2003, the The Soper House Gallery welcomed two cruise ship sailings to the community within a few weeks of each other. In the first instance, the Gallery and local artists and carvers sold their work directly to the cruise ship tourists with reported cash sales of approximately \$3,000. Later, through the initiative of Kyra Fisher, the Economic Development Officer in the community, the Gallery obtained the ability to process credit card transactions and provided assistance in the sale of the Inuit art to cruise ship tourists. The volume of business based on the same number of tourists more than tripled when transactions could be completed without strict reliance on cash. In fact, reported sales were \$13,500 of which \$12,500 were credit card sales. This translated into more money in the hands of the community residents and demonstrates the potential for economic development in these communities if certain obstacles are addressed.

For the territory as a whole, insufficient documentation of this cash-based economic activity restricts access to possible funding sources such as federal programs for training and development. This perpetuates a situation that limits an individual's earning potential, wealth accumulation and development opportunities.

The two chartered banks, Royal Bank and CIBC, that maintain branch operations in

As one senior bank official related recently "if the [alternate procedures] worked as well as they did on paper, there would be no capacity issues at the bank".

Cambridge Bay, Rankin Inlet and Iqaluit attempt to service the remaining 22 communities through reliance on alternative procedures, fax transmissions and mail service. Yet this does not adequately replace face to face interaction nor fully comply with requirements under the Bank Act as it relates to opening bank accounts for new customers. It also

leads to delays for individuals who are seeking to deposit needed funds into their accounts as well as considerable effort by bank staff to follow up on unclear or incomplete instructions received from customers outside the community.

Procedures to open a bank account for those customers outside the three communities that have branch services can also be a time consuming and frustrating experience. It typically involves interaction with the local RCMP detachment to confirm an individual's identity and certify copies of documents. Language barriers can often necessitate involvement of others particularly in explaining the application process and banking agreement. The time necessary to send and receive needed documentation further extends the normal application process. Yet a bank account is often an essential requirement. For instance, a Nunavut student traveling - possibly for the first time - to further his or her education requires a bank account to access financial assistance from the Government of Nunavut (GN). Increasingly, employers are also requesting banking information of their employees in order to deposit paycheques directly on a cost effective and timely basis. Applications for credit typically require an established relationship with a financial institution. Therefore a bank account is a fundamental element to enable an individual to participate in the economy.

4.2 Opportunities and Benefits

For most Canadians, banking services are at their finger tips or as close as the next city block. Yet the reality for those individuals who face challenges of distance and language are effectively locked out of an electronic world that increasingly runs the majority of economic activity. The key to participation is as simple as a bank account. While the opportunities and benefits may be felt most directly at the individual level, the impacts run across the territory.

For the individual, a bank account ensures a safe and secure means of maintaining direct control over his or her financial resources. This contrasts with common practice in remote communities whereby retailers hold customers' funds but may not provide its customers with the full range of services such as electronic banking. While this practice with retailers arose out of convenience, it has become restrictive over time in the face of many consumer choices and means of acquiring goods.

Along with control over resources comes the responsibility for managing it. Once established as a bank customer, an individual can access accounts electronically through secure community internet access using the QINIQ network or via personal QINIQ accounts. The same channels can also be relied upon for the delivery of educational training on personal finance matters such as investing and requesting credit. Transactions between individuals can also be handled with greater ease through electronic or email transfers thereby minimizing the need for personal cheques and delays in sending cheques to banking communities for deposit.

Armed with a bank account, an individual can apply for a credit card. Even those without an established credit history can make an application for a zero balance credit card. The primary distinction is that a zero balance credit card must have funds applied to it upfront and carries a credit which may be used for purchasing goods and services. Individuals then have a broader range of choices. Even more importantly to those Nunavut residents who travel across vast distances, a credit card can help secure airline and hotel reservations and also reduce the need and risk of carrying large amounts of cash.

Another important aspect of expanding access and use of banking services is the opportunity it presents to conduct sales via the internet. This addresses the NBDC's Board's vision in seeing broadband tools used to eliminate barriers and expand Nunavummiut's participation in the economy. Carvers and artisans could then reach out to the world in highlighting their creative talent at a time when Inuit art is attracting record prices⁹. Establishing e-commerce websites to facilitate direct sales

A proactive businessperson and QINIQ service provider, Robert McLean, in the Nunavut community of Sanikiluaq has taken measures to address lack of local banking services directly by assisting his customers through the tedious process of setting up bank accounts remotely. He is now able to receive payments for internet services electronically from those same customers. It was taking anywhere from two to three weeks to send cheques for deposit to the nearest branch. For a small business operating in a high cost environment, the delay was proving to be detrimental to cash flow.

⁹ CBC report "Inuit sculpture fetches record price", April 25, 2006.

<http://www.cbc.ca/north/story/nor-inuit-sculpture.html>

represents another opportunity to expand Nunavummiut’s participation in the world economy.

Without broadband access and banking services, the ability to effectively use the internet in Nunavut to promote and sell goods was possible only through significant dedication, persistence and money. Through the QINIQ network and enhanced banking services in the territory, this opportunity may be extended beyond a limited few.

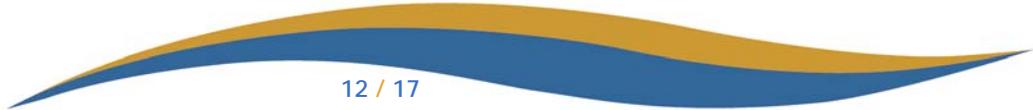
Impacting Business

In 1998, Bob McLean of Sanikiluaq started “Soapstone Artists”, a business selling carvings through a website he created. The extremely slow connection speeds through long distance dial-up access to post pictures were solved by setting up a second company called “Sanny Internet”. Mr. McLean put in a local dial up server simply to reduce his long distance phone bill of \$1500 per month. He offered the community local dial up access for years, and now is the local QINIQ broadband provider for Sanikiluaq.

This story is about the process Mr. McLean went through in 1998 in order to sell carvings to clients that wanted to purchase with credit cards after viewing pictures of the carvings on line. It took Mr. McLean almost four months of steady correspondence with the bank in Iqaluit to obtain a merchant account in order to accept credit cards over the phone. Once the merchant account was finally was set up, he still then had to travel to a bank in a major centre to activate the merchant account client card. A plane ticket to his branch in Iqaluit costs \$3500. In the end, he traveled to Montreal to start the account which cost about \$2000.

Today, Mr. McLean processes all of his Soapstone Carving purchases through the integrated VISA/Mastercard system. In order to save money, he manually processes each purchase, putting the information via phone with his merchant id. Then he logs into the software, and can retrieve the order with the credit card information immediately. This is a huge improvement to the past.

Steps Taken	Time
1. Phone for the application to start a bank account. Receive information via mail from the bank.	2 weeks for mail
2. Fill in the application. Prepare identification documents, photocopying his health card and birth certificate, and getting the photocopy certified by the RCMP that the ID was a true copy of Bob’s identification. Mail in the application to the bank [continued]	1 week to prepare 2 weeks for mail



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3. Bank processes and mails out debit card and bank information to Sanikiluaq.	3 weeks process/mail
4. Start process of setting up a merchant account. He could only do this once he had an established bank account. He requested an application form to get a BCIN (Business client information number) to allow him to use telephone or on line credit card processing.	2 weeks to receive application
5. Fill in the forms, mail them back to the bank	2 weeks
6. Obtain the merchant account client card that also acts as a debit card.	4 weeks
7. Activate the card - he had to be physically present to activate the card, so he traveled to Montreal when he had the opportunity.	8 weeks

Both public sector and private sector organizations operating across Nunavut can benefit through the greater accessibility and use of banking services by individuals. Employers can introduce electronic deposit of payroll cheques directly into each employee’s bank account. This produces employees with immediate access to their money whereas cheques can take time to arrive in a community, are subject to weather delays and can not be easily deposited. The impact to individuals working in remote communities can therefore be significant. Electronic payment processing is also generally recognized as being more cost effective which has led to the broad adoption by business and government when issuing payments to employees, suppliers, income recipients and others.

The ability to receive payments electronically also improves the cash flow available for businesses as they also face the concerns in receiving payment via cheques on a timely basis. With a greater prevalence of electronic fund handling overall, there is less need to maintain as much cash on hand which can be vulnerable to loss.

For the Government of Nunavut, and its agencies the accessibility and use of banking services across the territory is important to ensure that Nunavummiut obtain services that the majority of Canadians enjoy every day. Access to basic banking services is a right that is protected in various jurisdictions including Canada¹⁰ and warrants special consideration to meet the needs of Canadians living in remote communities. In supporting this direction, the Government of Nunavut stands to benefit in several ways. First, its own payment processing may be streamlined to extend electronic payments to its suppliers and other recipients providing more timely payments and typically at much reduced cost. Secondly,

¹⁰ Per the *Access to Basic Banking Services Regulations* under Canada’s Bank Act.



it supports the GN's recent initiative to eliminate barriers to business by ensuring that potential and existing entrepreneurs and business owners gain easy access to bank accounts and, where applicable, merchant accounts to support their business activities and manage cash flow. And finally, many Government of Canada programs require justification in the form of open positions in the federal Job Bank and other documented activity before federal funds can flow to the provincial/territorial level. In the absence of documented open positions in arts and crafts for example, Human Resource and Skill Development funds are not available to the Government of Nunavut for training. As the full extent of Nunavut's economic activities are documented, it also provides a more complete picture of the territory's development and it's potential.

4.3 Obstacles

Nunavummiut have been seeking financial services which address their needs and respect the Inuit language for a long time. Over the years, studies have considered different models of delivering financial services across the territory. Yet these potential solutions typically entail levels of investment and support which are not immediately present. The shift, even in large centres, is away from the investment in the physical infrastructure (often referred to as the "bricks and mortar") to investment in the technology infrastructure to support cost-effective delivery of banking. Given Nunavut's high cost environment, it is unlikely that investment in "bricks and mortar" will increase. The withdrawal of Bank of Montreal lends support to this view. More recently, Whale Cove residents were informed that money order and cash-on-delivery services would no longer be provided to the community through the Canada Post office¹¹. Therefore the focus must be on using advances in technology such as the QINIQ network to broaden access to banking services across the territory. There are, however, certain obstacles which must be addressed.

Under the provisions of the Bank Act, bank accounts must be opened at a physical location of the bank. The QINIQ project team has considered this and the significant burden this regulation places on Nunavummiut to access basic banking services. With the provision of desktop videoconferencing through the QINIQ network, it is possible to provide real time interactive point-to-point service from bank teller to a remote customer. With revisions to the Bank Act, individuals living in remote locations may secure the ability to open bank accounts almost as easily and seamlessly as "southern" Canadians.

¹¹ "Money orders a two-hour trip away from Whale Cove" April 7, 2006 Refer to <http://www.cbc.ca/north/story/nor-whale-cove-post-office.html>

Nunavut's population has high internal growth due to a birth rate which is almost twice the national average. This has led to a young population with many income-producing years ahead of them and, along with that, a lifetime of earnings to be used to buy a home, make major purchases and build for a secure retirement. Banks that establish a relationship with this population stand to benefit as the population becomes consumers of bank and investment products. Technology also provides new approaches to delivering these services such as a dedicated call centre providing services in the Inuit language accessible via videoconference capability or phone.

The next obstacle is the ability to make deposits within a community that does not have branch services. Mailing cheques to Iqaluit, Rankin Inlet or Cambridge Bay is slow and subject to loss. Further, the investment in resources to establish and maintain a network of automated teller machines across the north for deposit taking is unlikely due to the cost and risk. Yet the north is connected in other ways than the QINIQ network and that is through the well established Interac system for purchases. While technically, the Interac system is capable of processing funds back into an individual's account such as in the case of a refund of a store purchase, the provisions over the Interac system do not provide for it being used as a deposit taking mechanism. This would require changes in regulations amounts to a significant improvement in service for individuals living in remote locations if achieved. While deposits would likely be restricted to certain types (e.g. cash, government issued cheques) and thresholds, this approach has the potential to provide considerable flexibility for Nunavummiut in meeting their banking needs. Retailers may find that there is less requirement to bring cash into the community as more cash is deposited rather than held privately and online banking is used more extensively for transferring money and paying bills. A modest fee for deposit taking could be charged to defray any additional costs and cover related risk.

5. Conclusion

The QINIQ project team recognizes how vital access to basic banking services is to the territory and its residents and has, throughout this paper, highlighted the impacts and challenges faced by Nunavummiut today.

Despite advances in banking, services in the territory remain largely unchanged. Only three of Nunavut's 25 communities have branch services and none can guarantee a consistent level of service in the Inuit language. While the chartered banks have developed alternate procedures to serve customers in the other 22 communities, these can be time consuming and problematic. Retailers have also traditionally played a significant role in these communities by providing bank-like services for a fee. Yet none of these options provide individuals with effective control over their personal financial resources on

a ready and timely basis. Through the use of the established QINIQ broadband service and recommendations contained in this paper, it is anticipated that Nunavummiut can obtain greater access to banking services which will lead to greater participation in the economy and further development overall.

6. Recommendations

In order to ensure greater access and use of basic banking services across Nunavut, the QINIQ project team recommends the following;

1. That the Government of Canada augment the Bank Act and related regulations to enable the delivery of bank teller services via desktop videoconferencing as an equivalent to face-to-face in-branch interaction with customers;
2. That Canadian financial institutions with operations in Nunavut support desktop videoconferencing as an alternative to face-to-face in-branch interaction with customers;
3. That Canadian financial institutions provide desktop videoconferencing services in the Inuit language, and provide Inuit language translations of basic banking documentation for client reference;
4. That the Government of Nunavut develop and launch a communications plan and training that encourages access to and use of basic banking services while highlighting the benefits to Nunavummiut and economic development in the territory;
5. That the Government of Nunavut and governmental organizations broaden the use of direct deposit for its payments to suppliers, employees and other recipients of government payments;
6. That the regulations governing the Interac system be augmented to encourage its use to facilitate bank transactions in remote locations, especially deposits of cash where no community in-branch services are available.

Appendix A - Project Team Members

Glenn Cousins	Executive Director, Nunavut Economic Forum
David E. Smith	President, Nunavut Broadband Development Corporation
Daniel St. Denis	Consultant
Robbin Sinclair-Chenier	Consultant
Lorraine Thomas	Secretary-Treasurer, Nunavut Broadband Development Corporation