
The Road We Travelled
Our Communities' Voyage to the
Future on the ICT Highway

TABLE OF CONTENTS

TABLE OF CONTENTS

TABLE OF CONTENTS

The Road We Travelled –
Our Communities' Voyage to the Future on the ICT Highway

Introduction

Congratulations! You are currently in possession of the product of thousands of hours of effort and experience from highly dedicated people from across Canada. Hundreds of people from communities all across Canada have spent years working towards accomplishing the successes revealed in this book, and now all of those secrets to success have been condensed into this short little booklet for you. You are in possession of a very valuable tool that can unlock great things in your community. I trust that if you have chosen to pick up this book, you are the type of person who wants to make positive things happen for yourself or your community. What you do with this book will determine to some degree the legacy of the stories contained within it, so I hope you will use these stories to your great advantage and build strength in your community just as the communities outlined herein have done.

The stories contained within are the result of a multi-year effort to find out what is working across the country when it comes to strengthening understanding and utilization of technology outside of the urban environment where integration with technological society is almost automatic. These stories highlight how rural, remote and aboriginal communities have overcome the digital divide and achieved success in raising the profile of their adult population through increased mastery of technology and application of those technical skills to create real benefits for their families and communities.

About the Project

N-CAP, headed by Darlene Thompson, has taken the lead in promoting community based ICT projects throughout Nunavut since 2003. N-CAP's mission is to develop and champion sustainable community initiatives and applications using ICTs that enhance economic, educational, social and cultural opportunities. This project is the result of several years worth of planning and coordinating with networks of community learning and technology centres nationally to assemble stories that illustrate best practices in adult learning of Information and Communication Technologies (ICTs) in remote, rural, and aboriginal communities. The focus of the project was to collect the stories in this book to identify the types of activities that are having success in strengthening communities and individuals through increased understanding of ICTs so that they can be built upon by others.

The idea to collect these types of success stories has been brewing for some time and has been started in the past in similar format with the project "Ideas That Travel" in 2005 by Telecommunities Canada. The results of that project were never published, but the efforts helped to inspire others and successes were nevertheless shared. This booklet is in some ways a continuation of those efforts and aims to continue the theme of sharing best practices so that successes can multiply through emulating the things that have worked elsewhere.

The learning that occurred during these projects was, of course, a great benefit but was almost secondary to the greater benefits realized through community capacity building that occurred as a result of the projects. Great things have happened for individuals and communities as result of many of these projects and we hope that more individuals and communities are able to realize benefits by replicating or modifying the ideas in this booklet to suit their own needs.

Project Findings

While these individual stories illustrate some of the possibilities for strengthening the skills and economic opportunities in your community, they are not necessarily best practices in themselves. To identify best practices it is necessary to identify common themes among the stories. Several themes were identified from the collection of stories:

- Strong community involvement – the more people who participate in the project, the more likely it is to succeed. This creates a sense of ownership amongst people, and once they've participated, they will be less willing to let the project fail.
- Identify community strengths and assets. There may be a problem in your community you want to help fix but there are likely lots of things about your community that are working. What people, places, and other resources are available in your community that you might be able to work with or use?
- Tie learning to the achievement of other community goals, such as economic development. Learning was maximized when it was incidental and not the primary focus of a community's efforts. Learning was instead a necessary step to achieving a larger goal such as creating a local economy or showcasing heritage and culture.
- Persistence pays off. Projects which continued to build on past successes were the ones who achieved the most. When one project wraps up, identify what further growth could be targeted, and keep building on your successes – don't lose momentum!

How to Use This Booklet

The booklet is a collection of stories, numbered 1 to 40. The order of the stories has been randomly selected. Of course, we feel that each and every story will be of interest, and we encourage you to fully read all stories. However, if you feel the need for speed and want to 'cut to the chase', we have provided a few tools to help you locate stories that you will find relevant. There is a topical index at the back, as well as a map of projects by geographic region. Contact Information for each story is also provided at the back of the book. If you are looking to replicate a project, we urge you to contact the project lead directly to inquire about any points that may be of assistance to you. Most importantly, once finished with this book, please share it with others who may find it helpful. Enjoy!

Acknowledgements

This book has been a truly collaborative effort, and it is necessary to acknowledge the contributions of the many dedicated and passionate community leaders who have made this book possible, as well as the agencies that were able to see the value in these efforts and provided funding to coordinate these best practices. Specifically, we at N-CAP would like to thank:

- The individuals and communities who took the time to contribute stories for this booklet. A full index is available at the back of the book;
- Human Resources and Skills Development Canada's Office of Learning and Essential Skills, who provided the bulk of the funding to make this project happen;

– the Government of Nunavut's Department of Education, who provided a stable office environment;
  - Darlene A. Thompson
    Community Access Program Administrator, Nunavut Dept. of Education
    Secretary/Treasurer, N-CAP
    P.O. Box 1000, Station 910, Iqaluit, NU X0A 0H0
    Phone: 867-975-5631 Fax: 867-975-5610
    E-mail: dthompson@gov.nu.ca

  - Austin Rice
    Community ICT Coordinator, Dept. of Education
    PO Box 1000, STN 910, Iqaluit, Nunavut X0A 0H0
    Phone: 867-975-5633 Fax: 867-975-5610
    E-mail: arice@gov.nu.ca

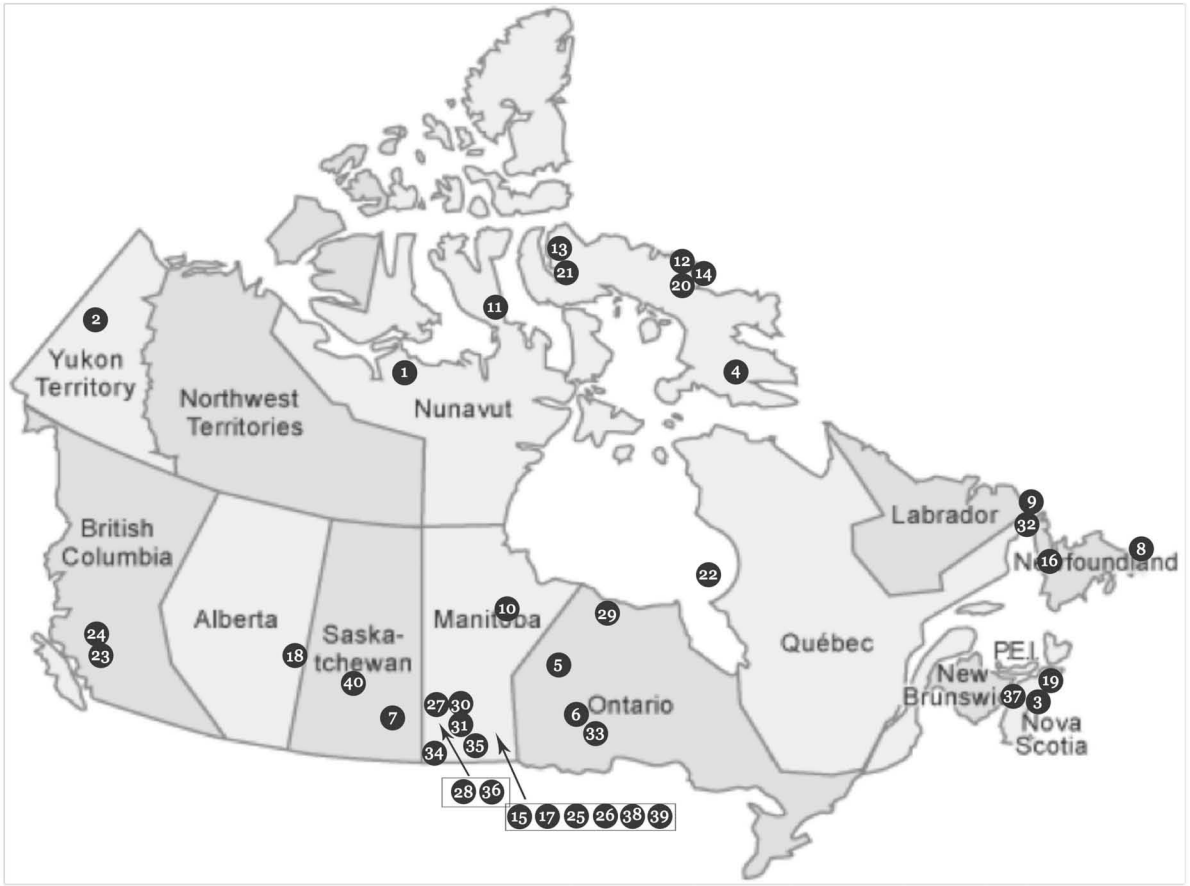
– Manitoba e-Association, who collaborated on the collection of stories and also provided their expertise in publishing;
  - Clarice Leader
    Executive Director , Manitoba E-Association Inc.
    100-135 Innovation Drive, Winnipeg, MB R3T 6A8
    Cell: 204- 781-6937 Blackberry PIN: 326F0E5A
    Email: cleader@mb.e-association.ca Web: http://mb.e-association.ca

  - Anthony Niiganii
    Project Manager First Nation Initiatives, Manitoba E-Association Inc.
    100-135 Innovation Drive, Winnipeg, MB R3T 6A8
    Phone: 204-771-0200 Fax: 204-474-7830
    E-mail: aniiganii@mb.e-association.ca Web: http://mb.e-association.ca

  - George Wilhelm
    Graphics/Web Coordinator, Manitoba E-Association Inc.
    100 - 135 Innovation Drive, Winnipeg, MB, R3T 6A8
    E-mail: gwilhelm@mb.e-association.ca Web: http://mb.e-association.ca

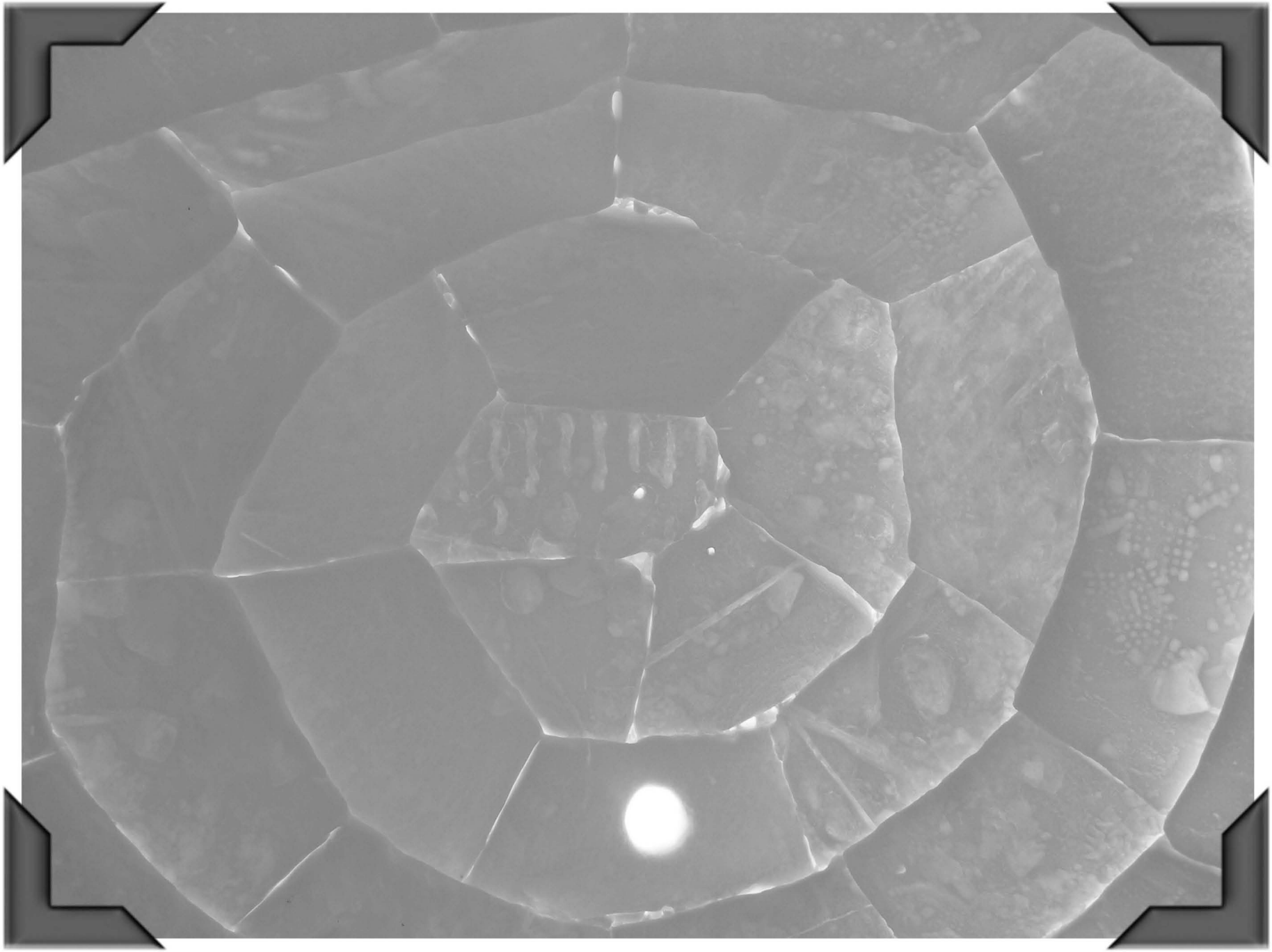
– Telecommunities Canada, who supported our networking efforts; and
– Industry Canada's Community Access Program, for providing the base from which most of these ideas sprang.
– Photographs in the book provided by;
  - Darlene A. Thompson
  - George Wilhelm
  - Clarice Leader
  - Amy Campbell-Shawcross
  - Rob Lavin

MAP of PROJECTS



Numbered Project listing

1	Cambridge Bay, NU
2	Yukon
3	Halifax, NS
4	Iqaluit, NU
5	Sioux Lookout, ON
6	Sioux Lookout, ON
7	Grayson, SK
8	St. John's, NL
9	Forteau, NL
10	Oxford House, MB
11	Nunavut
12	Clyde River, NU
13	Arctic Bay, NU
14	Clyde River, NU
15	Winnipeg, MB
16	Norris Point, Bonne Bay, NL
17	Winnipeg, MB
18	Fishing Lake Métis Settlement, AB
19	Dartmouth, NS
20	Clyde River, NU
21	Arctic Bay, NU
22	Sanikiluaq, NU
23	Tatlayoko Lake, BC
24	Tatla Lake, BC
25	Winnipeg, MB
26	Winnipeg, MB
27	Roblin, MB
28	Waywayseecappo First Nation, MB
29	Fort Severn, ON
30	Marius, Manitoba
31	Marius, Manitoba
32	West St Modeste, NL
33	Sioux Lookout, ON
34	Canupawakpa Dakota Nation, MB
35	Winnipeg, MB
36	Waywayseecappo First Nation, MB
37	Wolfville, NS
38	Winnipeg, MB
39	Winnipeg, MB
40	Thickwood Hills, SK



THE COMMUNITY INSIGHT PROJECT:
Teaching the Skills of Local Heritage Documentation

In the spring of 2009, the Kitkmeot Heritage Society (KHS) began a documentary video initiative titled the *Community Insight Project*. The goal of the project was to create greater local involvement in the process of Inuit cultural and historical documentation. By teaching residents of Cambridge Bay the skills of high definition video filming, editing, and interview, it was anticipated that local Inuit could gain the knowledge and techniques required to record the community's cultural skills and stories about the past.

Since its inception in 1995, the Kitikmeot Heritage Society (KHS) has assumed the mandate of documenting and preserving Inuinnaqtun language, culture and heritage throughout Nunavut's Kitikmeot region. While the KHS actively engages local communities through a variety of culture and history workshops, the technical and academic support for these projects is commonly sourced from outside of the territory in the form of documentary film makers, oral historians and university-based researchers. It was both the Kitikmeot Heritage Society's and the community's desire that local Inuit could gain some of the skills required to begin self-documenting their heritage. The obvious challenge when approaching this project was that many of the adults and elders in the community had not previously been exposed to digital media, and possessed none of the local youth's fluency in new technologies.

It was eventually decided that local youth should be engaged as teachers for the rest of the community. Being familiar with cell phones, on-line social networks and computer games this group possessed many of the required technical skills as well as the desire to use and experiment with new media. In February of 2009, the KHS partnered with Insight Productions—a non-profit, U.K. based media organization—to begin training local youth in HD video interviews and media editing. Insight Productions specializes in global indigenous outreach and environment issues, donating cameras and film equipment to small communities so that they might self-register and comment on the ground-level impacts of such issues as climate change and cultural shift. The organization generously contributed two HD cameras, microphones and editing software to our community. For one week in February, a representative from Insight Productions came to the community to hold an intensive film workshop with a group of approximately a dozen local students. Students were taught to record interviews in their local community, and to create thoughtful documentaries looking at cultural expression and how contemporary life in their town contrasted with that live by their grandparents and ancestors. A series of short videos were created and showcased on the Internet through Insight Production's website.

In July of 2009, the KHS held a three-week elder-youth traditional land camp outside of Cambridge Bay, which provided a perfect opportunity for more general community learning and application of media technology. The camp revolved around the manufacture of a Copper Inuit style kayak using locally obtained construction materials—such as dwarf willow, sinew, and sealskin—and traditional building tools. Roughly fifty to sixty members from the Cambridge Bay community used the camp on a daily basis to fish, learn about history, partake in the eating of land-harvested

foods, and to help build the kayak. An informal program was created to have local community members self document the proceedings; two cameras and microphones were brought out to the camp and made available for use to anyone wishing to record. Being already familiar with the cameras, visiting youth helped adults and elder participants figure out the mechanics of recording. According to ICT learning objectives, much of the video education took place through small-scale 'hands-on' training in both an intimate and culturally entrenched setting. By the end of the three weeks, both adults and elders were using the cameras to film each other working on the kayak and describing old stories relating to living on the land. Much of the stigma and awkwardness associated with academic documentation (continuous translation, redundant and irrelevant questions, and lack of appropriate cultural protocol) seemed to vanish through this process, and community members felt comfortable directing interviews and exploring subjects they themselves wished to talk about. Over the course of the camp, a total of eight hours of community-recorded footage and interviews was amassed.

The outcomes of this project were manifold. Community members realized that the act of cultural and historical documentation was not something that only professionals could do. They gained the opportunity to direct their own series of investigations about how lives were traditionally lived on the land and how their contemporary worlds were both similar and different from those experienced in the past. Many of the participants also took the opportunity to look towards the future, gathering interviews about climate change and the effects of environmental collapse on traditional Inuit lifestyles. One young woman from the community took the initiative to film and compile edited camp footage into a short documentary video, which she brought to Copenhagen to be screened at the International Climate Change Summit held later that year. The movie has since been played several times for the community of Cambridge Bay and is used as a teaching platform for classroom discussions on history, the revitalization of traditional Inuit culture, and environmental awareness.

In the long run, it is anticipated that the *Community Insight Project* will continue to impact the course of local research in Cambridge Bay. Already, the town's schools have adopted the cameras for use in the filming and editing of school plays and class projects. There are plans to have elders conduct their own interviews during an archaeological field excavation planned for the summer of 2010, and an elder-youth mentorship program is being designed to gather digital footage on local oral history and elder biographies. The project will cumulate in the building of an archives theatre within Cambridge Bay's May Hakongak Community Centre, so that the community at large has full access to their roster of edited interviews, local documentaries and school projects.

What made this project possible was foremost the generosity of both outside organizations and the local community. Insight Productions was invaluable in providing equipment and bringing the initial video skills to Cambridge Bay. There are many of these non-profit organizations dedicated to providing "train the trainer" services, and I believe that remote communities—who generally rely upon repeated contract work from the south—often overlook them as resources. By creating a local pool of trained individuals, northern communities can begin to remove themselves from a reliance on southern professionalism. Such training takes time, but in the end provides a greater impact on the health, economy and sustainability of the community.

What really allowed for this project to happen was the involvement of the local community. Local organizations donated equipment and services to our land camp, encouraged interviews, and came together to ensure that the experience of building and documenting the traditional kayak was possible. These contributions were largely made because the community recognized the benefit of returning to the land and skills of their ancestors, and felt strongly and positively enough about the project's importance to encourage the documentation of this return for future generations.

The greatest challenge posed by this video documentation project was the lingering stigma the act possesses in a 'over-anthropologisized' community. All too often in the past, the pictures, films and interviews collected from Inuit communities simply vanished along with the researchers who originally gathered them. Among many of the more elderly community members, there is still a reluctance to be filmed or photographed. By introducing media technology through local students, we were able to more strongly convey the message that this documentation was being done '*by* Inuit people *for* Inuit people,' and that it would remain in the community to educate future generations. This approach was quite successful, and fostered a sense of reciprocal interaction between elders and the younger generation, which, because of language and social barriers, has become increasingly more difficult to create.

Since its inception in 1995, the Kitikmeot Heritage Society (KHS) has assumed the mandate of documenting and preserving Inuinnaqtun language and heritage throughout Nunavut's Kitikmeot region. The KHS engages the local communities of Kitikmeot by providing in-school traditional skill workshops, accessible archives and exhibit displays, with the goal of promoting the cultural history and traditional knowledge of Nunavut's people. As an elder-directed organization, the KHS forefronts projects encouraging the Inuit worldviews of *Ilippallianginnarniq* (continuing learning) and *Inuit Qaujimajatuqangit* (traditional and modern Inuit knowledge), ensuring an underlying ethos of cultural relevance in areas of local education and information accessibility. Over the last decade, an extensive roster of publications, educational modules, and cross-disciplinary collaborations has been successfully developed towards these ends (see additional information at www.kitikmeotheritage.ca).

The model of community engagement provided by the *Community Insight Project* was particularly successful because it required little that could not be provided by the community itself. Aside from the initial impetus of digital equipment and student training, the project relied only upon resources available within the community. With such a project, there must be a guiding philosophy that individuals are more likely to learn if they are in a comfortable and familiar environment. Similarly, it must be assumed that participants remain more open to discussion and sharing their personal knowledge if they are presented with a situation where they retain authority even while learning to techniques.

This approach is not difficult to duplicate in other communities. The primary challenge to replicating this project would be finding appropriate sponsors to contribute audio-visual equipment (we estimate that roughly $2,500 worth of cameras, microphones, tripods and video tapes were required for our project), and to conduct the initial training required to give youth a degree of technological competency to begin teaching others. As mentioned previously, there are a variety of new media organizations that are willing to partner with communities to fulfill this role.

The e-Commerce Yukon Project: e-Commerce Business Advisory Service
A Community-based Business Advisory Service with a Focus on e-Commerce

Competing with or selling to larger markets can be a challenge for businesses in northern and remote aboriginal communities ICT, however, has the ability to level the playing field and improve the quality of life in northern communities by increasing income levels. To seize this opportunity, a business advisory service with an e-commerce focus was delivered on a pilot basis to three small Yukon communities. Based on the success of the pilot project, the program was later expanded to the majority of Yukon's communities. With broadband Internet available in all Yukon communities, the potential is there for businesses in Yukon communities to access larger markets and increase their revenues. Few, however, were using the Internet to its full advantage. It was suspected that the low uptake was caused by two factors: a lack of awareness of e-commerce tools and potential and a lack of skills for e-commerce implementation.

A workshop-based approach to addressing this challenge was dismissed because of difficulties in: designing a workshop for participants who have a diverse range of ICT skill levels, ranging from true beginner to highly sophisticated user; designing a workshop that recognizes that every business is different, and that a workshop format may not help the participants identify the strategy or tools that is best for them; providing support for participants once the workshop is complete. Experience has shown that a workshop can inspire e-commerce uptake, but frustrations during the implementation process often discourage business owners – making them less likely to engage in e-commerce when the opportunity is presented again; providing the workshop on a schedule that works for business owners and entrepreneurs. Business owners and entrepreneurs are often busy and may have irregular schedules or other commitments that conflict with a workshop schedule. A different approach was needed that would recognize and overcome the aforementioned issues, leading to the adoption of e-Commerce in Yukon communities.

The project partners wanted an approach that would: increase the revenues of businesses in Yukon communities by leveraging ICT to reach larger markets, build awareness of e-commerce tools and potential, develop skills in Yukon communities for e-commerce implementation, be accessible, in terms of both scheduling and suitability for each participant and, provide support for businesses through the implementation process. The project partners agreed that a business advisory service with a focus on e-commerce, if delivered properly, would meet the objectives of the program.

A business advisor and subsequent consultant was contracted to spend a week at a time in each of the selected Yukon communities and was available to meet with clients during weekdays and weekends, days and evenings. The flexibility of the business advisor meant that clients could access the service without having to forgo traditional activities (spring or fall hunts, or fish runs, as examples), miss important community events, or neglect other commitments. Multiple visits were made to each community, further increasing access to the service. The advisor provided custom-tailored assistance based on each individual client's objectives, type of business, and level of expertise. ICT learning was achieved through a one-on-one, hands-on approach. The advisor sat beside each client to work through the implementation process, providing assistance when necessary. Whenever possible, clients were challenged to figure out the processes on their own since this approach reinforces learning best. Follow-up support was made available between community visits. Some clients preferred to use telephone, whereas others preferred texting through tools like Skype or MSN Messenger. Some clients

were introduced to VOIP (some clients did not have telephones). Screen sharing on Skype was a valuable tool when the business advisor was providing remote assistance or problem solving.

The outcomes of the e-Commerce Business Advisory Service have been many. 121 clients in 8 Yukon communities have been served (to date). Clients have included: prospective start-up businesses, start-up businesses, artists/artisans and established small-to-medium-sized enterprises. These businesses have become motivated to embrace ICT as tools to help their business grow. Over 40 artists/businesses established some form of e-presence, either for informational purposes or for direct sales. Many more expanded or improved their existing presence. One start-up reported attaining full-time equivalent income within one month as a direct result of the assistance provided. Several traditional clothing producers have increased their production and raised their prices now that they have access to the world market. Several clients have embraced online advertising for their product/service, particularly in the tourism sector. Transferrable ICT skills have been planted in each of the communities. The long-term potential impact of the business advisory assistance is unknown at this point.

Community access sites were critical in the delivery of this service as many clients did not have their own computers or Internet connections. First Nations municipalities, Yukon College's community campuses, and community Chambers of Commerce assisted with program promotion. First Nations and Yukon College's community campuses provided private meeting space. Hiring business advisors who have experience delivering business advisory services in remote and northern communities is a key element of service delivery. The business advisors must have a good grounding in all elements of business strategy, management, and administration, but also in e-marketing and e-commerce. Familiarity with online advertising options, social media, ICT, and website development is essential. The business advisors must be comfortable working with clients with diverse levels of experience and expertise, and be capable of adapting their teaching style to meet the clients' needs. Extended visits made better use of travel dollars but also gave clients more opportunity to access the service. Multiple visits helped to increase awareness of the program and positive word-of-mouth reports within the community led to new clients on subsequent visits. Business advisory work is a long-term process and follow-up visits are essential in this regard. When the business advisors were not in the communities, follow-up assistance was still available. ICT was leveraged in this regard. Follow-up assistance helped entrepreneurs and business owners overcome frustrating challenges during implementation.

The project partners monitored the quality and uptake of the service by requiring trip reports (in which the numbers of new and existing clients and client hours are reported, but not the clients' names), but also by conducting telephone-based client interviews for clients who have volunteered to be interviewed (the business advisor was asked to provide the names of clients who agreed to be interviewed. Nearly all clients with telephone access agreed to be interviewed).

One of the issues we faces was when someone in (or closely tied to) a northern community passes away, everything in that community can come to a halt. Offices may close and events will be cancelled as people grieve and prepare for the funeral. In some communities, this process can happen quickly, but in others it can take place over several days, a week, or even longer.
On more than one occasion, communities were affected by a death just prior to a business advisory visit or during a visit. Unsurprisingly, this affects the level of programming. Because each community deals with death differently, the business advisors responded to each situation as appropriate to each community. While a death in a community may decrease service uptake, responding appropriately helps build trust within the community and can result in increased service uptake on subsequent visits.

The Council of Yukon First Nations and Government of Yukon's Department of Economic Development worked closely together on project oversight. Recognizing the value in local service delivery, the communities and First Nations have been supportive of the project. The e-Commerce Yukon Project's e-Commerce Business Advisory Service is a partnership between Industry Canada's Community Access Program, Government of Yukon's Department of Economic Development, and the Council of Yukon First Nations. Working together, the partners selected a consultant with the appropriate community-based business advisory and e-commerce expertise to deliver the service. The Department of Economic Development maintains a contribution agreement with the Council of Yukon First Nations, which, in turn, manages the contract with the consultants. The consultants met with clients at a time and locations of the clients' choosing, but based themselves out of the Community Access Program sites/Yukon College Community Campuses, or First Nations-related offices. With an adequate budget, this model can be duplicated anywhere. The model is particularly well suited to small and remote communities.

Geolocation Projects from HRC@P (Halifax Regional Community Access Program)

What is a Geocaching? In essence, it's "Using billion dollar satellites to find $5 Tupperware in the woods". It's a game played by millions, a treasure hunt, where free of charge you go into a website that gives you coordinates of geo-cache locations. There are millions scattered around the world. Once a participant finds a cache, they sign their name and log their coordinates on the site.

The Geolocation concept that geocaching is based on began when websites were no longer viewed as anonymous numbers, but as interactive maps corresponding to physical geographical location. It is built on the idea that things on the internet correspond to things on earth. The evolving Geolocation tools, geocaching activities and asset mapping offer an environment in which to share stories about physical locations in communities– stories about their past, their present and their future.

As an active living sport, geocaching can happen at all skill levels – a walk down the trail or a belay into aggressive terrain. It is a great concept to get people using mobile Information Communication Technology (ICT) and to get them out of their basements, offices or homes and into the countryside.

The idea to pursue a Geolocation project was inspired by a news article sent to me by a local CAP volunteer snow birding in Fort Lauterdale. The story told how telecentres in Florida were engaging the public by loaning out GPSs to people who would use them to chart where migratory birds were, taking photos of the birds, tracking the birds on a website and offering best photo contests with cash prizes.

After connecting with a local professional geocaching association, Halifax Regional Community Access Program (HRCAP) learned the rules of geocaching and developed the Geocoin Project which then became a vehicle that supported many local projects, and was even included "Come to Life Nova Scotia", the province's tourism branding campaign, and created an open invitation for the world to visit some of the provinces remote and isolated communities.

The challenge that was facing many remote communities in Nova Scotia was how to keep up with emerging trends in economic development and how to facilitate community members' understanding of the benefits associated with Geolocation technology, while further developing their computer skills, and teaching them how to use GPS units.

One of those communities was Terence Bay whose CAP committee, operating out of an elementary school, wanted to improve ways to network in their community. This community of 800 expanded a static website to a full community web portal, which included an asset map of the community sites on Google Maps. This increased the hits to over 1,000,000 per year.

In order to meet the challenge faced by communities, in Nova Scotia HRC@P offered support to local CAP sites for various projects that engaged the community in ICT. CAP sites offered learning environments to improve computer and internet skills, and to gain an understanding of Geolocation technologies.

With the support of Industry Canada's Community Access Program which has a mandate to make Canada the most Internet connected country in the world, HRC@P: offered grants to CAP sites for local projects and to hire CAP Youth Interns (CAP YI), purchased GPS units for all CAP sites ($89 each), suggested project ideas, offered workshops about Geolocation technologies for any member of the, community, shared information about Geolocation ICT at conferences, university groups, and gatherings, connected with local Geocaching professional groups to learn how the game is played, and what processes were needed to start a Geocoin Project (3.5 months), and shared Geocaching information with communities and created the custom Geocoin.

CAP Sites: hired CAP YI and engage volunteers to assist and encourage community members to improve their computer and internet skills and introduce Geolocation technologies, CAP youths learned proposal writing skills and begin applying for other grants, offered GPS units on a sign out basis so that visitors could borrow a unit at the CAP site and go geo-caching in the area, delivered ICT project ideas, including how to market and generate a small income on social media websites like 'YouTube', maintained a blog or website of local events, businesses and community activities, created an environment for the communities to explore Geolocation and other ICT technologies, and support the development of projects, such as asset mapping of the community on Google Maps and, offered GSP Camps for youth and offered Geolocation activities that engaged seniors.

These Geolocation activities introduced a variety of opportunities for communities to expand their skills, knowledge and networks, and increase their presence on the internet - and teaching principles of Geolocation. Some skill building activities included asset mapping community recreational sites, historical sites and cemeteries.

In 2008, HRCAP invested in minting 250 Limited Edition C@P Geocoins in collaboration with, and participation of, the Nova Scotia Department of Economic Development and Nova Scotia CAP.

The goals of the Geocoin project were to: encourage all regions of the province to engage in online usage that goes beyond the computer screen, foster healthy gaming habits, promote active lifestyles, educate Internet users on how to use GPS technology and to increase Nova Scotia's Internet footprint overall.

The project began in the community of Terence Bay Nova Scotia and they along with other communities sent out these Geocoins. Some of these communities are still tracking their coins today. The Geocaching website tracks who found what and where as well as how long and where the item travels. Each time someone finds an item or treasure, they report it to the website. It may be a simple treasure hunt... However the learning that occurs through this vehicle helps people to understand that "websites correspond to physical place" is priceless.

The success of using ICT and Geolocation technologies is most noticeable in the promotion of small businesses and industries. In Nova Scotia there a co-op of fishermen is developing a website allowing them to sell catches online before they are even landed. With the delivery, buyers will receive a certificate of authenticity that lists the Geolocation coordinates of where the fish was pulled out of the water. Although embryonic in development, this has the potential to significantly change the ground fish industry.

Most of the clients and volunteers who participated were on the marginal side of the digital divide. They were people struggling with the continuous change and growth of the internet and ICTs. Each CAP site implemented projects and programs based on the skill level and interest of the community members. The overall effect of the experience was the recognition that they had a lack of understanding of various ICT concepts and the realization that "Guess what! CAP isn't just about access."

There were some concerns raised about the investment in the Geocoins ($20,000 for 250 copper coins). The projected focused on the importance of active living and once it was understood that the coins were a small token representing the participatory learning that had taken place the issue was dropped as it was realized it was well worth the investment in learning.

The concerns were further alleviated once communities began to see the value of an internet footprint and experienced an increase in tourism. Smaller projects, such as Cole Harbour's asset mapping of history on Wikipedia, found an academic audience on Wikipedia when they created Wikipedia entries to Wikipedia standards of historical sites around the communities. Terrance Bay had a project based on the historical context of the location of the sinking of the SS Atlantic. In that context, while playing the Geolocation game you learn the account about the history of this disaster, the community and Nova Scotia. The Geocoin cache in this community began receiving 1,200 physical visits a year – increasing tourism and stimulating the local economy, affecting everyone from ecotourism operators to quilters and folk artists.

The success of the Geocoin project was due to hiring a local media firm to initiate a strategy to share the story coast to coast through major media outlets. A group in BC contacted HRCAP after seeing their project in the news to let them know that they are doing something similar in their community. Over 3 years have passed, and that initiative is still running strong, too.

Of the 40 CAP sites within the HRCAP, 25 engaged in a Geolocation activity and 12 continue to do so, ranging from the senior centres to community asset mapping of cemeteries and local history sites.

In the community of Terence Bay, population 800, the sum total of the learning experience was turned into a multi-million dollar project, to build a new community centre for the region.

This required both the volunteers and the youth hired through CAPYI to learn how to develop proposals. After several years of submitting applications, asset maps, and gathering a staggering amount of website traffic, and large social media campaigns, they were successful in accessing funds to build the new community centre.

As a result CAP sites continue to find innovative ways to improve skills and access to ICT, and increase the participation of those on the marginal side of the digital divide. They know it's not just a matter of teaching people to use today's browser but that things are evolving and becoming bigger than today. The success of the Geocoin Game strengthened the C@P brand and facilitated learning, but it was a Nova Scotia project and the legacy of its Geocoins will last for years and years.

PhotoVoice: Research Methodology with the added benefit of Information Communication Technology (ICT) Learning

The Qaujigiartiit Health Research Centre (QHRC) a community based health research centre, whose goal includes enabling health research to be conducted locally, by northerners, and with communities in a supportive, safe, culturally-sensitive and ethical environment. Often that requires them to teach people how to collect information using ICTs. One of the processes used in their research activities is a workshop that is taught by a method known as PhotoVoice. QHRC's **vision** is for a world in which no one is denied the opportunity to speak out and be heard.

Its **mission** is to build skills within disadvantaged and marginalised communities using innovative participatory photography and digital storytelling methods so that they have the opportunity to represent themselves and create tools for advocacy and communications to achieve positive social change.

"PhotoVoice, a technique based on participation, empowerment, and self-documentation, is a way of capturing images of one's everyday life experiences using a camera, then describing the images in the context of one's life, thus allowing others to gain an insider's view of everyday life in one's community" (Moffitt, 2004). It has been said that a picture is worth a thousand words, but it is more than that. By telling the story behind a photograph, individuals describe life in their communities and thus convey to others the context of their lives from their personal points of view. Participatory analysis begins with the participants selecting photographs to discuss. The photographer shares their perspective on why they took the photograph, and participants share their stories individually and then as a group, sharing their experiences and beliefs about the topic the photo represents" (From PhotoVoice.org). This process proved to be a good fit for our community with learning that went both ways. Consequently in May 2009 a community PhotoVoice training workshop took place in Iqaluit, The PhotoVoice methodology was used in a variety of health research projects involving numerous age groups. It was found to be most educational for adults who were previously unexposed to digital photography. An additional benefit to the project leaders occurred when the methodology was used with youth, as they often knew more about the cameras; the learning went the other way, and project leaders learned about the more advanced functions of the cameras,

The need for health research was identified to QHRC by the community. They implemented the methodology of PhotoVoice to accomplish that task. They did a series of consultation across Nunavut in 2006-09 and invited community members from all kinds of backgrounds. The people of Nunavut as a whole were the intended beneficiaries of this project, and it was the project participants who were ultimately the project's primary beneficiaries. They had their say about their priority health topics. Some stayed involved and became participants in the PhotoVoice projects. The health research projects that used the PhotoVoice technique were developed to address local concerns and were run by community members. It is important to QHRC that they try to use innovative processes to capture the knowledge. In this spirit each member of the community who took the workshop and acquired the skills to use a digital camera was able to become a researcher.

The QHRC is involved in various research projects on an ongoing basis as a result of its regular operations. Because of the consultative process they had gone through the need for this type of research project had been evident for some time. Finally in 2009, funding became available through Health Canada. It was then that they brought the participants together in Iqaluit to do the training on digital cameras and research methodology. The participants learned how to operate and understand the cameras, and were also taught some elements of photography such as composition and lighting. Following the training workshop, the participants went out into their communities and collected photographs for two days. The photographs collected were then discussed and associated with stories from the participants. The stories highlighted the multiple individual perspectives on the research issue, in this case climate change and health. The results were of the discussions were classified and themed. Following that the results were disseminated using a number of innovative methods including a museum exhibit which ran for 5 months in the summer and fall of 2010, an online photo gallery, a coffee table book, conference presentations, radio coverage and a journal article which came out in March 2011. A second project which involved which addressed a concern around the mental health and wellness of youth created posters that went out to the schools. One youth participant stayed with the project over the summer and helped create a coffee table book earning herself a summer a job and additional training and skills acquisition.

For those involved with the collection of images and stories for the projects the skills they developed through the workshop and practical application of the skills went far beyond learning to use a digital camera. It built confidence in the people, enabling them to learn new ICT skills and enabling them to share something that was important to them. It broadened their horizons by allowing them to take their stories to other communities and allowed them to participating in their community in a meaningful way. Through active participation in community-based research, community members were able to take ownership of their own issues and concerns and while at the same time gaining skills which would offer them opportunities to participate in similar research projects in the future. As previously mentioned one youth received a summer job as a result of this project. This underlines the idea that personal opportunity derived from the acquisition of practical ICT skills often leads to economic benefit and increases the personal confidence people experience, giving them the building blocks to succeed in life.

Using the PhotoVoice techniques those community members who were trained can now go out and capture images relevant to the research on different topics such as climate change and health and youth health and wellness. Youth, between the ages of 13 and 15 also gained additional skills progressed to taking video related to the research topics. The community research members were able to turn their images and photographic stories into tangible products which included coffee table books of digital photography, an online album, and research which was published in several newspapers and scientific journals. They were also able to produce an online video to assist other groups in replicating projects using the PhotoVoice methodology. The video can be found on YouTube, by searching “PhotoVoice: Climate Change and Health”, by Qaujigiartiit Health Research Centre (QHRC). Community members truly found their voice through the use of ICTs.

Funding was a key component of this project. QHRC has support from government and Inuit organizations. They are a well rounded non-profit organization. They work with communities to develop health research priorities to share with researchers coming to the North, as well as work with Northern training programs to facilitate northerner participation in the development, design and delivery of health research projects that are run in communities by community members. Another component to the project was travel and consultation, but that is not a necessity of the PhotoVoice methodology. At the most basic level all that is essential is the digital cameras, a knowledgeable project coordinator/team, and a subject matter that engages the population. The ICT learning acquired by the community members provided a base for the research.

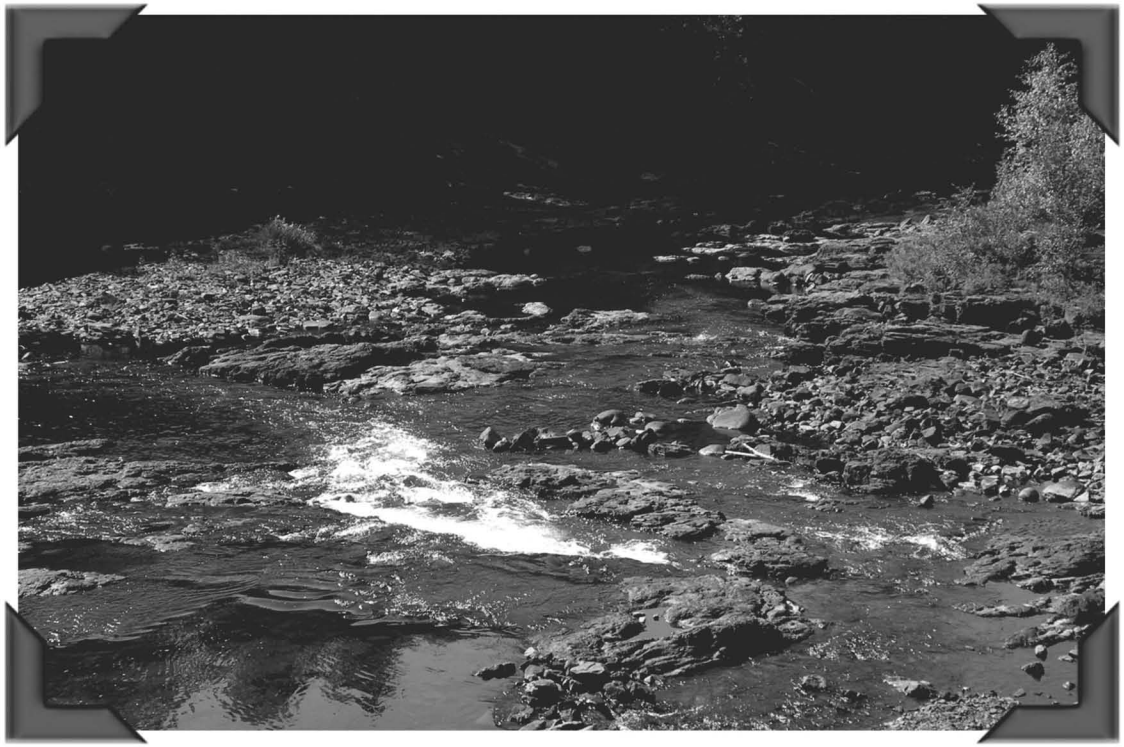
A strong network of contacts was needed in order to create a diverse group of participants. From the results of consultations with community members over the past few years, QHRC put together a document that identifies community criteria for good research in Nunavut. In it they identify that often there is a power imbalance between community members and researchers. In the research project which used PhotoVoice, the power gained through the learning process is in the hands of the community members. Community members who are not only are the researchers owners who will keep their photographs and the information they have collected and be able to put it to their own use.

QHRC developed a video on their web site (www.qhrc.ca) on how to develop this kind of project. People wanting to replicate this project can watch the video and come to this group for assistance. To replicate this project it would be necessary to learn PhotoVoice methodology, and have a foundation of data collection tools and research methodology.

MyKnet.org

MyKnet.org is a system of personal homepages operating as a First Nations social media online environment for people living in the remote communities across Northern Ontario. MyKnet.org was developed as a community-based, not-for-profit, and community-driven service by Kuhkenah Network (K-Net), the telecommunications division of the Keewaytinook Okimakanak (KO) tribal council in Northwestern Ontario back in 1998.

The KO tribal council is a non-political Chiefs Council serving Deer Lake, Fort Severn, Keewaywin, McDowell Lake, North Spirit Lake and Poplar Hill First Nations. The organization is directed by the Chiefs of the member First Nations who form the Board of Directors. Through its close awareness of community needs and its team approach, the Council advises and assists its member First Nations. The Council provides services in the areas of health, education, economic development, employment assistance, legal, public works, finance and administration, and computer communications (K-Net Services). MyKnet homepages serve as a locally-supported online social network for remote communities that are members of KO/K-NET Services. The homepages are often largely youth-driven but include elders, parents and everyone living and working in the First Nations and their family members in urban centres. To date there are over 30,000 homepages which are provided free of charge and free of advertisements. The idea came out of a need to find ways for these remote communities to communicate, interact and share information amongst each other.



MyKnet.org came about at a time when much of K-Net's broadband infrastructure was being built. This required K-Net to pursue many funding opportunities and partnerships in order to implement computer technology as a means of bridging social and technological divides. In doing so K-net realized that the communities and people they were working with faced a long list of challenges. There was the high cost of living, the scarcity of on reserve employment, the waiting lists for housing, sewage and water treatment issues, and concerns with youth having to leave home if they wanted more than a grade eight education. Add to that the medical issues with doctors who come and go frequently, the need to evacuate people with medical emergencies and the necessity to live far from home for prolonged periods when dealing with chronic illnesses. Within this environment of challenges the development of the K-Net network and the resulting increase in access to computers within the region was and remains pivotal to the development of MyKnet. It was these circumstances which led it to become and remain focused on local education, housing, medical services, and local media. In addition K-Net has also paid attention to the development of skill sets, particularly among youth, that are necessary for MyKnet.org to operate as a possession of the community which is focused on using the network as a means of supporting local communication and community-building. As a result the MyKnet.org homepages focus heavily on local activities such as public services like telemedicine and e-learning, as well as personal social networking practices such as communications directed between families and friends. All this took much patience and many years of collaborative work.

In 1994, members of KO Tribal Council which represented seven (later to become six) remote fly-in First Nations, organized a Bulletin Board System (BBS) for their communities and in so doing K-Net was born and began a process that endeavoured to live up to its amalgamated Oji-Cree name which means "everybody's

network". One of its earliest projects was to use the K-Net BBS to support a "Stay in School" project. As several First Nations communities only had a single public payphone or trail radios, it addressed a serious telecommunications problem by creating a link between the communities and their high-school-aged youth who attend school in far away urban environments such as Pelican Falls First Nations High School in Sioux Lookout using the BBS. At this point few communities and individuals had previous access to computers. That was the start of a long journey which saw K-Net rise to meet the challenges by continuously advancing the use of technologies and developing local infrastructure at the community level. This of course led to an increase in demand for service which they met by: establishing broadband services in remote communities, determining what servers were needed to support the social networking environment, developing the peer-to-peer social environment, developing a website platform or template, promoting the use of websites to communities, increasing bandwidth and meeting server maintenance requirements. Seven years later, patience and hard work paid off. By 2001, K-Net's continued search for funding opportunities and partnerships resulted in their evolution into a regional Wide Area Network and Internet Service Provider and allowed them to provide high speed broadband services in four of the KO communities and to establish a shared, high-speed satellite service for its most remote community. Before the K-Net BBS was laid to rest, MyKnet.org, from its early start in 1998, came into being with its own domain name and dedicated server. So from the perseverance and dedication of K-Net arose MyKnet.org and the network of homepages it represents today. It has also become so popular that its use has spread throughout Ontario, and it has also found users in Quebec, Manitoba and across Canada.

To what use are the homepages being put? The answer to that question is as varied as the users themselves. As the distances that separate families in the region is always a factor MyKnet.org homepages often serve as a means to engage in everyday communications particularly when family members or friends go to the city to find work or attend school. MyKnet.org sometimes acts as a substitute for the telephone, or it can act like community radio allowing individual community members and particularly the youth to participate and make their voices heard. Community radio remains important as both allow the content and information available through them to be owned and created by the communities. MyKnet.org also supports connections between communities. It is not unusual for parents to use MyKnet find their children when they travel abroad, or determine where they have gone within the community. MyKnet homepages often describe day to day community life announcing such things as births, graduations, marriages, separations, and deaths as well as information on local events, local programs, associations, and sports teams. Individuals also use homepages to promote business, arts, spiritual beliefs, and teachings.

What began in 1998 as a loosely structured system of personal homepages and blogs, grew to include individuals from more than 50 remote First Nations across Northern Ontario, Quebec, Manitoba and other parts of Canada who make MyKnet their virtual home. It is a home where they build bridges between youth and Elders with Elders learning from youth and youth learning from Elders allowing them to share their personal and community values. K-Net's continued faith in the communities and individuals to do what is right and appropriate has led it to evolve MyKnet to include new services such as meeting.knet.ca a service which provides a virtual meeting place and media.knet.ca which provides the community news virtually. There has occurred the creation of homepages for formal and informal learning networks amongst communities and peers such as the First Nations Student Success Program (fnssp.knet.ca) and MoodleFN Project (moodlefn.knet.ca) which produces Moodle plug-ins for Aboriginal schools and organizations. Some individuals began using MyKnet as a marketing and promotional tool for generating individual revenue, fundraising, and financial interest in their communities.

The journey from 1994 to 2011 has not been without its challenges and issues. There has been an increase in the demand for bandwidth resulting in the need to build bigger connectivity pipes and to provide ever faster access speed accompanied by a continuous need for increased server size and growing maintenance requirements. There have been changes in funding mechanisms which have required the program to adapt so as to fit within the changing funding opportunities. There have been Government offices which tend to block access to the homepages due to amount of time staff spends visiting and communicating on them. There have been times when individuals have posted negative or not so favourable information about others, about their community or about events they attended. In some situations the community leaders wanted the unfavourable information removed. This has lead to a requirement for education and information on what is appropriate to share on their sites.

Through it all patience and faith in its communities is what K-Net attributes to its success. Patience to grow a community motivated to utilize a system that created connections between individuals, between communities, between provinces and in some cases countries. It also requires a commitment to upgrade the platform, regularly, to listen to its uses and incorporate their suggestions into the platform thus ensuring that the local and regional leadership support the initiative had from the beginning continued. Support from all levels of government was also a key ingredient. This included Industry Canada's Community Access Program and its corresponding Youth Initiative. As a result, while the rate has slowed there continues to be new accounts started and new visitors to the homepages. Many members continue to use MyKnet as their preferred means of communicating with others even after the introduction of social media sites such as YouTube and Facebook. But through all these challenges K-net has prevailed and continues to be "everybody's network"

Video Conferencing: Uses and Issues in Northern Ontario's Remote First Nation Communities

Video conferencing is a creative way to tackle some of the issues facing remote communities where limited in-person physical services are offered. The use of videoconferencing for a variety of applications including health, justice, and education has solved issues in this regard for many remote communities. One definite outcome of increased video conferencing is improved technological awareness and a capacity building amongst community members in using and understanding the technology.

The need for videoconferencing services was the main driver in developing Keewaytinook Okimakanak (KO)/K-Net's broadband network. The use for videoconferencing developed over several years out of a natural evolution of online services such as an internet high school in Northern Ontario.

In one partner First Nation, Lyle Johnson who is now the video conferencing coordinator at K-Net, was living in one of the remote satellite-served First Nation communities in 2002 when they introduced the internet high school. They needed a high school technician and Lyle was able to meet that need. This was early in the development of high speed internet service in that community, so it was limited to low-bandwidth applications. Once the community's C-Band satellite system was installed they really got under way with video conferencing. Lyle relocated to Sioux Lookout in 2006 and started working for KO/K-Net supporting and promoting video conferencing full time.

The uses for videoconferencing services are numerous. There are many educational uses including internet high schools, delivering course content to remote communities, broadcasting student assemblies live, hosting participative virtual student assemblies, job interviews for hiring teachers and scheduled staff meetings. Post secondary education is also using the technology, with students in communities taking the B. Ed program through video so that students don't have to leave their homes and families and can also keep their jobs.

A particularly interesting story is the speech language therapists using videoconferencing to remotely deliver their services. A speech language pathologist in Burlington, Ontario delivers speech language training for special education students remotely, meaning the pathologist only has to travel to the communities once a year to do assessments and then can work with the students once a week by video conference. The community delivery of the speech therapy involves community liaisons that have taken training through video conferencing. This is developing the skills of the community because the people working with the students locally are gaining skills in ICTs through use of the equipment and also learning from the speech pathologist.

Health and wellness applications include telemedicine, administration meetings, public health sessions, and clinical purposes. Justice is also another big consumer of video services, delivering justice services in the north. Services such as victim and witness services, access to crown attorneys, and in some cases even trials have been conducted through video. Victims can meet with the attorneys well before the court date rather than just the day before. If they have a really light docket in a community, rather than flying the entire court party up they only send the duty council who then holds a virtual courtroom. Sometimes court gets weathered out of a community so video is a good option to get things done. However, they don't want to have video predominate in this and are trying hard to find a balance between the personal touch of having the court party go up, and the efficiency of the virtual courtroom.

To make these things happen, the K-Net team works with local community champions to get the equipment and facilities working and fully tested. KO Telemedicine is continually upgrading equipment for telemedicine, which has been a leading application for community videoconferencing. Most of the applications supported by KO/K-Net are program based and paid for through outside funders. Government agencies pay user fees to pay for the community's technology, facilities and bandwidth.

Videoconferencing and these applications provides leverage to argue for an equitable and affordable amount of bandwidth to support these uses. This brings more robust bandwidth into each community, which benefits everybody including non-users of the video services. Bandwidth is managed, with priority going to certain video applications at pre-booked times. This strengthens the case for managed networks when asking the government for more bandwidth. KO/K-Net purchases the bandwidth from the telephone companies and manages it themselves. They have 60-70 points of presence (POPs) in different First Nations across Ontario on the network. The partner First Nations then sell the bandwidth throughout the community so the community becomes their own ISP. KO/K-Net then works with the partner communities to develop their priority applications that help to pay for their network connections and services.

ICT Learning is achieved in various ways, even simple participation in a video conference and seeing how it works can be a learning experience for many people. There is of course more advanced levels of learning taking place, including: training sessions for First Nation Student Success liaison workers who learn how to work the equipment; training sessions with community telehealth coordinators on the bandwidth booking systems; working with others on setting up remote equipment if they want to use it locally; and the internet high school includes training on business technology delivered over video. There are numerous benefits to using the technology, and numerous benefits to the learning that occurs from its use. There is certainly increased capacity amongst community members with regards to the technology, as many more people know how to operate it. Those skills are of course transferrable, and many learners are now able to make use of those skills in new employment. There are jobs being created in the communities as a result of the increased skills and capacity. Telehealth coordinators and e-Justice coordinators are becoming more common and will likely eventually be found as a permanent position in each community. The use of video also results in potential cost savings on certain applications, so the agencies providing the services are benefiting as well.

There are challenges that arise out of the development of KO/K-Net's videoconferencing services. Bandwidth has always been a big issue. Some communities are sharing only one T1 link to serve all the facilities throughout the community. The bandwidth needs to be managed so video always works. This demand is now resulting in Bell Aliant constructing a fibre network to increase bandwidth capacity in these remote First Nations. Adequate bandwidth is needed to meet all of the demands.

There is often initial reluctance within the institutions to make videoconferencing work successfully. Once the institutions try it, they get interested and get on board. Sometimes video can also seem alien at first, so it takes time to get used to interacting in this new way. After some time, though, things seem natural and the interactions are very effective.

There are of course limitations to video that requires the institutions to address. An example of that is a story about a victim witness who had to deliver difficult testimony without any support. There was a call one day from the court in Kenora and the witness in a community couldn't make it out due to weather and the case would have folded without the witness. They set up a video conference in the local health centre. This is a great example of how equitable Victim Witness Services are required to support people living in these small communities. The story highlights the fact that some services require more development work to work effectively in remote locations.

It can also be difficult to manage the public perception of the technology, as its primary applications can have negative connotations, such as telemedicine (being sick) or justice (being in court). They are trying to promote video as a constructive social tool. They are trying to highlight benefits, such as if students need to leave the community for school, they can then connect with their family back home. It must be seen as a positive thing rather than only negative. Politics can also become a factor, as it is a sensitive issue to potentially lose face-to-face services delivered in the community. A chief in one community wouldn't allow video conferencing for justice delivery in the community because he wanted to hold the government accountable to holding court in their community a certain number of times per year, as promised.

Each of these challenges and perceptions take a lot of time and resources to improve but change is happening as people recognize that travel costs and its negative effect on climate change is understood. As more people and institutions accept that remote and rural communities have access to videoconferencing, new innovations make it possible for more and more people to use this important form of communication. Infrastructure developments will also be a driver for these developments as bandwidth becomes available.

Keewaytinook Okimakanak (KO), a non-political Chiefs Council which serves communities in Northern Ontario, is the parent organization to K-Net, the online presence of the KO. KO/K-Net is involved in providing a variety of technological services to the communities, including video conferencing among many others. The organization serves the First Nation communities across Ontario and other parts of Canada. KO/K-Net is a medium sized organization with a presence in many communities that delivers bandwidth and network management services to community owned networks that provides connections for all individuals in the communities served.

To duplicate this project, K-Net invites you to travel to one of the communities that these services support the delivery of community owned applications. This will allow you to see the development and use of these applications and see the realities in the communities. They recommend building relationships in the community and finding the community champions. The KO/K-NET story is one of doing it for yourself, as this maximizes benefits for the community. For an example on community internet service, if Bell or any corporate provider comes in, you are not building ICT skills or community ownership. There must be a sense of local ownership in each community, and this will lead to the development of real skills and knowledge. You will then need bandwidth. It may involve working with funding you can get from various branches of government. KO/K-Net gets funding from First Nations School Net, Health Canada, Industry Canada and provincial ministries such as Justice. On the technical side, they recommend developing your video applications in-house or using a similar software/hardware package to what KO/K-Net is using.

Marieval Enterprise Center
ICT Best Practices in Rural Communities 2010-2011

In the local area, there were a limited number of activities for seniors. The Marieval Enterprise Center Inc. (MEC) realized that there was a need to be addressed because many seniors would come to our CAP Site and ask about how they could learn more about computers, the Internet and how to use Facebook to keep in touch with family and friends. The main focus of the program was to ensure that seniors would become more comfortable in the language and uses of technology and how they could integrate technology and computers into their daily lives to create life-long learning opportunities.

MEC launched the Senior's Technology and Learning Café on November 15, 2010. The idea of the project was to create an informal learning environment whereby participants could be comfortable in learning and sharing information regarding technology and other learning topics. The Technology and Learning Café was introduced to diversify the activities in the region, address the increasing technology divide, that is leaving seniors behind, and reduce social isolation among seniors.

The goal of the Technology and Learning Café was to expand access to and use of technology and to increase and diversify the range of healthy aging activities offered in the area. This initiative encouraged seniors and community members to build leadership and life long learning skills; improve and share their knowledge; foster new understandings around technology, nutrition, fitness, travel, gardening; build and strengthen important community relationships; and develop community partnerships between local organizations.

The Café project was a ten month project with reporting to follow. The Technology portion of the project was maintained every Monday for five months with additional healthy aging sessions bi-weekly for four months and one month for final reporting. Each café session was documented through photography and video. During each café session there was time for coffee, tea and a treat. This social interaction was very important to refresh participants. The break created opportunities for participants to share learning experiences and laughter. There is a wind-up celebration scheduled for the end of June 2011 at which time the group will view the project DVD.

In terms of equipment needed, MEC brought a portable computer lab consisting of ten laptops, an LCD projector, video camera, tripod, digital camera and a donated screen which were used to deliver the technology training. Initially, participants had to share one laptop for two people. Participants who had their own laptops brought them in to reduce the reliance on the limited number of lab computers. We had between 15 to 25 participants at each technology session. There were 29 participants registered for the café. Additional community members attended the healthy aging topics such as fitness, gardening, nutrition and cooking for one or two.

Participants had to register for the program and paid a nominal fee of $20 to participate in the ten month program. This helped to cover additional operating costs of the program. If participants could not afford the registration fee, the fee was waived. No one was turned away from any café session.

In the Technology and Learning Café, seniors decided what technology topics they wanted to learn. MEC staff developed the training materials to fit the needs of each technology session. Training materials were printed out and given to each café participant as reference materials.

Another challenge was access to computers at home. In order for participants to make the most of the Technology Café, it was recommended that participants practice between cafe sessions. As the project started a computer loaner program developed for those participants who did not have a computer. They would be allowed to sign out one of the portable lap tops for the duration of the program on condition that they bring them back the laptop to each session.

MEC met with a local senior's group to discuss the possibility of a senior's technology project. An Advisory Group was formed made up of a MEC staff member and the local senior's group. This group drafted a project proposal which was presented to the senior's local membership. Once accepted, it was determined that is would be beneficial to incorporate additional learning workshops, on other topics of interest, including aging, nutrition and cooking for one or two. This was necessary to include a broader group of seniors who were not interested in participating in the technology sessions. The senior's group applied for funding for the project, in partnership with MEC, through the New Horizons for Seniors funding for Community Leadership. New Horizons for Seniors contributed $14,100 from New Horizons for Seniors funding with a cash contribution from the partner organization $1,799 and an in-kind contribution of $7,440 for a total project value of $23,339. There was also computer equipment purchased for the program including a laptop, touch screen, 21.5 inch All-In-One computer, a colour printer and a screen donated to the senior's Hall. The senior's hall installed high speed internet which is also available for other community members who would like to rent out the facility. In terms of jobs created, one position as the key facilitator was created for the project with one part-time position as a support person for the duration of the program. There has also been one on-going technical support person on a part-time basis.

Once the project was introduced, the impact of the program was almost immediate as participants learned new technology skills and practiced them at home. Seniors also become familiar with the hardware, software and language of technology. Some seniors purchased their own laptops for the first time and had high speed internet set-up in their homes. The long-term benefits of the program include life long learning technology skills that seniors can practice in their home. Participants reduced their fear of computers and technology. They have created their own Facebook and email accounts, learning to enjoy navigating the world wide web and so much more. Everyone who participated in this project were very pleased with the success of the project. The project has generated a lot of interest and seniors are energized and more confident about the technology skills that they have learned through the project. The senior's group decided that they would like to implement a second phase of the project in the coming year.

In order to replicate this model, another site would need to have access to computers (need to know how many participants they have and provide for a maximum of two participants per computer), an LCD projector, a projector screen or white wall or surface such as a white board, access to high speed internet, human resources, training materials and digital equipment to document the project. The site would also need to have access to some operating costs to cover the costs of human resources and the cost of training materials.
This initiative enhanced and diversified the number of healthy aging activities available in the local area for seniors. This helped reduce rural isolation especially during the winter months and encouraged community participation in the program until the end of June 2011.

MEC is an innovative business technology and resource centre located in rural Southeast Saskatchewan. Its goal is to empower businesses, communities and individuals to become proactive to develop business, community economic, human resource, environmental and youth opportunities.

MEC operates with a three member Board, Advisory Board, Chair and CEO. MEC currently provides a wide range of services including technology training and development, community development, project management, E-Learning and LAN and WAN setup. MEC is the Southeast Coordinator for the Community Access Program and provides technical support 68 rural and First Nation communities (23 are First Nation Communities). It is also the Provincial Coordinator for the Aboriginal Business Service Network. It is now introducing solar technology to generate heat and electricity and energy efficient construction through the creation of a demonstration home through Off the Grid One Step at a Time Project.

St. John's Native Friendship Centre – Digital Collections

The "Digital Collections Project" from the St. John's Native Friendship Centre (SJNFC) pulled together digital representations of the culture and heritage possessed by the Aboriginal communities in Newfoundland and Labrador. By hosting workshops in the CAP (Community Access Program) site, they were able to film the artists as they displayed their skills. Combining this with recorded interviews of the artists explaining the cultural and historical context of these activities, they produced mini-documentaries that could be shared with the general public via their web site. The final documentary, Naqitiapug Payhtam, Chiihkaanuwaaw,Nest'g (Feel, Hear, See, and Understand) has four segments, each displaying a component of Aboriginal culture, tradition or language.

Aboriginal artists often find it very challenging to showcase their art to a wide audience, while members of the general public often do not get to experience or understand the unique talents and techniques that they have to offer. In many cases, these traditions are being lost as they are passed down orally through the generations.

As part of their regular programming, the SJNFC invites Aboriginal artists into their facility to showcase and sell their art as well as to host various artists' workshops. Every Thursday, SJNFC's youth centre hosts "Traditional Thursday" where anyone to the age of 30 can watch the Inuit drum group (Strength of the Drum) perform at the CAP site, learn about story telling or participate in a smudge ceremony. The film was created by working within these established programs and documenting select stories.

Using digital representations, several aspects of Aboriginal culture, tradition, and language were made accessible to any members of the general public with access to the Internet. This benefits the artists themselves by bringing their story to the stage and showcasing their art to a wider audience thereby increasing the opportunity for them to sell their art to consumers. However, these mini-documentaries also enrich the viewers by letting them experience something they may not have otherwise understood, offering them a glimpse into the language and culture of Newfoundland and Labrador's Aboriginal population. Thirdly, this creates motivation for interested parties to access digital media and to use the Internet thereby increasing their ICT skills. On a related note, this creates an alternative learning environment for anyone interested in studying Aboriginal art. Furthermore, digitizing Aboriginal culture, tradition, and language brings it one step closer to being preserved in our modern world. Finally, programming at the St. John's Native Friendship Centre is given a platform in this video, and potential clients are made aware of some of the products and services available to them at the centre.

The human resources needed to deliver this project included one dedicated filmmaker, in this case, a young person hired under a youth program. In addition to the commitments of the St. John's Native Friendship Centre, the project was supported with $5,000 of Innovation Project funding via the Community Access Program Newfoundland and Labrador.
Because the budget was not large, the filmmaker used a Sony Handycam. While she found it to be a great camera, she would have chosen a higher quality camera, preferably not digital. The filmmaker learned during the project that using a low quality analogue-film video recorder will produce a better image then a more expensive digital camcorder, that is, unless your budget allows the purchase a more professional camera. The filmmaker also cited audio requirements. She used the camera's mic for this film which made editing and mixing much harder, adding hours of work in post-production. Having a good off-camera mic would have made the sound quality much better and the editing much simpler.

As for human resources, having an extra person or two to work on the film would have made for a lighter workload. The filmmaker was able to recruit a friend to help with the mixing, but cited that having someone help out with filming would have helped the process run more smoothly.

The filmmaker used iMovie 2009 for video editing and Ableton 7 for sound editing, but she would suggest investing in professional editing software for anyone aiming for a technically superior end product.

Originally the film was to be based around four workshops to be instructed by Aboriginal artists from each of the SJNFC's main groups: Mi'kmaq, Innu, Inuit and Metis. However, once preproduction started, some of the artists who agreed to be a part of the film were presenting a medium that was difficult to incorporate into a workshop format. As an example, one artist was to speak on his print making, and how his Mi 'kmaq heritage has influenced his work; however, having a workshop in his printmaking studio posed a problem because of space and availability.

The filmmaker was hoping to have the children from the SJNFC's youth center be a part of the workshops, to learn about Inuit drumming or to take part in a storytelling circle. Unfortunately, none of the children were interested and/or the parents didn't give consent, so more marketing and awareness may need to be conducted around a project such as this one. In retrospect, the filmmaker feels the turnout would have been significantly greater if they had advertised free workshops to the general public stating that they would be filmed.

Choosing an Innu artist was a great challenge for the film. Many of the artists spoke little English or lived in Labrador. There are many artists from Labrador who frequent the St. John's Native Friendship Centre, but trying to track them down for the purposes of this project was very difficult. The filmmaker eventually gave up on the idea altogether, but in retrospect she would have started contacting Innu artists sooner in order to make arrangements.

Creativity was paramount to the success of this film, and it certainly helps when facing the challenges that inevitably arise in an ambitious project like this one. The filmmaker's only hope is that someone would replicate this project and expand on it. There is much more that could be included in the film, and the filmmaker believes that more artists would become interested in being a part of it. More funding would be required to purchase or rent the necessary equipment and software, as well as to bring more artists in from different Aboriginal communities.

Awareness of this project has grown steadily, especially amongst the people who come through the SJNFC whether using the computers at the CAP site or meeting with someone in the building. Many are showing an active interest in the film, hearing about it through word-of-mouth and inquiring on when they can view it. By making it available in DVD format as well as online, the film can reach classrooms across the province or be lent out to anyone who may not have access to the Internet at home.

Women's Voices:
The Development of a Project-Based Learning Methodology

Women's Voices is the result of many years of trial and error in community education in adult ICT skills. The project's goal was to provide women with basic and intermediate computer skills through a participatory learning experience. The 'experience' is centered on achieving the specific goal of telling personal and family stories through new media, namely, digitally.

The idea for the project, to combine storytelling with computer training in a participatory learning environment, came from the local literacy office in Southern Labrador, called Partners In Learning. The idea was to learn by doing, with a group of women all doing the same thing and all at a similar skill level. By having a story to work on, the participants had very specific things they needed to learn in order to present that story and the accompanying photos, in an MSWord document and/or a PowerPoint presentation.

Since 1997, SmartLabrador has been working to address issues around the lack of services in Labrador as it pertains to information technology. At that time, there was very little in the way of ICT services, so SmartLabrador started to address the issues around access and connectivity. They quickly realized that people needed to have the skills to use new technology to ensure maximum benefit from it. Since that time they have been working towards different training initiatives aimed at building local skills in small business, municipalities and community organizations.

In 2000 Labrador was selected as a "Smart Community" by Industry Canada. SmartLabrador built a high speed network that included videoconferencing capabilities. The applications built within the smart community initiative focused on training. They partnered with the College of the North Atlantic and built "ICE (Information Communications Education) Technologies". This was an on-line program focusing on basic computer use. To support much of the work happening throughout the region SmartLabrador had field staff that provided hands-on support to the learners in the communities. The ICE training program was an online modular program that introduced new users to computers, the Internet and word processing. Forty-five people were trained in this program. The learners that took most advantage of this program were those in the most remote communities. SmartLabrador's field staff in the communities created awareness of the benefits of technology and offered a variety of informal training sessions. It was that hands-on contact with the learners that provided the experience and lessons to design future training programs. There was general dissatisfaction with formal classroom style training programs that were being offered so SmartLabrador realized there was a need to create a different type of learning experience. As technology advanced and people's skills advanced they moved towards a more targeted type of training. This training centered on projects and started to do things which incorporated participatory learning.

"Women's Voices" was one of those projects. It involved a group of women in L'Anse Au Claire who were working on a "Come Home Year" event in the community and wanted to contribute to a community booklet. This booklet was printed by a commercial printer and was sold at the event. The program provided training where participants were taught what they needed to know so as to accomplish what they needed to do. They were taught basic word processing, how to use a digital camera and how to work with digital photos and other necessary skills. The group of participants decided, as part of the training to work collectively to do a web site (Lanseauclaire.ca) and to learn the necessary skills. The training program focused on technology skills to enable stories for the booklet, the building of a community web site, a Women's Voices CD and a PowerPoint presentation for the project. Some of the products created were used

as part of a "Come Home Year" celebration, which is a week-long festival that happens during the summer time as a community reunion of residents and those who have moved elsewhere to live.

Participants of the training were not interested in attending yet another typical classroom setting for their training. SmartLabrador partnered with the local literacy organization to discover tips and best practices in the delivery and planning of the Community Voices program. The "facilitator's" (not the instructor's or the teacher's) role was to encourage and foster the sharing of knowledge amongst project participants. In the Women's Voices project everybody took part in the sharing and helping of one another.

Through various partnerships and training initiatives delivered over the years, SmartLabrador has refined the project based learning model that was used in this Women's Voices project. They have developed 'best practices' and have refined a model that works very effectively for the delivery of adult ICT training. SmartLabrador started as a community based organization and now operates as a social enterprise in Labrador. In effort to move toward a sustainable model of operation, they now offer a range of fee-based ICT services to rural and remote community operations, including businesses, municipalities and regional development agencies. Included in their range of services, is customized training, ICT support, project management and a range of web development solutions. Continuing their work in incorporating training components to all of their projects permits SmartLabrador to build on its strength to delivering programs and projects in rural and remote regions and to ensure skills are developed to enable and empower these communities.

SmartLabrador has just finished a new project where they worked with six tourism companies to move them onto an on-line environment for their marketing and sales. In many small communities it is necessary to start from square one to create a website for the community so that potential customers can find out more about the community as well as book on-line tours, accommodations and other services. SmartLabrador has also developed an online content management system that is utilized for all of its web development. This system was designed for people with little to no web development skills and provides a user-friendly process for ongoing website maintenance and updating that can be done within the local operation. SmartLabrador trains all of the companies they work with on the use of the content management system. The training component is delivered virtually through use of "GoToMeeting". Users learn all of the features of the system through this training method. This is low cost for the businesses and low cost for SmartLabrador. SmartLabrador has just completed their first year of sustainable operations.

The lessons learned by SmartLabrador have contributed to the organization's success, as they have refined a methodology that is replicable and that works for people and that people are interested in. SmartLabrador's training initiatives have had people with varying needs and abilities and have utilized the strengths of participant needs and knowledge to create a training model that works for rural communities and for people who prefer learning in open and participatory environments. SmartLabrador training experience has also demonstrated the value in using facilitators that have a strong base in community development.

Funding for the Women's Voices project came through the CAP program. There were also community in-kind contributions in space and SmartLabrador provided equipment and laptops for the training projects.. The small amount of funding has generated much more economic activity than it has cost. For example, many of the products of the Women's Voices project, such as the book and CD, were sold in the community. Elders have also taken part in SmartLabrador's training programs so that they do not have to be reliant on others to do simple things like online banking and communicating with family members who live elsewhere. Much of the population in Labrador's coastal communities is 65+ and they need to remain active. Many of the participants in the training projects are now community champions and CAP site volunteers. Also, the training and increased ICT skill level amongst community members has led to some of the more advanced initiatives such as the automated tourism booking system, which has generated more traffic and revenue for local businesses.

One of the challenges that have been faced by SmartLabrador over the years was encouraging people to continue their personal training. Sometimes people only take the time to learn the basic skills like e-mail or digital photography. There is a lack of appreciation for the process of lifelong learning. Creating the culture of knowledge seeking and lifelong learning within rural communities can sometimes be a challenge. People don't are not accustomed to learning just for the sake of learning – they learn in order to accomplish something specific and then it stops there. This has been the foundation of SmartLabrador's training methodology which has involved a project-based focus, teaching skills in conjunction with their application.

To duplicate these types of project based learning initiatives; there are a few key ingredients. First, it is important, to have an organization like SmartLabrador to be a community champion. Small communities need an organization that understands their unique challenges. Second, some funding is required but not a whole lot of it, so this is not likely to be a barrier. Bandwidth is needed to successfully capitalize and make the most of projects through video conferencing and on-line training. And lastly, you will need to have access to someone who understands the delivery of training in an on-line environment.

"Their Dream lives On"
A Media Arts Club Project in Northern Manitoba

Oxford House is a small Cree community that is approximately 600 km north of Winnipeg, Manitoba, with a population of approximately 2200 individuals. Up to 1972, students were flown out of the community to get their secondary education in the southern regions of Manitoba. There was a plane crash in 1972 which resulted in the death of nine students from the community who were being flown home from school. This led to a number of changes in the education system in the community, including the establishment of the local High School, Memorial High, in 1972. The year of this project was the 10th anniversary of the opening of its doors.

The community set up a Media Arts Club to provide training in basic and advance film production. Their first major project was the production of the Video "Their Dream lives on". The objective was to create a video presentation to capture the sentiments of the relatives and friends of the crash victims while highlighting the fact that their deaths, though tragic, was not for naught. Students from the Mature Student Program created this video as their contribution to the community's event. In part, the students: scanned pictures and newspaper clippings; video recorded interviews of family members and friends of the victims; video recorded various places within the community; obtained and added the CBC news broadcast of the event in 1972; edited the project; burned DVD copies for various members of the community; broadcast the project at the event using the various projection equipment; and broadcast the project on the local cable television channel.

There was no audio/video production equipment in the community so a proposal was submitted to INAC. Once funding was approved, they obtained a mobile lab from Apple Computers with the video editing software "Final Cut Express". Other Equipment obtained included: video cameras, digital camera (still images), scanner, printer, blank DVDs, various cables and connectors, LCD projector and an internet connection.

As this project was outside the regular classroom curriculum, students had to commit their spare time to learn to use and operate the various hardware and software. There was a very sharp learning curve for Final Cut Express and most students expressed frustration in using this editing software so they reverted to using iMovie HD, which was just as effective in getting the project completed. They solicited pictures and newspaper clipping from family members. The students were very engaged in this project and even had individuals going to other communities to collect materials from relatives. There were eight people on the production team and they all took turns with various aspects of the project. This included but was not limited to: filming,

transferring footage from camera and VCR to computer, scanning and organizing footage and images into files, editing, adding and adjusting music and sound, and connecting one device to the next for filming, editing and projection purposes. Some of them have indicated that they have used the skills acquired to create personal projects such as birthday parties and church functions. It took a little over three months to acquire the equipment and produce the first project.

The project had a major impact on the entire community on a number of levels. It was mentioned that this was the first time that most family members got a chance to express themselves publicly and there were some who expressed gratitude in being able to talk about the tragedy. The Chief and Council were very impressed with the project and requested that additional projects be done. For example, there was a fire in the community which was broadcasted over the local TV network. A council member took the opportunity to caution community members on bad practices that lead to fires in the community. The Health Department also requested they produce an infomercial on tuberculosis. Some members of the crew obtained their own equipment and continued to work on small projects of their own.

As the instructor for the Mature Student Program, Claude Pike was in direct contact with a "ready made" group of young adults. It was easy to motivate the students to work on this project as there were very few activities for them in the community after school and all of them were directly or indirectly affected by the subject matter of the project.

The biggest challenge was getting the students to use the technology as most of them were intimidated by it. Dividing the group into special areas (camera, sound, editing) allowed them to work in their comfort zone. However, each member of the team got some practice with all aspects of the process.

The project received very strong support from the Board of Education, the local government, SchoolNet, the local radio station and various community members. The novelty of the project also gave it momentum. The group was very helpful in ensuring that the project navigated the political machinery that is common to most Northern communities. There was one family member who was concerned that the project did not get permission to use images of her sister in the project. This matter went as far as the Chief and Council. The Education Director met with the family, which resulted in the concerned family member learning that the pictures were obtained from her mother with the mother's blessings. They were prepared to remove the images from the project as we did not want to create any unrest but that proved to be a non-issue.

The project got the attention of the local government. In light of the fact that the Education Department falls under the government structure in the community there was an overall acceptance and support from the onset. There was no negative political issue as the Chief and Council were always kept in the loop.

The club was treated as an extra curricular activity. The remoteness and size of the community worked to their advantage as this project provided productive activities for the team members. There were eight consistent members on the team in addition to five students from the Mature Student program that helped in the production process at various stages. The Education Department provided most of the financial support for the project, however, the local radio station, the health centre, and individual community members were also generous with their time and resources. The club was open to any member of the community that wanted to learn the skills of video production.

To duplicate this project, partnership with a school or organization would be necessary to run the project in the same fashion that this one was run. Equipment is needed, such as a computer lab, mobile labs, and A/V equipment. Also, a Media Arts Club, including community support, would be a key element in gathering resources and getting the project done.

Finance is always a major concern as ICT equipment can be very expensive and is often underutilized if there are no trained personnel available. This is where the school comes in, as there would be no need to duplicate purchases of equipment for community-based projects and hopefully the ICT teacher will be willing to volunteer their time for training.

It is much easier to develop a skills based program for a community using the established infrastructure within the community and growing from there. There is a great need for partnerships between the various sectors that are within the community's governance structure. This minimizes the small town politics, as everyone is then a stakeholder in the project.

TOGETHER AT A DISTANCE

Together at a Distance, or T@D, is an adult literacy project designed to create a foundation for e-learning in the Canadian Pan-Arctic. A portal with six workshops, e-learning research and appropriate third party e-learning resources is available online for free, 24/7. All resources can be accessed on an individual basis, or as informal small group cooperative learning sessions.

Inuit elders and educators collaborated with the project developer to ensure Inuit Qaujimajatuqangit principles provide the framework for the workshops. The workshops were created using an Open Source Learning Management System (LMS). In keeping with open source philosophy the project components are also shared with individuals and organizations for free. Workshops may also be downloaded for completion offline using a Web browser or re-developed for another LMS.

T@D was a three-year adult literacy project to create a foundation for e-learning in the Canadian Pan-Arctic. A literature review of related e-learning within Inuit contexts formed the basis for action, with all research being conducted during the workshops' pilot phase. All six workshops, research reports and related learning resources are being placed on the project portal http://togetheratadistance.ca.

Formal pilots are conducted to test workshops. Once the workshops are completed, they remain online for anyone to use 24/7, at home or in the work place.

Through observation of online learning and based on experience from previous e-learning pilots in the Nunavut Department of Education, e-learning has shown great potential, but there is a disconnect between the e-learner and successful completion of e-learning programs. In our experience, this was due to three main factors: issues around technology and lack of bandwidth; lack of e-learning skills and support from a learning community; and relevant content.

The first two workshops were written for those new to e-learning, especially in the first two of four literacy levels as defined by the Office of Literacy and Essential Skills Canada. The remaining four workshops are written for those working with and developing online learning opportunities for learners in their community (e.g. CAP site workers). The first three workshops may however also be of interest to school students, including those participating in e-learning programs as participants and or as mentors.

The precursor to this project took place in 2004 when the Nunavut Department of Education conducted an e-learning pilot. An asynchronous course called Common Plants of Nunavut was developed. Over one month, an e-teacher conducted a video-conference once a week with students in four schools across Nunavut. Elders also participated by video.

This project officially began in July of 2007. In-house, they developed an outline for the six workshops and built the first workshop so as to frame the project. Characters introduced in the first workshop appear again in subsequent workshops. This helps create familiarity – part of the process that supports the development of an online community.

At the end of the first workshop, Taloyoak Hamlet staff completed an online survey, followed by a two hour focus group. They expressed their appreciation of how Inuit Qaujimajatuqangit principles were used to provide a framework. They also felt the tools presented were valuable for their jobs now, and that the e-learning skills gained would help them explore e-learning opportunities in the future.

At Netsilik school, a half day workshop with teachers was observed to be of greatest interest to the Inuit teachers in particular, who understood that if they complete the two final workshops, they would have the knowledge and skills to create new e-learning resources in Inuktitut. This was exactly the reaction we wanted to hear and see. Looking forward there is a strong belief that as e-learners become developers this project will have an impact well into the future.

From the wider community the project has gained support through pilot workshop volunteers. This project presents a win-win situation as volunteers gain e-learning knowledge and experience while we gain valuable data that is used to improve how workshops are developed as well as increasing the body of research in the area of e-learning.

The project also has a volunteer Advisory Committee with members from the NWT Literacy Council, Nunavut Literacy Council, Nunavut Arctic College, the N- CAP, the Torngasok Cultural Centre in Nunatsiavut and HRSDC.

Some challenges faced were: introducing new concepts, new ways of learning and new technologies as with any project it required careful thinking, planning, and communication. We often reiterated a saying we learned from the Centre for Distance Learning and Innovation (CDLI) in NL: "Well begun is half done"; project timelines often had to be adjusted to suit seasons and work schedules. The contribution agreement with HRSDC had to be amended several times until reaching a point where the project picked up momentum thanks to a dedicated and well organized team. Another issue arose with the second wave of H1N1 in 2010. We realized that with the second wave, pilots may not take place as scheduled. After some discussion, team members quickly adjusted schedules to move the capture of data well into the Spring of 2010, after which workshops were fine tuned up until the project completion date of July 9, 2010.

As a literacy project, the first two workshops, "What is e-learning" and "How to take an e-course" have been developed specifically for e-learners in the first two of four literacy levels as defined by the Federal Government. The remaining four workshops are targeted at individuals and organizations who informally or formally wish to help, mentor, teach, or develop e-learners and e-learning resources.

An example of a potential client would be a CAP site worker (volunteer/intern/employee) who completes "How to adapt an e-course". Upon finding relevant material from one or two of the related online resources from the portal, the CAP worker re-develops material to suit a local audience. This may include synchronous communication so as to help CAP employees and clients in other communities.

The portal and workshops are available to anyone, free of charge, 24/7. If however another site wished to modify the materials, they could do so. Links on the portal can be copied. Workshops were created in a Moodle Learning Management System and can be exported as LMS content packages to any compatible LMS. Another LMS could be hosted on a local server so as to reduce Internet traffic. Alternately, workshops as they exist can be downloaded from the portal and run as stand-alone websites.

Moodle is an Open Source LMS and is, therefore, free. It is recommended that a third party host and maintain the Moodle site. This can cost less than $1,000 per year. If an organization chooses to re-develop material, it is recommended they hire an Instructional Designer.

Film & Television Skills Promotion in Clyde River

Clyde River has undertaken a number of projects over the past few years in order to promote skills in television & film production. Projects have ranged from basic operation of video cameras to full scale film and television production. The latest achievement is the production of Inuktitut versions of the popular APTN cartoon 'Wapos Bay'. Other achievements include teaching adults to use video equipment to document cultural activities to preserve knowledge and running a territory-wide Film Production workshop. The workshop taught adults from all over Nunavut all elements of film production including operating a camera, sound and lighting, editing, budgeting and funding, storyboarding and other skills

At first, there was a desire to preserve cultural knowledge as the elders in the community were passing away. That need was the initial spark that set the film and video skills development in motion. Elders had expressed concern that as more and more of them passed away, so too did their unique and valuable knowledge of local history and land skills. One thing that worked well to preserve their knowledge was using video cameras wherever possible in order to achieve a lasting record of events and the skills and knowledge shared at those events. From there, as skills in use of video equipment progressed among the population, more and more interest developed to the point where people demanded full scale video production skills.

The Ilisaqsivik Society gradually purchased video equipment and developed training opportunities. It took several years to get to the point where they are at today. It started with basic consumer level video equipment and then gradually developed towards more advanced and professional equipment as the complexity of the projects and work being done increased over time. Being able to interact first hand with the technology and being able to see the benefits of using it was a critical factor in the rapid increase in skill level of the people involved. The projects taken on have definitely fulfilled the needs of the community and they hope to continue developing skills in more of their population.

Their efforts in film production and development have seen increased economic benefits through additional local jobs and job opportunities elsewhere for individuals who participated in the projects. There were several groups who benefited from the efforts thus far in film production and development. First of all, the community has benefited through increased training amongst the population, as well as a direct economic benefit provided through employment and investment. Second, all of the attendees from across Nunavut who received training at the Winter Institute Project have benefited through additional employability skills. The effects are definitely long-term in nature. The skills gained during the projects will stay with the learners forever and will provide them lots of opportunities going forward. Their additional employability skills should also bring further economic opportunities to their communities as well. This project has been one that has grown and grown in size and complexity and it is continuing to do so. It has taken several years to reach the level of capacity the community currently has, including a successful local film company and some other commercial successes arising from these efforts. It is hoped that further efforts will continue to yield further benefits.

There is a unique collection of ingredients that has made our work possible. First is the coordination and leadership provided by Ilisaqsivik Society's Board of Directors and Staff who provide funding and coordination for projects such as these. Next is the existence of and funding from N-CAP that has allowed for the purchase of equipment over the years. Finally is the interest and initiative shown by members of the community who wanted to make things happen. Without their expression of a need for these activities, they never would have taken place. The community support for both the Ilisaqsivik society and their projects is shown in various ways including in-kind donations.

This type of project requires balancing good equipment maintenance and care while making the equipment available to as many community members as possible. This is an on-going challenge. Sign out sheets and maintenance schedules are used to help control the equipment. There has been consideration of charging a small fee to cover maintenance cost but it has not been implemented. The climate conditions in the North make the problem of equipment care and maintenance even more challenging than it would be in a more temperate climate.

Ilisaqsivik is a community run organization and as such has a very good relationship and works closely with the Hamlet Office, with the Elders Committee and other community organizations. Community politics have in every way helped this project through advocacy and funding at the level of Hamlet and in kind support from the School and the different community committees.

The Ilisaqsivik Society is a non-profit group whose mandate is to serve the community of Clyde River and Nunavut itself through wellness, social and economic programming. The organization consists of over fifty full and part time staff and is involved in coordination a variety of different projects and ongoing operational activities. Most residents of Clyde River are in some way affected by their services and their intention is to serve the entire community.

The key element to Clyde River's success is having the existing capacity at the Ilisaqsivik Society to apply for funding and coordinate projects. That administrative oversight has allowed to the community to go out and accomplish the things it sets its priorities on. Also important would be the existence and willingness of funding programs and agencies to support the projects, which is aided by the society's long standing ability to successfully deliver on projects. Essentially, success is attributable to the ability to capably prepare project proposals and stick to them.

Arctic Bay Traditional Name Placing Project

This project started by engaging the elders around Arctic Bay to come into the CAP site and look at maps of the surrounding area. The elders recorded their recollections of the histories of different areas as well as their traditional Inuktitut names. They made these recordings in both audio and video formats. Following that, hunters who were going out on the land on snow machines were loaned GPSs so that they could record the coordinates of each of these traditional places. Later, a photographer was sent out to take pictures of each of these places. Finally, using Google Earth and other software these locations were charted and by attaching the rich media collected (audio, video, digital photographs, etc.), the viewer could now gain knowledge of the local area. Assistance with this was provided by Nunavut Arctic College under its literacy program.

This project addressed several needs. In many instances there were young hunters on the land without GPSs who had gotten lost. With proper mapping technology such as was gained through this project, this situation was improved. Also, it made it easier for Search and Rescue to find lost people. In addition the historical knowledge about these places was often being lost as each elder passed away. This project was pivotal in preserving this knowledge before it was lost. Attracting people to come and explore this area is often difficult so this project helped to encourage visitors to come and explore this area. Finally, elders who are home-bound are still able to see these locations and read about them and hear about them through the interactive web site.

ICT learning was accomplished in many different ways. Those helping to map the coordinates had to be taught how to use the GPSs and then taught how to properly format the information for download onto computers. There were several youth interns assisting on this project and they were taught file management, video and audio production, formatting and reformatting to multiple uses and how to use free-ware to accomplish their goals. This project has also made elders feel empowered by sharing their knowledge and has also taught them the various ICT skills needed in order for them to access the diverse information available on the web site. Through the project it has been noted that many community members, especially those 45 years and older, expressed less fear of using technology because of their exposure to this project.

They now have a fully interactive web site that contains rich media on all of the out-lying areas around Arctic Bay. This web site will be able to be used for years to come. Many people now have access the unique history around this community.

Funding for this project was a mix of federal and territorial funding supplied through N-CAP. The real success of this project, though, was in the community support. Many people in the community were motivated to support this project. Youth took part in the planning discussions and interviews, hunters mapped the actual areas with GPSs, elders were interviewed and provided many insights, and youth interns and others helped pull it all together.

There were challenges and these were largely focused on deciding which mapping platform to use. Several were tried before the final was selected. Also, due to capacity issues, the CAP site did not have its own server so it needed to find this kind of service elsewhere which caused extra time delays.

Nunavut Youth Consulting is a not-for-profit organization with a membership of approximately 25 community individuals. There is no full-time position. This organization is run by volunteers and part-time youth interns. Nunavut Youth Consulting is involved with such community organizations as Cadets, Nunavut Hip-Hop, Skills Canada, Inuujaq School programs, the Community Access Program and various local businesses.

To duplicate this project, you would need support from the community and elders. A partnership would need to be formed with the local or government agency that looks after geomatics and whichever local agencies are concerned with collecting traditional knowledge.

Igliniit (Routinely Travelled Trails)

The Igliniit Project was an International Polar Year (IPY) project that took place in Clyde River, Nunavut from 2006 to 2010. It brought Inuit hunters and geomatics engineering students together to design, build, and test a tool to assist hunters in documenting their observations of the environment. By combining a global positioning system (GPS) receiver, a mobile weather station, a personal digital assistant (PDA), and a digital camera, the hunters and engineering students in Igliniit co-developed and piloted a system that allows hunters to contribute to environmental research in an active way, through the regular use of their environment, documenting observations and experiences in context, as they happen.

The idea for the Igliniit Project developed in Clyde River, where Dr. Shari Gearheard, a geographer and research scientist with the National Snow and Ice Data Center at the University of Colorado in Boulder, has worked with Inuit hunters and elders documenting environmental change since 2000. Gearheard and some of her Inuit research partners came up with the idea for creating a system that allowed hunters to log their observations of the environment as they traveled so that the information could be mapped easily and immediately. The Igliniit Project came to life when it joined several other northern projects to create the Inuit Sea Ice Use and Occupancy Project (ISIUOP) based at Carleton University. ISIUOP was successful in obtaining a grant from the Government of Canada International Polar Year program.

After settling on a concept and securing funding, the project team in Clyde River knew that the project depended on a strong, diverse, and well-linked team. Gearheard (who lives full time in Clyde River), working with project coordinator Gary Aipellee, contacted Dr. Kyle O'Keefe at the Department of Geomatics Engineering at the University Of Calgary Schulich School Of Engineering to establish a collaborative partnership for developing the technical equipment in the project. O'Keefe helped to identify the students with the right group of skills to work on this project.

With a team in place, it was time to focus on the hardware. First, the team worked to identify the most basic requirements of the hunters that would drive the choices for the most appropriate hardware. Those basic requirements included GPS tracking capability, ability for hunters to log observations quickly on a simplified touch screen, touch screen text in Inuktitut, ruggedness, a reliable power source, and the ability to record the weather. The students, after considering these needs and the project budget, decided that a combination of some off-the-shelf products would be the best option. They settled on a ruggedized PDA as the data collection device. For the mobile weather station (connected to the PDA by serial cable) they chose a pocket weather meter. The hunters approved of the size and weight of the instruments, noting that they had to be lightweight and easy to move, store, and operate.

With the basic hardware identified, they focused on the most important aspect of the system – the interface that would allow the hunters to record their observations. Facilitated by Aipellee and Gearheard, the group of hunters in Clyde River met regularly to discuss their ideas. After each

session, Gearheard compiled meeting notes and shared them by e-mail with the engineering students in Calgary. The students in turn would respond with questions, answers to questions, and photographs and drafts of potential designs. The software was refined through a back and forth between the hunters in Clyde River and the engineering students in Calgary. Features and usability were considered and developed by the students as best as possible. The hunters developed a list of twenty key observations and organized them according to five categories: animals, sea ice features, land features, hunters' list and other.

The Calgary-based students brought up the first iteration of the technology, after a year of long distance co-development, and the team spent three days indoors reviewing the functions of the PDA and weather station and practiced entering observations into the touch screen. Everyone immediately saw how having the system in Inuktitut broke down some barriers to using computers. The three unilingual hunters in the group were able to pick up the unit and start working with the pages and entering observations right away. The icons and Inuktitut made it simple to navigate through pages and to choose observations quickly. The engineering students had also included a surprise for the hunters – a selection of games. Computer solitaire is a very popular game in the community already, so the hunters were happy about the addition. The games ended up having a very useful and practical purpose during field testing as well; they provided welcome entertainment when the hunters were waiting out bad weather or when the kids were getting bored at camp.

Once the hunters were familiar with the hardware and using the interface, it was time to install the units onto the hunters' snowmobiles. The hunters led this portion of the (mechanical) engineering since they are the most familiar with the machines. Most Inuit hunters are skilled mechanics by necessity, as they are frequently making repairs and adjustments at home and on the trail.

With the engineering students still in Clyde River, the Igliniit team started its first season of field testing. The group spent two days traveling the sea ice near the community, practicing entering observations, asking questions, and identifying any problems. They stayed relatively close to the community both days, traveling approximately 60 km each round trip. Since Igliniit was meant as a tool for hunters to use during their regular travel, the trips entailed accompanying them to check on seal nets and visit some nearby cabins, common activities for the hunters. As the season progressed and the field testing continued, some problems began to surface due to the harsh arctic conditions that the hunters are often exposed to. Problems included broken and frozen serial cables, screen freezing, broken mounts, reported software bugs, among others. For many of these issues a fix was available and solutions were designed including more ruggedized cabling and a heated case for the PDAs, but these solutions had limited effectiveness and did not prevent issues from recurring. Also, due to the remoteness of the community, waiting for replacement parts to arrive from the south was sometimes enough to prevent solutions being implemented at all.

The testing continued through a second winter, and more refinements were made to making the units workable in the arctic conditions along with software optimizations suggested by the hunters to make observations more useful. After two years of testing, the units were accomplishing their purpose but were plagued by hardware issues relating to the harsh conditions and rough travel they endured. Even with all the refinements, customizations were not quite rugged enough to stand up to conditions. When the hardware was working, however, (and several units did work

problem-free) the Inuktitut-based software, the key to the project, proved to be very useful for hunters to log their observations. The core objective of the project was achieved and successful.

The collaborative team-driven approach led to everyone being very involved and engaged in the project. The hunters were learning to master and manipulate cutting edge technology. Of course it was not only the hunters who were learning, as this involved learning for everyone, including the engineering students who already had advanced skills.

The project focused on the development and testing of a new concept and was met with success and challenges. As mentioned previously, the hunters agree that the idea of logging observations using such a system is very exciting and they found the software program developed by the engineering students to be easy to use and modify according to their changing interests (i.e., adding or deleting observations). The hardware, on the other hand, presented serious challenges in the most extreme conditions. As the hunters became more familiar with the technology and more comfortable incorporating this type of observation into their regular activities, the hardware malfunctions and breakdowns became increasingly frustrating. On the positive side, it seems plausible that these problems will eventually be solved through using the right hardware or engineering a model that can endure normal Arctic travel conditions (hardware has already changed dramatically since the start of the project in 2006). The challenge will be to find these alternative solutions in a system that is affordable to individual users.

Despite hardware problems and the challenges of using such technology in Arctic winter, the data collected by hunters provide detailed, dynamic, year-round, geo-referenced information about the environment that could otherwise not be collected. With continued development, this technology could be useful in many different regions and applications for understanding the environment and human–environment relationships over time and space. The approach, of supporting local people in their own activities year-round and outfitting them with a simple but powerful tool to document their environmental observations, proves a promising method in future community-based environmental research and monitoring (not only in the Arctic, but world-wide), with applications as well in land use planning, resource management, hazards mapping, wildlife and harvest studies, and search and rescue operations.

The Igliniit Project is an example of multi-disciplinary and cross-cultural collaboration in the deepest sense. Engineering, technology, and Inuit knowledge came together to produce a new tool that provides tangible, useful information with broad application. It highlights the results that can be achieved when academic research is blended with community-based expertise toward a common goal. It also provides a case study for creating a practical, project-based experience for students. The "client-based" approach of Igliniit for the engineering students gave them a specific task with a specific group to satisfy, but most importantly, in the context of collaboration and co-development. The ultimate goal of the Igliniit technology is to provide hunters and other observers with a user-friendly and Arctic-worthy method for recording geo-referenced observations of their environment. These observations, when mapped, can be used locally and in other contexts (e.g., land use planning, wildlife management, protected area planning) for data collection, analysis, and decision making.

The local situation in Clyde River positively affected this project, as without the support of many key individuals and the support of the community at large including the CAP site, this project could not have succeeded. Some of the success can likely be attributed to the collaborative methodology used, resulting in strong community and project team engagement in the project. To duplicate this project a community would need strong relationships with some type of research institution or university and would need strong community champions to drive the project's success. Funding would also need to be secured and therefore skills in project fundraising would be needed.

This project was collaborative and supported by a local organization – the Ittaq Heritage and Research Centre. Ittaq is a community-based organization overseen by a board of volunteers whose aim is to increase the level of local leadership and participation in heritage and research activities in the community. They are still developing the organization and have completed several projects to date.

BLACKOUT MUSIC - Underground Hip Hop

In October 2010, a group of young men came together to create Blackout Music, a hobby that became their passion – underground hip-hop music. They share stories of what they observe in life around them. Each brings a unique perspective and creative talent (song writing, videography, photography, beat development and sound mixing) to the group. Starting out in a small room, they built a functioning home music studio equipped with the computers and various open source programs to create their own music. Using YouTube and Google, they developed the skills and knowledge to record their music and videos, and collaborate with other artists in New Zealand and the United Kingdom under creative copyright licensing.

Each member contributes resources to the development of their music. Their primary outlet is YouTube so that this music can be shared with others. They have also begun to develop promotional materials, such as t-shirts.

Each of the members has experience working in the hip-hop music industry in Canada. They came together wanting to create something they could call their own, something that would contribute, not only to industry, but towards developing their musical skills, their passion and their ability to share their stories. They also wanted to form something that would be self-sustaining and would support their children and families.

The whole process has evolved. It now also serves to encourage self-exploration, self-expression and self-development through a creative musical outlet for themselves and for others.

This group of young men has an understanding of the hip-hop style they want to create and share with others. Their experiences have taught them how to create beats and rhythms and by accessing the various online open source tools they have learned how to create and record their musical stories.

They have utilized Skype to connect with hip hop artists from New Zealand and the United Kingdom and, under an international creative copyright license, collaborate to create music which has an international influence and has increased other's perspective of the world around us.

Hip-hop is empowering. It encourages people to share what they see, to share what is happening around them, and to feel pride in what they do. Underground hip hop, while outside the mainstream music and entertainment industries, gives a voice to a part of our communities that sometimes feels unheard.

Since October 2010, these young men have uploaded five music videos they created and the group they created, Blackout Music, now has a couple of videos on YouTube, as well. They developed, mixed, edited and uploaded these videos themselves. They now offer workshops on how to create this style of music and are sharing what they have learned with others. Their next step is to develop a website from where they can further share their music, as well as lists of the resources available to other developing hip-hop artists. The group is not only available to deliver workshop for those interested in the style but they are also available for public performances.

Each member of the group contributes resources which has created a self-generating and self-sustaining model for the development of their music. It was the hip hop community that brought them together and inspired them to create their own music. In creating their music, they have used the following: an iMac to mix, edit and record, a microphone, a video camera and lighting equipment. They have also used a mix of programs. Some are open source, some are free and some are purchased. They include: Mac Final Cut, a non-linear editing software application; the website http://www.propellerheads.se/; Reason, a virtual studio rack to generate beats, Recycle, an audio chopper, sampler and editor; http://fruity--loops.blogspot.com/ for sound generators, beats, plugins, sound packs, beat makers, drum machines, videos, audio, music, and production resources; Cool Edits, a multitrack audio editor and mp3 converter; Sony Vegas for video production, streaming content creation, broadcast production; and Photoshop, digital picture and photo-editing software.

There were challenges centred mainly around deciding which platforms to use and which programs are available. Several were tried before the final selections were made.

Blackout Music is a developing record label in Winnipeg for local and international Hip Hop artists with a passion for creating, recording and sharing their music. This is a participatory collaborative model and Blackout Music is available to offer workshops about creating and recording hip hop music, public performance, and is open to working with any hip hop artist interested in producing their own sound.

The approach is to "Just do it" and say it from the heart. Individuals and groups can easily duplicate this in a project by having a PC or Mac (preferably a Mac) available and downloading free and open source beat and mixing programs to begin creating their own music. For those wanting higher quality audio and video, it is recommended to purchase professional level programs, which can be costly at first, but in the end creates higher quality productions.

All the Voices: Grassroots, Participatory Community Media

Community Media is not a new idea. It has been around in some form for quite a while but it has been on the decline in most communities for a long time. Community Media includes television, radio and other sources of information sharing. Some communities in Newfoundland have seen a move away from community media towards the assimilating allure of popular culture and increasingly homogenous global media. This story is about counteracting that trend and re-establishing participatory local media. The story mostly involves efforts around community radio but it is much more than that. The projects are locally-driven and are supported through Ryakuga Grassroots Communications.

Newfoundland's community radio efforts are a different approach to an old idea. It is community radio with multiple components. This includes getting the community together to share stories, celebrating their culture in a public place and creating an interactive dialogue as opposed to a one-way flow of information. The last component is using the internet and new media, such as Skype and Facebook, which can be used in radio.

Participatory communications such as community radio can energize rural communities. If offers a unique space for community members to work together on a project, encourages dialogue and fosters cultural celebration – all shared via radio and the Internet. There is a strong interest in these types of projects amongst people in Newfoundland and very strong support and feedback from the communities that have begun this type of work. Newfoundland is frequently suffering from outmigration due to people seeking opportunities in other parts of Canada and these events can help re-create the community as people can view and participate in the event from wherever they are.

Ryakuga's interest in community radio is principally in a participatory, volunteer-controlled, informal process which focuses on interactive-dialogue and cultural celebration. Their efforts include local radio broadcasting and webcasting but with a different approach than conventional radio that is produced entirely within a studio. These projects are instead more collaborative and involve members of the community as content producers and derive their content from interactive community events. The story of Bell Island is a good example of the type of project that happens when this approach is used.

In March 2011, the town of Wabana on Bell Island hosted their first radio event. This community was in trouble after the mine shut down. They needed a communication process so they could start talking to each other and newsletters were not working. Community Radio was the answer. The whole community rallied behind this cause and took it upon themselves to learn the skills required and obtain the equipment needed. A week-long community event took place which was the result of a lot of hard work on the part of the community. It also served as a graduation event for the participants and celebrated their efforts in training themselves. It ran for one week and was hosted by St. Michael's School Library, where the environment was modified to create a comfortable laid back community atmosphere. Stacks of equipment were brought in and set up throughout the space. The programming was created by volunteers and coverage included news, interviews, a talk show, call-in song requests, sports, history, and lots of other topics selected to attract audiences of all interests and ages. Many people got involved in the project and in creating the programming. The broadcasts were also sent out via webcast and were picked up by many people who had moved away from the community. The project was a real success and there is talk of bringing a permanent live station to the community.

Prior to the week-long event, there were numerous workshops. People would come out and talk about what skills they wanted to learn. A teacher was not thrown at them to tell them what they needed to know. People requested certain skills training and then hired local people to become facilitators as people learned more. The Bell Island experience is an example of how a special community event of limited duration can be used to impart lasting skills and value to a community. Local people are taught to set up their own community radio and are able to connect and share over the internet. Skills are left in the community so that they can replicate these things on their own after the event is over. Regulatory approval is not difficult and can be done through the CRTC. It is relatively inexpensive to setup, with costs running at approximately $10,000 to $20,000 for the project, depending on in-kind support.

The Bell Island event was the first project supported by the Rural Communication for Survival Initiative (RSCI) - an inclusive multi-sector 'collaborative process' designed to bring together government departments and agencies, academic institutions, NGOs, community communications groups and private-sector enterprises who have a common interest in advancing the sustainability of rural NL regions and communities through improved communications. Initial collaborators in RSCI include the NL Rural Secretariat, Memorial University (Grenfell Campus), Quanglo and Ryakuga.

Initially (beginning in 1979), the Memorial University extension service sent technology crews to rural communities to implement television transmitter projects. By the end of the 80s there were no more financial resources for technology crews and instead extension workers adopted a popular education methodology meaning "we have no media experts but rather co-participants sharing in a communication/education experience. We don't teach but rather create learning situations and popular education resource materials."

Ryakuga (in collaboration) continued to work in community television after the university eliminated its extension service but local supportive owners sold out to corporations from outside the province. In 2001 they switched to community radio - a medium people find easier to adopt. They were already using the internet - initially for websites and e-mail but then progressed to using CGI discussion boards and software and video-conferencing. Ryakuga actually webcast before they broadcast. It has taken ten years for enough rural communities to get broadband to further utilize internet technologies. Meanwhile they still webcast audio which is compatible with dialup.

One effect of changing from long term, multi stakeholder project to discrete projects is that there is no longer funding for local facilitators to work with their communities to ensure full participation. The answer to this issue was found in the special events which are also designed to seed long term grassroots participatory community radio groups. There are several community television groups that have lasted for two decades.

The elements necessary to make these projects work are adopting "All the Voices" principles of: Participatory Communications - ordinary people have the right to be heard - but also the responsibility to speak out; Collaboration – for each communication project, look for as many partners as possible emphasizing commonalities rather than differences; Inclusion - in the communities, work with people of all ages and all walks of life (in community media projects, "animateurs" or "encouragers" have included women at home, retired teachers and recent

university graduates); Cultural Celebration - the local musicians, who are so important in community events, are not merely entertainers but also create an environment in which people feel good about their culture and who they are (Local people can speak out and plan their own future when they feel pride in themselves. Mainstream media tends to make people who live away from big centres feel inferior and insecure.); Positive Mirroring: Try to stress the positive aspects of the local environment and culture (This is also known as "pride of place." Again, its important for people to feel good about themselves and speak out.); Youth Power - Ben and Friends is one of the most popular programs on VOBB - the Voice of Bonne Bay (A Caribbean Federation of Youth slogan says "Youth, the present answer to the future." Youth are essential in media projects. They are not afraid of the technology. Their energy catalyzes the process. An intergenerational mix is good - older people gain respect for the technical prowess of the youth, while younger people become interested in community issues).

A constant issue with these projects is funding. A decade ago the federal government was interested in participating in long term community development projects and now they are not. So it has been necessary to strategize how to achieve similar long term discrete projects. Another issue is the slow adoption of broadband in rural areas of Newfoundland and Labrador. We still have to use dial up for webcasts and relay broadcasts. It's difficult for many people to connect to new internet communication tools such as Skype, Twitter and FaceBook.

The projects have been fortunate to work with organizations and communities that want to work together. This is possibly related to outmigration and financial pressures which make the benefits of collaboration obvious. Also a grassroots community media process has obvious benefits for all members of the community.

Grassroots, collaborative, participatory, community media processes work best when a number of organizations, even in different communities, can work together without "turf" issues. Successful outcomes are seen when the collaborating organizations have the capacity for long term planning. Another requirement for success is an inclusive process to attract volunteers. There also has to be financial backing, both for permanent community media installations and for special events, but money isn't the secret to the process. People working together to get their messages out is the real secret.

The Northern Manitoba E-Index and Surveyor Training Project

The E-Index is an assessment of Information Communication Technology (ICT) levels. The E-Index survey allows people, at a community level, to assess the infrastructure, skills, utilization and affordability of seven ICT's; television, fax, radio, fixed phone, mobile phone, computer and internet. To bring in an economic development component to the project, surveyors were hired from rural and remote communities including the surveyed communities. This initiative offered the surveyors training and experience in community research and management for future employment opportunities. Once the assessment is complete, results are brought back to community members and leaders. The communities are shown their results during a knowledge plan and community roundtable. Interested parties are then asked to participate in a one year strategic planning process that can increase their community's ICT levels. Strategic plan goals are based on the information presented to community members during the roundtable, as well as what the community sees as their biggest priorities. This grassroots approach fosters community involvement and ownership for the ICT development within their communities. The E-Index also offers a product that identifies the ICT levels in a number of formats. This can be available for public viewing at locations such as the town office or the public library. The product consists of a Community Brochure which shows a brief overview of the results and a Road Map, an in depth look at all the data collection. The product also offers a more visual look at the results through the Diagnostic Visual Aide and lastly a Media Release for publicizing the results.

The communities surveyed for the E-Index during the winter of 2011 were the remote northern communities of Flin Flon, Cranberry Portage and Snow Lake, Manitoba. The greatest barrier these communities battle are geographic. Students lack options for advanced training within their communities and community members lack proper health care without having to travel to other communities. Infrastructure has been put in place to bridge the distance barrier gaps but proper training limits the use of the equipment and many of the community members are unaware of where they can access these technologies. Because of the remoteness of their locations many of these communities are last on the list to receive access to technologies such as internet and mobile phone. This leaves most communities members with skill levels below status quo. Results are acquired through four streams of data collection: the community survey, community feedback forms, the knowledge planning questionnaire and community roundtable. Community members are then able to make informed decisions on how to increase ICT levels within the community, facilitated by the strategic planning process.

Once their results were tabulated, each community participated in a three hour round table and strategic planning session. The roundtable allowed community members to view the E-Index results and discuss their opinions on the results. During the strategic plan the participants created a vision of what they wanted their community to look like and then listed what the community looked like right now. This gave the community members a clearer look at their priorities allowing them to agree on two realistic goals to accomplish in a one year term. The goals were broken into four three month segments with a milestone to be reached at the end of each quarter. A list of those enrolled was included as well as a list of those in attendance to make those involved accountable to their goals. Goals largely included: skills development, especially for students and seniors; more access to distance education and tele-health services; better understanding of infrastructure available to the community; and more online presence at a community level, such as developing community websites.

These communities are just finishing the first quarter of the project and are having great success at achieving their milestones. At this milestone, the communities are in the process of or have hired trainers to facilitate workshops and create workshop curriculums for ICT skills development. They are looking into different options for community websites. All communities will be accessing CAP and CAP-YI funding in some capacity to help fulfill their goals. Cranberry Portage will be utilizing CAP funding to start up their first CAP site and CAP-YI funding to hire a youth intern to offer ICT workshops to community members. Flin Flon will be utilizing the CAP-YI funding to hire a youth intern to create an asset map of the infrastructure available in the area as well as teach ICT skills development workshops. Snow Lake will be using CAP-YI funding to hire an assistant for their ICT skills development training.

These communities have always been aware that they fell on the wrong side of the digital divide. Their geographic barriers have given less than average access to many ICT's but each community's obstacles are different even though they may only be as little as forty km's apart. The E-Index enabled the communities to pinpoint where ICT development was needed the most using the information collected during the data collection. By putting ownership back into the communities' hands they were able to come together as a team and decide what the best plan of action was to bring their ICT levels up to par during the strategic planning session. By hiring surveyors from local, rural and remote communities the project helped community members develop gainful employment skills. As well, their knowledge of the project was brought back to their communities for future development. Many of the communities agreed their ICT skill levels and infrastructure were priority for improvement. CAP and CAP-YI have been great tools in these developments. They allow for training development and delivery as well as access to public access venues for training to occur. By assessing three communities within a 200 km radius of each other, it allows for the communities to connect with each other around similar ICT needs, facilitated by a Northern Regional Coordinator put in place through CAP-YI.

The E-Index and strategic plan is a one year project with both short and long term goals of skill and infrastructure development. These three communities are starting their second quarter and are still in the development stage. Training workshops will start to occur in the fall of 2011. Advancement in infrastructure through asset mapping and public access development is set to begin as soon as funding is acquired. CAP and CAP-YI will be the main funding sources for all of these initiatives. The full effect of the completed goals will not be seen until the final quarter of the project.

The E-Index was delivered in Cranberry Portage, Flin Flon and Snow Lake in partnership between the towns/city, Community Futures Greenstone, MB E-Association, Function Four and Manitoba Innovation Energy and Mines. Without any of these partnerships, this project would not have been possible. Community Futures acted as the community contact in each community which facilitated trusting relationships with local community members participating in the project. This was most crucial during the initial surveying as without that trust, the response rate would not have been high enough to ensure accurate results.

It was not always easy getting the data during the data collection. Community members can be quick to refuse or ignore surveyors. When the community is small and members know everyone, they can be hesitant to opening the door to strangers. Often Function Four needed to be strategic based on demographics when sending surveyors to different areas of the town or city. They advertised the project with posters around town, community newspaper articles and advertisements, television P.S.A.'s as well as interviews on the local radio station. Each surveyor also carried with them a letter from the Mayor or Reeve which asked for community support and participation in the project. In regards to the Knowledge Plan, they had the community contact make up a list of Community Leaders that were then contacted directly over the phone to explain the project. The surveyors met with each person one on one to go over the results and fill out the questionnaire. Once the leaders had a better understanding of the project, they were more likely to participate in the round table and strategic planning session.

Acquiring maps of the community for the sample was also a challenge. Some communities felt this may be a breach in privacy laws or when the community was very small a proper map may not even exist. Most community's did end up sharing their tax roll or created a useable map but when this doesn't occur much work was done to create an accurate map that could be used to create a statistically significant sample from. In some cases this means creating a map using online maps.

Because the communities had asked Function Four to come and complete the assessment for them, the welcome into the community was usually warm. That being said, they did run into one or two people that acted as road blocks, sometimes in the community and sometimes in town offices or city halls. This may not have been a direct protest to the project, sometimes this was a lack of understanding of the project or lack of participation to get the job done. This slowed things down drastically at some points, which can be detrimental when dealing with tight time lines.

MB E-Association is a non-profit organization that does community and economic development through technology. Function Four is a for profit research and development software firm. Both are small to medium sized organizations employing 8-10 employees each. MB E-Association and Function Four both work with communities to improve their e-capacity. For MB E-Association, this is mainly but not restricted to Manitoba communities whereas Function Four has worked with communities worldwide. Often the recipients of their services are from rural and remote communities as well as non profits in urban settings.

The E-Index can be delivered in any community as long as the community supports the project both physically and monetarily. Funding for Cranberry Portage, Flin Flon and Snow Lake, Manitoba E-Indexing was supplied by the province of Manitoba Innovation Energy and Mines as a one-time project.

Meaningful Media:
The Weaving of Digital Stories and Collaborative Narratives into Digital Strategies in the Fishing Lake Métis Settlement Community

As a community-focused, community-directed digital strategy, this project represents a working collaboration between a diverse and committed group of people who envision digital media as a powerful way to honour the past in a present-day media format. The idea that digital media could bring the stories of a once-silenced group to voice, and to screen, arose out of a three-day digital storytelling workshop attended by Communications graduate student Yvonne Poitras Pratt and her mother in 2007. They wanted to create a digital story – a lasting memory – that would honour the memory of Yvonne's grandmother. By taking part in a workshop led by Rob Kershaw of the Center for Digital Storytelling (CDS), together they witnessed the tremendous potential that digital stories could play in preserving and revitalizing the cultural heritage and oral traditions of the Métis people.

As part of her academic program, Yvonne was able to engage her home community of Fishing Lake Métis Settlement in a collaborative research project that partnered community Elders and advisors together with local youth to create a series of eight intergenerational digital stories about a significant community member. She was fortunate to have two highly committed community leaders, including (then) Council chairperson Ryck Chalifoux and the Education, Training and Employment director, Susan Barthel, on her side. After having seen several digital stories created by Métis, both Ryck and Suzi were convinced that this digital approach could benefit the Fishing Lake community in a number of ways.

Also well placed were findings from Function Four's 2010 E-Index technology assessment that indicated Fishing Lake members could benefit from a content-driven digital strategy. The Winnipeg-based Function Four team, with Bruce Hardy at the helm, partnered with Yvonne, Rob and the Fishing Lake community in seeking ways to realize this remote community's digital potential.

As these visionary community leaders initially saw it, a digital storytelling project would serve several pressing community needs. Firstly, these short (3-5 minute) digital stories would serve as a contemporary way to preserve Métis culture, language and stories in an engaging and powerful multimedia format. Having just lost several community Elders in a short amount of time, the Fishing Lake leaders felt a critical need to not only preserve historical knowledge about their community, but to also share their stories with others. Secondly, they recognized the need for local youth to be engaged in a process that would allow them to take ownership of their cultural heritage. By creating intergenerational stories where unemployed local youth worked with Elders and mentors to create a digital story, this project brought together these two disparate groups. Working together, the youth and Elders bonded – restoring and revitalizing intergenerational community relationships.

Working alongside the youth, the Elders and other participating community members of Fishing Lake gained a better understanding of how information communication technologies could benefit their community. The Elders expressed less fear of technology, and the youth expressed more confidence and pride in their ability to use technology. In sharing these digital stories at a community screening, community leaders were also hearing voices from community members, both young and old, whose voices are typically seldom heard.

Learning was accomplished in a variety of direct and indirect ways. Ten youth enrolled in a community Job Skills Training Program were recruited to participate in the initial five-day digital storytelling workshop. Each youth worked alongside an Elder or mentor to create a digital story about a significant community elder around the topic of survival. Elders, mentors and community advisors sat with the youth to help guide them in the storytelling. The youth in turn learned to listen to Elders, ask questions, record interviews, take photographs, and write a 250-350 word script based on what they had learned.

These various resources were then translated into a digital format through scanning, digital audio recordings, or by entering the handwritten text into a word processing program. Later on, an in-workshop video editing tutorial taught the youth participants how to incorporate these images, text, video and audio segments into a digital story that panned, zoomed and incorporated various production effects into its final telling.

The Meaningful Media Project demonstrated how technology could be used to preserve vital traditional knowledge and cultural traditions and has laid a foundation for cultural renewal within the Fishing Lake Métis Settlement. The community also literally found its 'voice' by sharing stories across generations. The act of building trust formed the foundation of this project. From the first moment that this idea was shared, not only did local community leaders and Elders learn to trust in the project organizers, but the project organizers also learned that once trust was earned, the community would do everything possible to make the project a success.

Securing the necessary funds to realize this workshop delayed the implementation of the first Fishing Lake workshop. From the initial dialogue around this project to realizing the first set of eight digital stories spanned eighteen months. Several project proposals were developed and sent out to both federal and provincial funders to help support this project, including OL&ES, but in the end it was the community that targeted funds to support the first workshop in the fall of 2010. Funding provides the necessary ICT resources and trained personnel to teach ICT skills to community members and oftentimes can be built into skills development and labour training programs. With committed funding and support in place, the time required for this implementation phase is greatly reduced.

To replicate this type of program, a community must be ready not only to host digital storytelling workshops in their community but also to articulate how digital media could serve their particular community needs. The strength of this program lay in its participatory and collaborative approach. In fact, really listening to what each community wants and needs and meaningfully involving the community in the project's design and development will help to ensure success. Ultimately, this type of digital strategy must be community-directed in order for the community to realize ownership of the project and ensure its sustainability.

The process of telling and sharing stories, whether using digital media or not, can be an intense experience – especially for those communities who have historically been silenced. The rewards, however, can be immeasurable. Encouraging community members to share their once-silenced stories is a powerful means for healing and encouraging the community to work towards a shared goal. In several cases, community leaders commented that they were hearing, for the first time, from members of the community that rarely, if ever, spoke publicly. This storytelling process is one best facilitated by trained professionals such as the facilitators CDS offers.

As a community-driven process, future projects will likely face differing challenges based on their own unique circumstances. These include issues of geography, access, financial restraints, lack of infrastructure, diverse and competing interests within the community and the time commitment required from a dedicated group of people required to see the project through to completion. Costs naturally vary from project-to-project, story-to-story and community-to-community.
Empowered with each presentation of the digital stories, the members of the Fishing Lake Métis Settlement continue to explore new ways of preserving their language, culture, and traditions along with personal histories through digital means. As the community leaders will attest, the project has helped the community create a renewed sense of pride in individual community members and in the wider community as a collective entity.

Fishing Lake Métis Settlement is a Métis settlement located in north-eastern Alberta, within the Municipal District of Bonnyville No. 87. It is governed by a community elected council under the Métis Settlements General Council in Alberta and has an approximate population of 950 people.

Mobile CAP Site - Boys & Girls Club of East Dartmouth

In 2001, this project began by exploring ways to connect the Boys & Girls Club members and the community with the CAP Site. Dartmouth is known as the "city of Lakes", due to this unique geographic characteristic and the resulting layout of the community was designed to accommodate the lakes. It was thought that a mobile CAP site would create opportunities for people from across the community to access a computer and the internet. As well, the club was operating out of several locations within the community in order to deliver programs and services. The Boys & Girls Club of East Dartmouth (BGCED) believed that a mobile CAP site could go where the people were. It could also go to malls, library or schools. It could go to specific locations, where it to be set-up for a day or two on a rotating schedule. This belief was found to be correct as once the project started they also found that community groups even started to book the mobile CAP site to come and set up at their community events.

For East Dartmouth area, the scarcity of public access to computers and to the internet in 2002 was exacerbated by its geographical uniqueness, which often required community members to travel some distance to find public access. They started addressing the issue by first, conducting community surveys and bringing up this idea at several community meetings. BGCED learned the needs of the community, the level of skills most prevalent in the community and they learned the places where community members wanted to access the internet. With this information, it was decided that a mobile site would be the best short-term solution until BGCED was able to locate or build adequate space to house there organization. The mobile site offered one-on-one skills development, individual resume development and small group sessions which covered an introduction to the internet and email.

Learning was accomplished in many different ways. Adults were employed through, a skills development placement program. They learned how to setup and take down equipment, as well as system maintenance and trouble shooting. Once trained these individuals were able to offer one-to-one and small group coaching, including an introduction to computers, basic email skills and resume development, to other community members. Additionally the youth and the community members developed skills in using printers and digital cameras. In doing so this project engaged the community and by teaching various ICT skills they began to use those skills to create and access the diverse information on the web.

The mobile CAP site offered the community access to the technology, until the organization was able to build a community centre. The impact of the mobile site was immediate, as it provided access to technology through its portable laptops and allowed them to book that technology as needed for their activities. This mobile access created community awareness about CAP and services that were available through CAP to assist the members of community.

In order to meet the challenge the BGCED had to examine current community access and gaps in access to technology, which was accomplished through the surveys and community gatherings. Through partnership with the provincial government they were able to find out what people wanted so they set about purchasing eight to twelve laptops, peripheral equipment like printers and cords and heavy duty storage cases. They also purchased accessible tables for people with disabilities that were portable and could be adjusted for height. They also had to ensure they had purchased adequate insurance. The other issue that was addressed was transportation of the equipment to the various sites through a rental van.

Through skills placement programs they hired two adults and trained them on how to setup, maintain and takedown a mobile site. They also had to develop clear policies and agreements for booking the mobile site for others to use. Funding for this project was a mix of federal and provincial. The real success of this project was the flexibility of the program. This motivated the community to support and utilize this project.

As time went on, upkeep and maintenance of the equipment was the main issue the project faced. Cords would wear out or were damaged, printers required ink and paper would run out – all things that occur when equipment is well used. In addition, user policies needed to be in place to ensure surfing safety of children and youth. Also, due to logistical issues, the mobile CAP site at the end could not travel due to lack of funds. Boys & Girls Club kept the CAP site as a downscaled operation for two years after government funding had stopped until a more permanent solution / facility was built. The mobile site was so successful in the beginning that the provincial government requested expansion of the project, but the BGCED could not do so as it would require them to go beyond their service delivery scope, its target group and its mandate.

The Boys & Girls Club of East Dartmouth (formerly the Caledonia Boys & Girls Club and East Dartmouth Boys & Girls Club) is a charitable youth organization committed to giving kids a chance, helping them develop self-esteem, concern for others and the desire to be productive citizens.

To duplicate this project, funding would be needed to support full time dedicated staff, internet access, laptops, computer equipment and a vehicle for the mobile site. It would also require community support for booking the mobile site and partnerships to increase the resources available for community members.

Clyde River Weather Station Network

The Clyde River Weather Station Network is a community-led initiative created to help provide more weather information for the community of Clyde River, and improve knowledge about Clyde River and area weather patterns by combining Inuit knowledge, science, and environmental modeling.

The project involves a collaboration between the University of Colorado, Colorado State University, and a local Inuit organization named the Ittaq Heritage and Research Centre (Ittaq). It is a research project that involves modern science in the form of technology and meteorology, and Inuit knowledge about weather patterns and forecasting. The hope is that through this collaboration, the community will be able to create more accurate weather models and produce more reliable forecasts of the often seemingly unpredictable arctic weather. The three year project is approximately half-way through and is applying for more funding to continue the project after the three years.

Based on Inuit observations, the weather is becoming more unpredictable and variable. This is an observation shared by many communities across the Arctic. Dr. Shari Gearheard (U. Colorado, based full-time in Clyde River) and her team including local weather experts and university researchers, are collecting further data to understand more about this increased variability. The increased unpredictability has been causing some problems for Inuit, in particular experienced Elders and hunters who find it more difficult to forecast the weather.

Even though some of the expert hunters in Clyde River use their own knowledge to forecast the weather, they will often use meteorology (e.g. Environment Canada weather information) to inform their predictions. Weather dominates what is done on a day to day basis in many arctic communities, and solid weather forecasting informs those people going out on the land, ice, or water. This project is a progression on this – making more links between Inuit and scientific methods for observing weather, understanding weather patterns, and forecasting weather. As a first step, more data is needed. The Arctic in general, when it comes to weather, is data-poor. More weather data is needed, especially for areas outside of airports and communities where Inuit travel and hunt.

In Clyde River, to help address the issue of a lack of data, they have set up three weather stations in addition to Environment Canada's airport station to monitor conditions. The stations have most all of the usual instruments that you would find on any weather station. They are located out on the land in key areas where people travel and other key locations that affect larger areas. The locations were selected by working with hunters, as they are the people in the community who rely on weather information the most and as such know where the gaps are in that information. The weather stations have been in place for a year now. People from the community have learned to work with the equipment and perform maintenance. This has been where learning has occurred most rapidly, as skills have been developed amongst those individuals through hands-on practical usage of the instruments. Through these stations they have been able to start to gather more data and near-live data is available publicly online, which will hopefully lead to a better understanding of local weather patterns. The other component to the project is the fusion of Inuit and scientific knowledge and it is hoped that they may eventually be able to use elements of both in order to achieve the best forecasting of local conditions. There are only a few people left in the community that still forecast the weather using traditional methods. It may be possible to document some of that knowledge and perhaps even quantify or formalize some of into replicable weather forecasting methods that can be included in modern meteorological forecasts.

At the moment, they are organizing workshops with the local weather experts in order to learn about this important knowledge. For example, there are a whole set of Inuktitut terms that refer to wind and blowing snow (blowing along the ground, blowing so many feet off of the ground, blowing over your head, blizzard, etc). It might be possible to relate that knowledge, through Inuktitut terminology, to a scale that will help quantify it, so it could be linked with knowledge from science as well. For example, most people are used to scales in tornadoes or hurricanes.

Right now, the language of scientific forecasts is almost universal and as such the language is the same in referring to Clyde River as it is to Toronto or Vancouver. For example the forecast will start with temperature, temperature is often the primary variable, but it may be wind or visibility that is more important to people in arctic environments. This project is aimed at improving the quality and usefulness of forecasts for the community.

Local people are very interested in the project. There is a high level of community involvement and ownership of the project. Clyde River is fortunate to have an organization such as Ittaq to support and coordinate these types of projects. As Ittaq is a community-driven organization it is really the community that is driving this project. Anybody can access the weather information on the website and it will soon be available in Inuktitut as well as English. There is also a call-in line so that people who cannot read or do not have a computer can listen to the forecast. Local hunters that were interested came out and learned about the stations. The scientists that were working on the project and the local hunters worked together to do the installation and local people also help with keeping up maintenance. As part of the project, six local residents from Clyde River travelled to the University of Colorado and Colorado State University to see where the scientists work. Normally research travel is one-way, with scientists heading north. In this case, northerners have an opportunity to see where scientists live and work and the travel contributes to team building.

This project is led by Ittaq. This center is somewhat unique for its location and human resources. One key individual there is Dr. Shari Gearheard, who is a full-time research faculty member of the University of Colorado but lives full-time in Clyde River working on snow and ice research projects. Most researchers can only come up for a couple of weeks and then go back to their campus, but Shari's institution supports her interest in staying North. Shari's situation is the reverse of the usual arctic researcher, making her home in Clyde and visiting her university for several weeks in the year. Her expertise is a strong asset to the people of Clyde River who have a desire to improve their lives through research projects and research as economic development. Another key individual is Gordon Kautuk, Coordinator at Ittaq. Gordon works full time at Ittaq ensuring all the partnerships and projects at Ittaq run smoothly, and helps create connections between visiting projects and local people. He oversees all Ittaq activities. His expertise is critical as a bridge between the community and research and ensuring that all research work benefits everyone, in particular Clyde River residents.

The centre is quickly becoming an important source of local employment and is building lasting skills amongst community members. For example local people can be trained and hired to take samples or observations for short periods, or all year long. Long-term research is a particular advantage for projects, providing more and potentially better data than the usual short summer field seasons. Local researchers are also conducting surveys, interviews, and facilitating workshops Community members are starting to take leadership in projects, design their own projects, and continue to collaborate with various other groups, including other communities.

The Clyde River Weather Station Network is providing more weather data to the community. It makes a stronger argument to Environment Canada to improve the amounts of data available to people. On the science side, they are able to use the data to make models of the weather in Clyde River. They are working towards showing how the winds flow through the topography and how it links to things like sea ice. They are having success at making the models but still have a ways to go.

This project would be somewhat difficult to duplicate without the strong foundation of community research skills that Clyde River is fortunate to have. However, it does not need to be as advanced or as complex as what they are doing in order to be effective in generating learning and skills development in weather technology. Some key relationships have helped this project succeed such as those with Environment Canada, the University of Colorado, the Ittaq Heritage and Research Centre, the Clyde River Elders Committee, and strong media training including through the CAP site. The project was made possible by motivated community members, and its success is largely attributable to community ownership of the project. The local people had the idea to do it, got help to do it, and then were trained and supported to make it happen. If it is for the community, by the community, it creates excitement and makes the project sustainable.

Nunavut Youth Consulting's Media Production and Cultural Promotion

This project is an initiative lead by Nunavut Youth Consulting. Nunavut Youth Consulting is engaged in a variety of activities designed to foster employability skills in youth and young adults. Over the past few years, this group has been quite successful in achieving several small projects involving use of media in order to promote and educate others on Inuit culture in Arctic Bay. Several different types of media have been produced including videos for CBC, DVDs, YouTube videos and a series of posters promoting use of Inuktitut. Many young adults have gained employability skills as a result of these initiatives and it is hoped that further economic opportunities will result from their ongoing efforts

Arctic Bay is a small community and very isolated. There is a need to create opportunities for young people to gain skills and have different experiences so that they have opportunities to thrive in the job market which they will soon be entering. The entire community works towards finding the solution, as the young adults, who move through the program, will soon become the adult population who will be sustaining and creating the future community of Arctic Bay, and Nunavut as a whole. It is this group effort of everyone working together to achieve the same goal.

The successes seen have been the result of several years' worth of progressive work that has established some capacity and that has enabled the group to continue building on their successes and take on more complicated projects. Things started small with an entrepreneurial effort to build business skills at the high-school and college level. As the group gained capacity and a level of self-sufficiency, additional projects were taken on. ICT learning has been achieved in various ways throughout this project, mostly through hands-on use of technology as initiated or necessitated by various projects. Students have learned by doing. Along the way there has been some assistance and training provided by outside sources. The CBC sessions required instruction in video production and other at there have been outside facilitators to trains special skills. The project continues to grow and meet new challenges.

We now have a stronger youth community who see opportunities for themselves in the modern world. Since many of the projects include a fusion of modern technology and traditional Inuit knowledge, students have gained a sense of empowerment and are much more likely to succeed as working adults as they have also learned to apply their skills. It our belief that these efforts will continue to spawn further efforts and further skills development in the use of new media, and the results will be long-lasting. Effects are most definitely already being felt, but the benefit of learning continues indefinitely.

Various people were important to the successes realized thus far. The coordination efforts of Ron Elliott, who acted as both community champion and facilitator for the group, were instrumental. The assistance of skilled technical outsiders, such as CBC, was critical in facilitating specialized learning. As well, community partnerships with Nunavut Arctic College, Inuujaq School, the Elders Society and various Government of Nunavut Departments were vital in supporting the program. The support of the community and the hard work of Nunavut Youth Consulting participants were critical to all of the successes thus far.

Nunavut Youth Consulting is a not-for-profit organization with a membership of approximately 25 community individuals. There is no full-time position. This organization is run by volunteers and part-time youth interns. Nunavut Youth Consulting is involved with such community organizations as Cadets, Nunavut Hip Hop, Skills Canada, Inuujaq School and various local businesses.

To duplicate this project, you would need support from the community and some partnerships with local media organizations. It is also important to have some capacity to secure project funding.

The Gateway Project in Sanikiluaq: Showcasing Community Heritage with Modern Technology

The Gateway Project in Sanikiluaq was a year-long effort aimed at showcasing local culture while building ICT skills amongst the local population. The project worked towards creating a website to showcase Nunavut's and Sanikiluaq's culture to the world, while building skills in web development amongst the local population of Sanikiluaq. There was a training component to this project in which many members of the community were involved in not only learning how to create materials but also how to create the website. The work on the website required participating members of the community to learn how to use media and how to gather information to showcase heritage. The website is interactive via forums and all work was done locally through a grant from the Gateway Fund which was secured by the Najuqsivik Society.

There is a strong need for activities in Nunavut that build skills amongst the population. The population needs to be ready and able to participate in today's modern technological society and the people need jobs. There is also a need to showcase and build on traditional Inuit culture in Nunavut. So both local people in Sanikiluaq who needed skills, as well as the people going to the website to learn more about Inuit culture, are the people who needed a solution.

The solution was a project built on past successes. It therefore incorporated things such as community yearbooks and information from other successful projects and involved many steps. First of course was securing funding through proposal writing. The project was also assisted by in-kind donations of space and instruction from the local high school. The project was coordinated to run in sync with the school year and adults from the community were invited to come and learn along side of high school students. Some of the learning occurred in the classroom and some occurred outside. Skills modules were taught throughout the year, with practical projects assigned to learners so that they could apply their newly acquired skills. Students of the program were the creative directors of the content in the web site and used their individual projects to gather media and stories that they saw as relevant to showcasing the heritage and culture of their community.

The effect of the project was increased technological literacy amongst all involved in the project. Primarily, the participants of the training were the beneficiaries. The effects were immediate and ongoing, as the skills learned are useful to the participants. The creation of the website also had numerous benefits for the community at large, such as generating an interest in technology and showcasing the benefits of technology. The project was conducted several years ago now, and lots of things have changed, so it may be run differently if it were run today. It was effective in creating skills, as some people who were involved in the project have gone on to create similar websites for e-commerce, specifically selling local artwork and carvings by local artists. The economic benefits are significant and are lasting through the enhancement of skills.

The Najuqsivik Society was created out of a need for an independent society to administer funding agreements for the operations of the local daycare. Since its creation, it has evolved into a much more multipurpose community organization. Today the society is involved in many things. The non-profit society operates a daycare, a custom frame shop, a polar bear rug business, archaeological and lost wax casting business, fishskin doll production, coffee mug artwork, garment screening businesses, upholstery shop, a CAP site, SCTV channel 3 and CKJJ 105.1 FM radio station. The organization's assistance was a key factor in the project's success.

The financial resources for this project were considerable, so the financial assistance and grants from the Gateway Fund were very critical to the project's success. This is due to the fact that the adult learners were paid an honorarium for their participation ion this project. This project could be made more cost effective with the removal of honoraria for the participants.

The project was welcomed by the community, and received positive support from the community. Since the project brought economic benefits and was also a chance to showcase their heritage, there were no political issues to be dealt with during the project. This may be attributable to some degree to the strong community support fro the Najuqsivik Society itself.

To duplicate this type of project a community would need only a small amount of funding. It would be important to establish a partnership with an organization such as a school which could provide in-kind support such as instruction and technical expertise, as well as a physical space to conduct activities. Funding would need to be secured, either through the Department of Canadian Heritage or another organization wishing to support this type of project.

A Different Spin:
Film & Video Skills Development & Training
How a CAP site spawned a successful private social and economic

In 2000, John Kerr, the Director of Tatlayoko Think Tank (TTT), which manages the CAP site in the remote community of Tatlayoko Lake, BC, applied to the provincial government of British Columbia and received funding to train five community members to make movies. From that humble beginning Different Spin, which is the movie making arm of TTT, was born. TTT started by training people in their own community to make movies before getting requests from other communities to do the same. As the demand grew they went out and bought the additional equipment - cameras and laptops - needed to expand. One of their first big projects was a documentary, "Bridging the Digital Divide". North Island Labs hired them to go to Port Hardy to do this project with funding secured through HRSDC. In Port Hardy they trained six people on computers and cameras and shot a documentary about their Community Learning Project which they also edited into a DVD. From there it has grown and grown. TTT has been all over the province of British Columbia training people in the art of movie making thereby enabling them to record their own projects. Some communities asked for them to come in to help them record their ideas and document their stories. Rather than doing the recording for them, they prefer to train the local people to do it for themselves, using equipment that TTT had purchased.

Before this project, small communities didn't have the ability to tell their own stories in their own words. Many a time, someone like CBC would come into the community and choose the people to interview that they thought to be important to the story without knowing anything about the community. And many a time, the resulting story was not told as the community would wish it could be. The TTT's Director, John Kerr, and his wife Dale, became aware of the way that technology was moving through their experience as the local service provider in the Chilcotin region of BC. The TTT has used Industry Canada's CAP funding to move from providing basic computer training in 1995 to introducing all aspects of new media training when ever possible. Early on, Dale saw that women were using cameras to archive their family stories and trading them over the internet. That is when the CAP site started investing in digital cameras. They needed to be alert to new and emerging trends and technologies in order to interest people in ICTs and promote economic development.

The project has been an evolution. It started with the initial training and has snowballed since then to training in multiple communities and large numbers of people. Once there were people in the community with the skills to make professional videos, other communities became interested, and through their networks they became known for their ability to produce videos. Eventually they formed a video production company called Different Spin and have refined a process for creating their videos, which in most cases involves a training component. ICT Learning has been achieved in so many ways. The types of people who have become involved are very diverse, due to the large variety of subject matter that Different Spin is asked to film. They are frequently asked by First Nations communities to film a community event or to film a documentary about a certain

topic, and through those projects are able to reach out and teach these skills in film and media to a large audience. In many cases community members are asked to assist, or will be brought on as trainees in the projects, and the intention is to leave them with as much knowledge and skills as possible.

There have been ongoing demands from the communities for more and more training. The classes can take a week or longer and people are taught skills in video production from start to finish, from behind the camera, to editing and post production, using a Mac platform. They keep upgrading their equipment and buying high definition cameras and feel the most up-to-date technology is critical to attracting the best and brightest learners to the projects. They need this to offer people exposure to current technology and it enables them to edit high quality video.

As this is not a one-off project, some lessons can be learned from seeing the impact and level of success from one community to another. It was noted that the people in the community make the difference. Projects need a community champion. Without this, projects often fail and after initial training, the skills will not be used or grown upon. Different communities have adapted to the technology. In Old Masset, six students took the course and, five years later, 100% of them were still working in film making. This was because the community invested in equipment so that the students were able to continue with different projects. Other communities' efforts have not worked as well as there has been no follow through. A community must have specific goals in mind prior to training members if the members are to succeed. The expectations of the community must be known at the outset so that the larger issues can be dealt with. Individuals need on-going support like in Old Masset.

North Island College hired Different Spin to do their first movie in 2003/04 and hoped to use this documentary as a way of gaining funding from HRSDC. Different Spin has subsequently been hired to make two documentaries about North Island College's robotics programs and they will use the video to publicize their projects in order to gain more funding. The videos are at http://rwsl.nic.bc.ca/videos.html. Others may want to record their work for business publicity. With training like this, there is now a pool of trained individuals that can be hired to assist in many projects.

One of the critical factors in making these projects possible, apart from a CAP site, was the presence of an organization with a vision - the Tatlayoko Think Tank. There was funding and training in 2000 to train people to make movies but that was only a start. Without this base, they wouldn't have been able to build up to where they are now but it has been the vision of community members that has fuelled the growth. The people at TTT had the skill set to do both training and fund raising as well as the forward thinking needed to do this.

Some of the issues that come in the running of these video projects are getting people interested and seeing the advantage of the project. First Nations Communities constantly talk about the loss of culture and language. Video can help prevent this. There needs to be the capacity within the community to continue taking videos and archiving the information. If the community is in crisis mode, it may not have time to do this. Then again, if the community is in crisis mode – the opportunity is also there, for what a better time could there be to take video of the crisis to show the problems and to take it out into the larger world. Visibility is the key to getting the message out and then word of mouth goes from there. They attribute some of their success to being very noticeable in public - they purposefully wear funny hats, carry umbrellas and surround themselves with tons of expensive equipment all of which attract attention and aid in fuelling the word of mouth engine.

The politics of these projects have to do with whether a particular band wants to hire them. The First Nations Technology Council helped in making connections. Different Spin has also found that in order for them to gain acceptance in the communities, they needed a First Nations component to their crew as well as a crew with a gender balance. Sometimes this can make a big difference to gaining trust with a band and the community.

Different Spin is the business name for the movie making arm of the TTT. It is a small organization that relies heavily on community involvement for the success of its projects. Apart from having this type of organization and vision driving the projects, there are specific things you would need to replicate this project, including equipment (camera, tripod, computer), training (learn by doing or take formal training – depending on the person's style), contacts (community support – both the larger community and the CAP community) and funding.

North Island College Online Observatory & Subsequent Robotics Initiatives

The Tatlayoko Think Tank (TTT), through a partnership with North Island College, School District #27, the Province of BC and its Industry Canada Community Access Program network of 64 CAP sites installed an observatory at the Tatla Lake School. It is the only on-line observatory in Canada. The observatory is used remotely by North Island College students and is controlled on-line. The software and interface allows the end user of the observatory to be anywhere in the world as the interface is available via the internet. Students of the college are able to remotely view and photograph celestial objects through this program.

Ron Evans from North Island College approached the TTT and expressed the need. The funding was achieved through CAP network funding. Tatla Lake School had earlier been designated an Industry Canada Network of Innovative Schools. Ross McCloud, the then Director General of Industry Canada, came and participated in the inaugural opening of the observatory lauding it as a "best practice" for CAP.

Small communities in this rural region of British Columbia are, like many rural Canadian communities, struggling to maintain their populations and are always looking for innovative ways to improve the lives of their residents and attract attention to their communities. The TTT administers the operations of the network of CAP sites and takes a leadership role in the community in terms of ICT training and innovation.

Adults and students of all ages helped put this project together. They started in 2002/03 with the initial funding and installed the observatory in 2004. It has functioned as an online observatory since that time. Students are taught about astronomy through on-line labs and remote usage of the observatory.

The biggest gain in terms of technical knowledge has been through the subsequent development of the robotics program. North Island College, through the use of this observatory, became expert at manipulating robots. For example, there are robotic arms that can pick up small objects and put in them in Petri dishes and other robotic functions that can be used in the teaching. This then enabled them to give on-line courses in chemistry and physics using robotics. They are now recognized as cutting edge in robotics nationally. Two films produced about the remote web based robotic lab can be found at http://rwsl.nic.bc.ca/videos.html. They have received funding from the Gates Foundation, Microsoft, BC Campus and Inukshuk for their innovative projects. By advancing the use of robots in the classroom they have enabled learners to study advanced subjects such as astronomy, chemistry and physics from home or other remote locations.

It is important to note the significance of CAP in the success this project. It was a leap of faith for CAP to invest in this but if nothing is tried, nothing will happen.

The observatory cost around $30,000. The telescope it houses draws attention to the school as a state of the art installation and points out the need for increased bandwidth. It has drawn attention to this tiny community and the facilities it now has. The project would not have been possible without key individuals who acted as community champions. The existence of the CAP site was another key element in making the project take off in the first place.

There are a few quirks to the operation of this observatory such as the fact that only students at North Island College have access to the observatory and that people can't physically go in and use the observatory as it is all robotically controlled and there is no physical space for people. Logistical issues are present in that the professor at Bella Coola (3 hours away) has to come and open and close the dome in order for students to use the observatory. Add to that the technical challenge of taking a picture of a star. Imagine trying to capture an image of star which is moving, while being on the earth which is also moving. It requires some skill to get enough light for a time-lapsed photograph which is viewable. Another big issue encountered during the project was bandwidth – projects such as these will attract new people into the community, which impacts the bandwidth available for both the community and the higher end applications.

In terms of local and political context, the project has been universally supported. The School District had to put in underground wiring and provide electricity and access to the school, local volunteers did the initial site preparation and dome installation, Industry Canada was supportive in terms of funding and the community as a whole was behind the project.

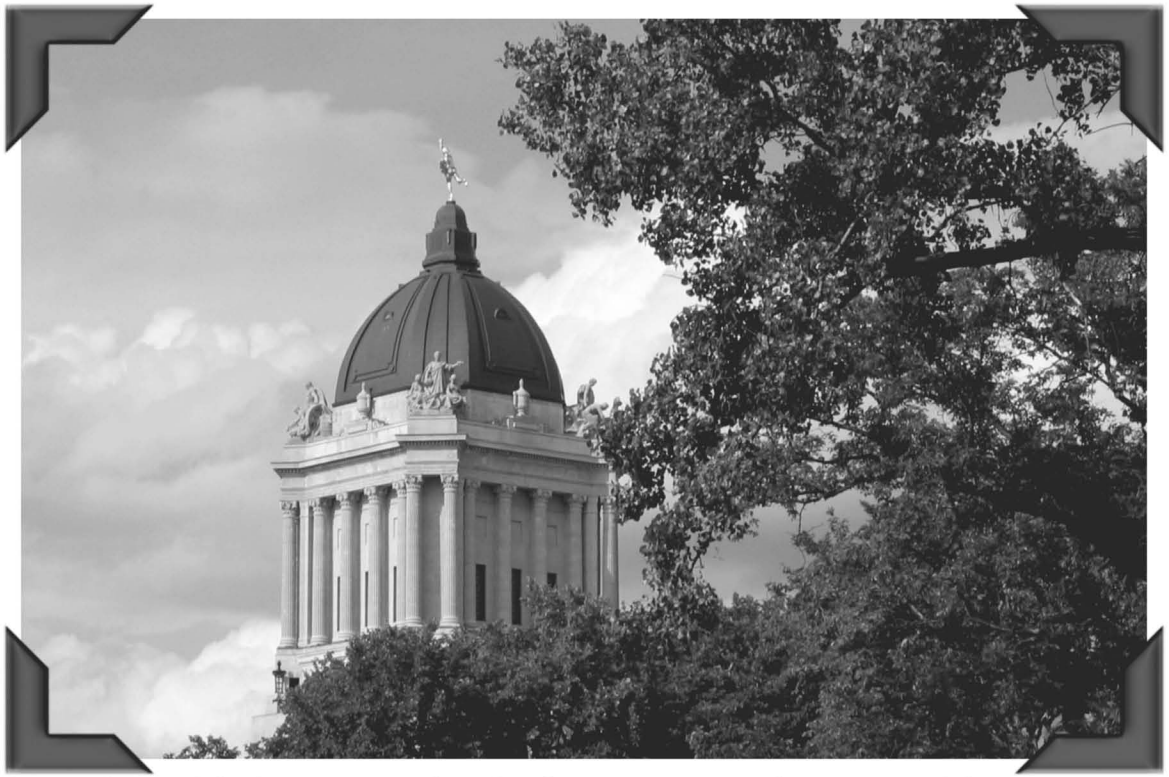
Although the project was a collaborative effort involving many partners, the project has been overseen by the Tatlayoko Think Tank, which is a small business partnership specializing in community economic development research and public interest advocacy. Their focus is on rural/remote interests, in particular in the Chilcotin region of BC. Its goal is to ensure that the quality of life for rural/remote residents is protected and/or advanced. It is a small organization, but plays a large role in their communities, often acting as champions for this and similar projects.

To duplicate this project the community would need a strong community champion, a network of relationships with supportive individuals and organizations and the funding to see it through. On the technical side there are particular specifications to the hardware being used. If interested please contact the project contact person.

Marlene Street Resource Centre

Marlene Street Resource Center is located in a Manitoba housing complex in St. Vital. It became a Community Access site in 2001. The center runs programming for youth and adults from Monday to Friday each week. The people that use the center mainly live in the Marlene Street housing complex, which is a low income housing complex subsidised by the provincial government. When it was started, the province determined that one of the suites could be used as a resource centre. The resource centre has, over the years, relied on the services provided through the Community Access Program (CAP) and the Community Access Program Youth Initiative (CAP YI) to enhance the services delivered by the centre.

One of the first enhancements that came about was the development of a children's lab. Many of the mothers coming to the resource centre were coming to acquire skills which could improve their likelihood of entering the job market. Their ability to concentrate on their learning tasks was compromised by continually having to attend to their young children who came with them. With funding from the province and equipment provided through Computers for Schools, a children's lab for children under the age of six was established. Special desks were built to house the computers. These desks were shaped like vehicles seen on the streets of their neighbourhood. There was a bus, and a delivery truck as well as an apartment building. The computers were loaded with software geared to young kids. Now their mothers and, in some cases, fathers were able to concentrate on learning the skills which could assist them in finding better jobs and know that their children were happily engaged in learning activities of their own.



Another program that received assistance from the CAP YI program was the development of the Nutrition Bingo sessions. Adequate nutrition is often an issue for the low income residents of the housing complex. Many are immigrant families who are new to Canada and unfamiliar with the foods and even the layout of the grocery stores. Others lack the experience to prepare a well balanced healthy meal. With the assistance of the CAP youth intern, a fun learning tool was developed. This tool uses a game very familiar to the residents of the housing complex, the "bingo game". In this version of the game, instead of calling out numbers, foods are called out with a descriptor that imparts a health tip such "Under the I, a good source of fibre" and they would look for grains. The intern located a website which allows the instructor to download and/or create their own cards as well as tips on call phrases that could be used. The game is so popular it has continued as a regular program offering at the resource centre.

A third program which has been enhanced by the CAP Youth Interns is the Homework Club program. It is directed toward older school aged children and teens. They come after school and are allowed to have free time on the computers until the program which assists them with their homework starts. When the new CAP Youth Intern started last October, she was approached by resource centre staff with a concern that had been raised by parents about the Homework Club. They had noticed that during free time on the computers the kids were using gaming sites that were not very educational and sometimes inappropriate. The resource staff didn't want to just ban certain websites from the computer lab and asked the intern to come up with a fun and interesting way to introduce them to some more educational websites which would provide an alternative to the websites the youth were currently using. The intern had her first Cyber Camp coming up and decided to use this as a fun and interesting way to promote healthy websites while also attracting attention to and promoting the entire program and future activities. The camp featured an online scavenger hunt for educational websites. The intern made up worksheets that gave the kids directions to navigate to the educational websites and find the games which would be more appropriate for them to be engaged in during their free computer time. They went to websites where they played math games, time games and games where they researched marine life. They seemed to really enjoy the experience. At the end of the scavenger hunt they wrote down what their favourite websites were.

Many of the youth wrote down the websites that they had just been introduced to. However, the real test was to see if they would continue to use these websites on future days in which they had free computer time. Over the next few weeks the intern noticed a significant increase in the use of the websites located in the scavenger hunt. In addition, whenever she saw a website she thought was inappropriate, she was able to negotiate with them and suggest that they use one of the websites they had learned about. Most of the kids agreed without question. Working from a shared belief that introducing youth to educational websites is important, the resource centre and the intern were successful in having youth spend more time using educational websites. They discovered that all it takes is a little exposure to the right websites and you can influence what will be used in the future.

The intern at this access site also developed her first ever website for the resource centre. She was so excited about the website, she told her supervisor that "she never thought in a million years that she would have been able to build a website and because of CAP she could."

Replicating these activities requires an access site host who knows the value of programs working in cooperation with each other. A collaborative attitude is necessary for co-located programs to support each other in providing service to their common clients. In addition, the founders of the various programs require an understanding that co-locating programs and services allows for the leveraging of funding dollars to create more effective services.

Technology to Improve the Lives of Seniors in the Community

In today's world there is a myriad of technologies - everything from computers to mobile devices. These information and communication technologies let us gather information, download a podcast of our favourite radio show and listen to it while walking. They let us use the same device to take photos, watch videos on YouTube, post updates on Twitter, call or text our friends and family and organize our schedule — digital media and content are a huge part of the Canadian way of life. There is however a big but...

This world of information is not accessible to all. Those who fall into what is known as the "digital divide" are not able to enhance their lives with IT. One demographic that has been greatly impacted by the digital divide is seniors. The reasons for this are varied: it may be because a low income makes acquiring the devices out of reach; it may be because high speed internet is not available in their community; it may be because they have been unable to access IT training suitable to their learning style; it may also because they fear change; or it may be because they are yet to find a reason to use technology that has a direct impact on their lives. Whatever the reason, not having the knowledge or the tools to access these resources makes this often already vulnerable demographic even more so. In a time where the majority of information we access and share is through digital media, including the internet, it is increasingly apparent that the growing digital divide must be diminished. We can empower seniors through the knowledge that the internet offers. The internet presents an opportunity for seniors to access information, resources, government services, social services, social networks, employment and hiring opportunities and alternative communication mediums - the list goes on and on. Over the past few years the Manitoba E-Association (MB E) has made a determined effort through the Community Access Program (CAP) and the Community Access Youth Initiative (CAP YI) to reach out to the senior demographic and provide the training and experience they need.

To kick start the program's emphasis on seniors, MB E accepted an invitation to participate at The 50 Plus Living Show. This provided an excellent opportunity to promote their services for seniors. MB E has participated in the 50 Plus Show twice. The show has proved to be an excellent platform from which to showcase the technologies available to seniors. Each year there was a constant flow of visitors through the MB E booth. At the booth we provided visitors with information on technology services for seniors and offered a free Internet Module handout with a companion CD. This module was created to provide links to an assortment of websites useful to seniors.

In conjunction with the trade show we determined that MB E would need to provide instruction in a format that is understandable and uses plain language instead of "techno speak". Doing so would allow seniors who experience the digital divide to access technology and instruction in the form and location that fits their lifestyle and utilizes technologies specific to their requirements.

Last fall a CAP site opened up in South Junction Manitoba. It was hosted at the Resource Council which also accommodates the Rural Municipality of Piney. This is the first time that the program has been held at this location. The CAP Program was introduced into the community about nine years ago, however in the past it has been held at the school in Sprague, Manitoba. The new location provided the opportunity to target a new group of people. As senior citizens were the primary users of the Resource Council, the CAP youth intern offered courses that were designed to help seniors get started using computers. Over an eight week span six lessons in computers were offered. The lessons were well received, and there were three separate groups of people who came in throughout the week to participate. The seniors were very dedicated and, in the interns words, "all finished the classes as computer whizzes". One person who stood out as having a great success story was community member Louise Cote. When Louise first attended the computer classes she was ready to get to work! She was excited to start typing and have her name spelled out on the monitor. As classes progressed she learned much about the Microsoft programs and how to navigate her way on the internet. She now has a well established e-mail account. Later, for her 75th birthday, Louise's family members gave her a printer for her recently acquired computer. With hard work and a great attitude she is now enjoying the advantages of the wonderful world of computers. The computer lessons were a success not only for Louise, but for all the community members that came to the classes. Many others have inquired about the classes and a decision was made to continue them after the eight weeks originally planned for concluded. With the donation of four new computers to the Resource Council, they were able to accommodate even more senior community members who were eager to learn about computers.

At the 400 DesMeurons Villa, a 55+ Residence which also hosts a CAP site, the CAP youth intern taught between seven and ten regular senior students, all of whom lived at the residence. Bridging the generational and technological gap was a challenge at first but the intern's weekly visits have proven to be fruitful. The residents are now emailing their families and friends across the world in places like Italy, Jamaica, Mexico, and the Yukon. Many of them are involved in the community, working with their parish or with the homeless and this training provides them with hands-on experience which they can then apply to the benefit of all. The intern prefers one-on-one training for this context since to most seniors at this location, learning how to use computers was an audacious and intimidating move. The hands-on, case-by-case, informal approach to training favoured at the DesMeurons site has meant that rather than assigning irrelevant theory and exercises, the participants have learned what they needed to learn for the purposes that were important to them. The intern was very enthusiastic and believed that many of the senior students were bitten by the computer bug. He also indicated that they are curious enough to maintain a level of interest that will lead them to learning even more after they are left to their own devices.

At the Mama Wi access sites, there are the elders in the community who also got involved in the CAP YI programming for seniors. Many utilized the resource as a way to look up information on their culture and their bloodlines. The intern at that location has stated that, "A lot of the Elders didn't even know how to turn the computer on when they started and now they are able to type, use a mouse and search for things on line." Elders in the community were taught how to research topics on the internet and once they knew how to do this they started looking up information on their culture and ancestry. Then they started seeking out other members of their blood lines across the country and the United States and started making contact with them via email."

Another good site for seniors was Villa Cabrini. It is a supported living residence for seniors and also hosts a CAP site. There, the CAP youth intern built great relationships with the resident seniors. Using the one-to-one approach, the intern has provided training to many seniors who went from not being able to turn on computers to using e-mail, Facebook and eBay in four short months. Of particular interest at this site was a group who learned to use the internet to make decorations and picture frames for their scrap booking hobby.

Replication of this service requires funding from programs like CAP and CAP YI. It requires host organizations who want to partner with these programs and provide supervision to the CAP youth interns. It requires an ability to deliver individualized training best suited to requirements of the senior students and training which will support and enhances their lifestyle.

Roblin Internet Training

The town of Roblin, Manitoba has hosted a Community Access site in the library under the Community Access Program (CAP) since 2002. During the past year, the youth intern at the site started a training program targeted for those individuals with no computer skills at all. During that time the intern has helped a large number of people "succeed" at using a computer. However, there are a select few that really stand out.

The first "student" that comes to mind was an older gentleman. This gentleman wanders the streets a lot, doesn't have a job and, has been labelled as having a mental disability. The intern engaged him in conversation and determined that he wanted to learn more about using the computer for email, for looking up art on the internet, for selling his own artwork over the internet, and to learn to use the computer to create art of his own.

When he came in, he didn't know all that much about computers. He could type and do the basics but when using the internet he just kind of wildly clicked about without actually reading what was in front of him. So, first, the intern had the gentleman practice using the keyboard and mouse. That was followed up with learning how to use MS Paint to draw pictures and then how to search and use eBay and the internet to locate artwork. Having had a sample of what was available, he then decided to attend the access site's computer basics workshop.

When he was shown the interior of a computer he was fascinated. The intern felt that seeing the inside of the computer and going over the parts with him really helped him understand what was going on in the computer. It also helped him learn the correct terms for things like the DVD drive and hard drive. As he continued to gain some confidence in using the computer and the Internet, he was also set up with a Gmail account and a DeviantArt account so he could share his artwork online and view other people's art as well. The key to engaging many people with no computer skills is to find things that they are quite interested in, as when you're interested in something, you want to learn more. The real success in this story is what happened when the intern was busy with some other students and he had come in to use the computer. He was on his own and didn't really even ask for help until he was about ready to leave. He was successfully using his Gmail account. He had managed to log in all on his own, enter his username and password (which was difficult and long). He had started typing up an email but right before he was to send this email, he asked for some quick help. When the intern walked over and took a glance at what he had going on, she discovered that he was applying for a job through email. The intern was very impressed as he had typed up a pretty good application for this job. There were a couple spelling mistakes but he managed to fix them when shown how to use the spell checker. He then sent out the message and logged off.

The second success story belongs to a pair of students. They're sisters and they're a little bit older but that didn't stop them from wanting to learn to use computers. When they first came in, they just wanted to view a website, find a recipe and print it off. They had never used a computer before and they had very limited experience with technology. The intern helped them find the recipe and print it off. The next day they were back again. They expressed such amazement at the abilities of the computer and recognized the possibilities were endless and how they wanted to learn even more. The intern taught them how to navigate back to the website of recipes and find a completely different recipe they wanted to print off. Again, they were amazed at what the computer could do. And once again, they came back the next day, and the day after that, and the day after that, becoming "regulars" at the access site. The success in this story is their attitude towards the computer. When they started out, they seemed to be very scared and intimidated by it. They didn't want to try things because they were worried they would break something. By showing them what was important to them in the recipe sites, the intern was able to alleviate their fears and spark their interest in learning. Now that they have been taking a few regular courses, they are trying things they never would have tried before and they realize that there is nothing to be afraid of. Every day they come back, wanting to learn more and more. Their success highlights another feature of good training: it alleviates fear and lets you understand that when you're trying to learn something new, you need to have an open mind and the drive to try things, without being worried about what could potentially go wrong.

The final success of the training was not a planned one but is consistent with the goals of the CAP YI program. The success was for the intern who initiated the training and got to know the people coming to the access site while providing a service to them. The intern has stated that, “This job has opened me up a lot more. It's made me much more sociable and outgoing and it's even made me a not bad teacher. Also, as far as employment and jobs go, this has actually opened up a few doors for me. A lot of my students have been encouraging me to open my own computer repair place in town. This has always been a thought in the back of my mind but now that others are mentioning it, it's definitely making me consider it more and more.” The intern is currently seeking a way to make this dream come true.

Replicating the success of this training initiative would require a trainer who has excellent computer skills and is competent in various popular software programs and hardware. They must be competent in internet usage. They will also need to have good interpersonal skills as often those with no computer skills in rural areas are older people and people with disabilities. They must also possess an innate curiosity as to what makes people “tick” so they can find the thing that interests a person and an ability to alleviate the fears of the person so that they can learn to use technology to further pursue that interest.

The training location, be it a CAP site or other training venue, must be flexible in dealing with those that come to them to learn. In this case, “one size” does not “fit all”. There must be the ability and the willingness to personalize training to meet the needs of its learners.

Adoption of Technology for Economic Change: Waywayseecappo First Nation

As a technology based community serving organization, Manitoba E-Association has recognized a need to ensure that the effect of the digital divide on First Nation Communities in Manitoba is minimized. Manitoba E-Association (MB E) has sought out a number of opportunities with this objective. One project which has come out of this search is A-TEC (Adoption of Technology for Economic Change). MB E is working with the community of Waywayseecappo and funding partner Manitoba Innovation, Energy and Mines (IEM) on a project involving cultural values and digital language preservation. This preservation project began April 1, 2010. The Waywayseecappo community has a lot of historic, cultural and language stories. The funding was used to provide the community with technology such as cameras, scanners and laptops to take photos and digitize them. A video camera also allowed for video interviews to be done with community elders to help in the preservation of this community's culture. Four young adults were hired and received training on the use of the equipment and software they in turn taught the community Elders how to access the web to view and share all of the wonderful videos and stories that were created.

A-TEC was an initiative that was undertaken by MB E and IEM in Waywayseecappo First Nation following a community assessment process. IEM assessed and determined that community capacity and sufficient resources were available in Waywayseecappo First Nation. The project required that IEM take the lead in working directly with Waywayseecappo First Nation and in partnership with MB E in order to initiate a multi-tiered project with immediate and long term economic development impacts. In addition, INet-Link, the wireless ISP provider, provided 12 months of Internet connection to the Youth Centre which housed the project and for the four offices also used by the young adults for interviews. In addition, they waived the installation and set up fees associated with initiating their service.

This was accomplished by integrating broadband and other technologies into the local social and economic environment but without hindering local cultural values. Waywayseecappo was chosen based on their infrastructure, resources and willingness to move forward on such an exciting

project. One of the deciding factors was the presence of an economic development coordinator who also was an accredited videographer. This individual agreed to be the community champion for the project and took on the training required by the young adults who were hired to carry out the activities of the project.

The first two young adults were hired and received training which taught them to create digital photos, video and audio from local community members; compile it into a story format; download it to a centralized computer for editing; and to then upload it to their website and/or YouTube. They were required to meet with local elders to digitally capture (audio, video or both) some of the historic and cultural stories that had shaped their community's cultural values. They were also taught to scan and caption photos and documents which depicted culturally relevant information and collections, thereby digitizing, preserving and disseminating these collections as indicated by Waywayseecappo First Nation Council (WWFN).

A third young adult was hired and received training to compile various marketing products (i.e. logos, pictures, audio, video, etc) and relevant content from local organizations, WWFN and others within the community for their website. MB E worked with the young adults and the community champion to create a website and to train them to add their own content to the website. As part of the training the young adults were required to interact continually with WWFN & MB E regarding the content uploaded to the WWFN website. They also participated in all of the planning surrounding the development, design and functionality of the WWFN community website.

During the project it became evident that the young adults needed to know how to interact in a professional manner when dealing with other community members, council members and staff of local community organizations. They had to develop a keen eye for detail while working on the development of the website for WWFN. It was also evident that the young adults did not need to be a website developer/designer as the website developed used a "user friendly" interface to upload all the content that would be on the site. It was however, very necessary for the young adults to become proficient in using a computer, internet and various media creation and editing programs. Finally, the young adults had to be able to relate to the community members including understanding the sensitivity for these members to share this important intellectual property with them and others. The elders involved in this project were keen to view the works produced and so were taught how to use and search the internet along with some basic computer skills.

This project concluded in March of 2011; however, the community and some of the young adults involved continue to record important events in their community using the skills they learned, including ongoing postings of local hockey games. At the conclusion of the project the community champion and the young adults were discussing the option of creating a local videography company.

IEM and MB E believed from the start that this project should be replicable. They anticipated that this project may also be shared with other aboriginal communities, upon completion, so that they could conduct similar models within their own communities. This has in fact occurred and A-TEC will be offered in Sapotaueyak Cree Nation and Pelican Rapids.

K-Net Meeting Place

The Keewaytinook Okimakanak tribal council is a non-political Chiefs Council serving Deer Lake, Fort Severn, Keewaywin, McDowell Lake, North Spirit Lake and Poplar Hill First Nations. The organization is directed by the Chiefs of the member First Nations who form the Board of Directors. Through its close awareness of community needs and its team approach, the Council advises and assists its member First Nations. The Council provides services in the areas of health, education, economic development, employment assistance, legal, public works, finance and administration, and computer communications (K-Net Services, www.knet.ca). The K-Net Meeting Place (www.meeting.knet.ca) is a website that forms part of their services.

The idea for the K-Net Meeting Place came out of a need to find ways for the larger K-Net community to communicate, interact and share information. This website is billed as a "site to gather round First Nations programs and events" and serves as an online bridge to people from communities, universities, government, and other groups. While K-Net provides a number of virtual communication tools such as email, video conferencing, and personal webpages, the creation of the K-Net Meeting Place provides an asynchronous forum where people can share information and invite others to engage in discussion.

The K-Net Meeting Place was launched in 2005. To achieve their goals, K-Net chose an Open Source learning management platform called Moodle (www.moodle.org). Rather than use this program to create a traditional eLearning environment with a hierarchy between students and teachers, as it was originally designed, they customized the code so that it could operate as a level platform. In this iteration of the Moodle, instead of allowing teachers to creating virtual classrooms, any user can create a virtual meeting place. While this adaptation addresses the need to move away from the classroom and create a more circular way of engagement, a number of these customizations are also used by First Nation elementary and secondary schools in northern Ontario. The customizations associated with this project are codenamed "MoodleFN" (Moodle First Nations) and has been made available to others that need it.

This project has required K-Net to be creative and to work around various challenges. To do so, they needed to understand the software and then change it to create an environment that is open, accessible and transparent. The initial stage of the project only took K- Net two to three weeks to develop. As it was adopted by their users, the usefulness of this environment quickly became apparent. Since then it has gone through a number of major updates and continues to be a work in progress.

Using a platform that was intended for eLearning (and changing it into a meeting space) has allowed K-Net to take advantage of some powerful tools but it has also brought on a number of challenges. In order to avoid changing the core of the software, K-Net opted to create plug-ins known as modules and blocks. This route was taken so that they could remain part of the Moodle community and to continue to contribute of that development. In doing so, they are stretching the capabilities of what Moodle can do. This work has drawn interest from schools and organizations from a number of countries around the world.

Along the way, users have provided feedback and asked for new features. In turn, K-Net researches the proposed features and develops the required code when it is possible and feasible. One new feature that K-Net is currently investigating is the possibility of creating native language packs so that users can create Meeting Places in their own language. Currently, users can create a static web page in other languages but not a fully immersive environment.

When users create a Meeting Place, they are given full administrative privileges so that they can play around and learn the software. Administrators can also access one-on-one support via email or phone. K-Net is currently in the process of creating documentation to help on this front. Once users are comfortable with the Meeting Place they create, they then take it out of the test stage and then put it into the production stage and invite others to join. The structure of the Meeting Places varies from organization to organization and person to person. Some have a lot of structure and others have less but all these spaces have been used as a conduit to link up to people and share knowledge.

Over the years, Meeting Places have been used for various purposes. Some focus on entrepreneurial skills like how to start your own business, some on how to apply for a grant, some train technicians to support the computer networks within their local communities, while others provide a forum for discussing best practices in health and education.

Looking to the future, K-Net is creating an interactive space that will continue to grow. Further down the road, the site will likely include a greater capacity for social networking by allowing people to share their media and their voices. As the number of Meeting Places increases, the site will continue to reflect these diverse programs, causes and interests that surround First Nations people. In doing so, K-Net hopes to promote and reflect Indigenous Knowledge systems, which have always centered on knowledge and relationships that radiate as expanding and interconnecting concentric circles. Such an approach would allow individual Meeting Places to become associated with larger communities of interest.

In order for other organizations to create sites like the K-Net Meeting Place, they would require a server, an Open Source content management system (such as Moodle) and technical knowledge on how to modify the platform. It would also benefit from a belief in the value of Open Source software, especially for use in First Nations organizations, since Open source projects allow people and communities to take ownership of the technologies and systems that they rely on. Above all, this sort of site requires community support. It is the user community that provided the impetus to create this site and their ongoing feedback that spurs on further development.

In keeping with the Open Source philosophy, K-Net is happy to package their modified platform and share it with others who would like to launch a similar site. Since the Moodle platform has a built in ability to network with other Moodle sites, the creation of other sites like the K-Net Meeting Place could lead to increasingly larger circles of sharing and learning.

Kookum's Ojibway

Kookum's Ojibway is an application developed in October 2010, by President and Founder of Ogoki Learning Systems Inc., Darrick Baxter. As a social entrepreneur, Darrick wanted to explore the possibilities of preserving the Ojibway Language through technology and teach others how to develop similar applications. This exploration brought him to the Apple iPhone and the Apple iPad. Not being complete familiar with the Mac Operating environment, Darrick spent time learning the skills through the Apple on-line developer and two books he purchased that assisted him in his understanding of the required programming code. In doing so he was able to teach himself how to develop an application in Apple's iPhone and iPad environment that could function in the Ojibway Language and designed a workshop to share what he has learned with others.

Out of this development, Darrick created a 5-day Application Design Workshop for aboriginal young adults. This workshop helps participants become familiar with the Mac Operating environment and teaches them how to create and design application programs for iPhone and iPad. Participants will then release the newly designed programs into the online App store for distribution and purchase in the mobile consumer markets. Participants become familiar with all aspects of application design: structure, program logic, audio and visual development and user testing processes. Darrick is hoping that this next generation of developers will reap the economic benefits from this process, which in turn will also benefit their communities.

Darrick started Kookum's Ojibway application by identifying common conversational phrases used in English. He then brought together elders and community members to record translations of those phrases. The phrases and their translations resulted in an application which gives users the ability to click on an English phrase and hear a vocal translation. As a social entrepreneur, Darrick has offered this application to the public at no cost. He has throughout this journey been given opportunities to capitalize and/or monetize the application, thereby realizing a personal profit from it. He has refused to do so. In this way, he supports the need to preserve culture and heritage. He also believes that this is something indigenous groups of Canada share – they want their oral traditions and practices to continue and this traditional indigenous knowledge to be passed on to the next generation. His particular twist on these beliefs is that technology offers one of the best opportunities to accomplish this. Following this belief has lead Darrick to pursue a career in technology and he has used this to finds creative ways to assist the aboriginal community to utilize technology based tools for their benefit.

The development of the Ojibway application opens the doors for others to begin developing applications that use an aboriginal language in a mobile learning environment such as iPad and iPhone. There now is a mobile or "m-learning" model which can be shared with others. Communities and schools are beginning to utilize this application in non-formal and formal learning settings. The real benefit is to those people in the community who will be learning to develop mobile applications and those who will be using the applications to educate themselves. In the case of Kookum's Ojibway, they are learning how to understand and speak the language.

The affects of this type of ICT platform in preserving culture and language will ripple throughout indigenous communities around the world. The affect increases as more people realize the benefits of preserving their traditions through technology.

Being a social entrepreneur, Darrick has a passion for using and developing ICT. He spent time in the Apple developers' forums learning how to create applications and connecting with other experienced developers to learn how to tweak various aspects of the application to function on the iPhone and iPad. Going through this process, Darrick realized that anyone with an idea can do this.

The development of the Ojibway Application was supported financially by Darrick himself. He also sees the opportunity for others to be creative and enterprising in using his application. Some of the costs included contracting translators to translate the English phrases to Ojibway and contracting speakers for the audio recording of the phrases.

The main issue that arose with the development of the application was Intellectual Copyright. There are indigenous language preservation groups who may find that these types of ICT developments infringe on some of the work they do and would prefer if developers used their translators for these types of projects. It is important to keep in mind that these groups have existed for a numbers of years and have developed experience and expertise that would greatly benefit these projects.

Politics did not play a role in the development of the application, but aboriginal leaders did support the application once it was released. The leadership could see the value added by these types of ICT developments for the betterment of the preservation of their heritage.

To duplicate this process a small group of committed individuals, from anywhere and any background and have a passion for ICT, would need to come together and develop a strategic plan detailing what they want to see happen with the development of applications in a Mac Operating environment. There would also need to be supporting finances, which could come from the individuals who are personally involved, from the community and/or from external funding in order to cover costs of any needed equipment and software for visual and audio editing. Another requirement would be a facilitator or team leader that has been through the experience that can guide the group through the process and challenges of developing their own application programs.

Darrick's company, Ogoki Learning Systems Inc., is an incorporated single owned entity specializing in the development of e-learning and online educational programs that employ proven strategies for community capacity development.

ICT Training Program

Darrick Baxter of Ogoki Learning Systems developed a six week training project that conveys knowledge and skills to young adult learners in a non-formal learning setting, within an environment traditionally setup to deliver education in a formal classroom environment. For this training, schools offered an available computer lab with the necessary programs and internet access for the success of this type of project. Selected participants, young adults in Grades 10-12 were taken out their regular school schedule for the duration of this six week project and learned about the various ICT tools and techniques. In contrast to the formal learning environment, the setting is an experiential participatory learning environment for learners, who as participants were still expected to complete any regular school work they missed during the six weeks.

Projects such as this ICT Training Program expose learners to current real-time tools and the skills they need to participate in the information and knowledge environment and assist in slowly and steadily bridging the digital divide. These young adults are then better prepared to consider pursuing careers in the ICT field and pursue entrepreneurial opportunities. They can even offer to share the skills they have learned or offer their skills to others as a fee-for-service business model. The content and emphasis is determined by the areas of interest shown by each individual learner. It covers introductory skills to the available ICT that allow an individual to actively utilize the technology tools in ways which interest them most.

The project begins with a selection process that was set up to determine which young adults would participate in the project. Those that were selected were those that were able to demonstrate that they had a commitment to not only learning the ICT skills taught by the project but those who could demonstrate that they could also complete any regular school work as well as completing the required workload for the ICT Training Project.

Following participant selection a fully equipped computer labs was offered in a number of Aboriginal schools. One school was located in Grand Rapids and two were in Winnipeg. Darrick facilitated the knowledge and skill development through various guided and open ended activities that allowed the participants to work at their own pace and in an area of ICT that interested them.

Each computer lab was equipped with video and audio editing equipment, laptops and PC's. All were loaded with software programs such as Photoshop as well as programs used to develop internet content and websites. A variety of open source tools was also used to assist with their project developments.

Once training started the effect was immediate. The learner's level of engagement was clearly demonstrated; they were often so concentrated on learning that they did not take any or request any breaks -- this level of commitment also shows how focused the learners were in the sessions. Their efforts throughout were concentrated on the work they put into their projects. At the end of the sessions learners presented their projects. Their individual projects then became a showcase through which they could demonstrate the level of skill and knowledge they gained in the program. In some case, learners were able to teach their computer teachers new things they had learned in the training sessions, demonstrating they now had knowledge and skills that they would not have otherwise been gained in the formal learning environment.

The impact of this training will be long term. These learners can now share what they have learned with others and in some cases offer their services to their communities and local businesses at a fee-for-service. They have also realized that they can learn new skills, be highly engaged and be committed to an open learning process.

This project grew out of long standing relationships with groups such as ICTAM (ICT Association of Manitoba), University of Winnipeg, Frontier School Divisions – Grand Rapids and University College of the North, all of which assisted in piloting this non-formal learning project in high schools throughout Manitoba. In addition, the provincial First Nation Leadership groups support this project and are some of the key supports to expand this program into other communities for the fall of 2011.

Some of the challenges that arose included trying to access online resources and tools. The Frontier School Division and Winnipeg School Division internet use policies prevented access to some online resources and/or research areas. This required finding other ways of providing or gaining access to the needed information or tools. In some cases it required the purchase of the products.

As more young adults learn the fundamentals of ICT, they become a valuable resource to duplicating this project in their home communities. Over time, projects such as this ICT training program will build the foundation of workforce skills in the development and delivery of ICT programming to remote, rural and Aboriginal communities across Canada. With adequate funding support, community support and access to a well equipped computer lab, this project can be delivered anywhere and modified to fit the needs of any particular community.

Ogoki Learning Systems is an incorporated single owned entity specializing in the development of e-learning and online education programs that employ proven strategies. Ogoki Learning Systems Inc. was established to promote e-learning, product knowledge and professional development. It delivers enhanced technology-based solutions designed to engage the learner and help to achieve their performance goals. Ogoki Learning Systems Inc. can deliver blended learning solutions in a friendly non-formal learning setting or business environment.

Community Voices

"Community Voices; West St. Modeste" was the third participatory learning project undertaken by the regional network of CAP Sites in the Labrador Straits area. This unique approach attempts to teach the participants a variety of computer topics, such as Internet searching, e-mail, and word processing, by having them work towards a goal of recording a story from their own past, one that represented their life in the area. The project was based in folklore with technology learning opportunities incorporated.

The younger generations in Labrador communities are moving away for work, so the overall population is aging. One of the problems for older adults is that many of them do not have ICT skills and the world is quickly passing them by. Many middle-aged people feel embarrassed to be in a classroom – most of them didn't even like being in the classroom when they were children.

In the West St. Modeste project, for the first time, men were participating in the training. Three of the seven participants were men. One man was 76 years of age – the oldest participant yet – who worked on a memoir of his teaching career. He collected photos of all the schools he taught in at via email from communities around Labrador and Northern Newfoundland.

Four participants had never used a computer before. By the end of the project, they were able to exchange emails with their children for the first time. L'Anse au Clair also ran a small training project in the same year. Two of the participants had a friend in Japan who they'd never been able to send pictures to until they participated in this class.

The concept of a participatory approach to learning was adopted by two organizations in Labrador, SmartLabrador and Partners in Learning, when they initially collaborated on a project called "Women's Voices" in Forteau in 2005. The project model was duplicated a couple of years later in L'Anse au Clair for a project called "Community Voices", again combining the concepts of folklore and technology. The end result of the L'Anse au Clair project was documented online at the following address: http://www.lanseauclair.ca/home/2.

For the third instalment of the project in West St. Modeste, SmartLabrador and Partners in Learning developed a concept and proposal for submission to the Community Access Program Newfoundland and Labrador under their Innovation Project funding program. Using lessons learned from "Community Voices" in L'Anse au Clair, they created a format for computer training and content development that enabled the participants to create a group slideshow and website.

The participatory learning model can be compared to on-the-job training. The approach allows for participants to share decisions on what is to be learned and how it is to be learned. Participants are all learning at the same time, and even if they begin at different skill levels, they can often help each other learn. When the learning process involves a personal project – in this case the documentation of personal stories and community history – individuals become very motivated to learn, often not realizing how much they are learning until the end of the project. The most important elements of this training are the informal environment, the freedom to ask lots of questions, and the opportunity for one-on-one, hands-on training.

There were several key partners involved in this project, including SmartLabrador, Partners in Learning, the Labrador Straits CAP Network, and the Town of West St. Modeste. This partnership enabled the management and facilitation of the program to an audience that would otherwise not have participated. It also allowed for the sharing of equipment, space, and human resources. The infrastructure and resources needed to deliver this project included two training facilitators, a computer training lab with four to six laptops, a large monitor or projector for demonstrations, and technical support which is available on an on-call basis for immediate phone and/or onsite support as needed. In addition to in-kind contributions from the partner organizations, the project was supported with $5,000 of Innovation Project funding via the Community Access Program Newfoundland and Labrador.

Some of the challenges were:

- One of the facilitators had to leave in the middle of the project but the project administrators were able to hire a new facilitator without causing a gap in the training.
- Winter weather became an issue, especially for the participants driving a half hour from the neighbouring community of Red Bay.
- Using the Community Voices model, the project administrators had been prepared to conduct a group project tied in with the Coastal Heritage Experience but there was such a diverse array of participants involved – coming from three different communities – that they were opposed to the idea of a group project.
- There were two distinct skill levels in the group – half were at the absolute beginner level, while the other half were at an intermediate level. This created a difference of opinion on desired outcomes – the intermediate participants wanted to do slideshows, whereas four of the seven participants each worked on a personal project. This was one of the benefits of having the participatory learning style whereby participants were able to choose the learning methods and outcomes.
- The computer lab used for this project was purchased by SmartLabrador in 2001 – it only has four computers still working and is using Windows 2000. Two participants brought laptops from home, one with Windows XP and one with Windows Vista. The participant using Vista was a first-time computer user and required extra one-on-one help from the facilitator as Vista was so much different than the other operating systems. The participant with XP was able to follow along with the Windows 2000 training, as the difference between these two programs is minimal. As more people are beginning to purchase computers for their homes, the computer lab needs to be updated with the latest software so that participants can learn in the computer lab using the same software that they would be using in the home.

The project provided the means to broaden awareness in the general public of the Community Access Program, the partner organizations, and the strong partnerships that exist between these agencies.

As previously mentioned, the West St. Modeste participatory learning project was the third of its kind undertaken by the regional network of CAP Sites in the Labrador Straits area; this model has proven to be very transferrable.

SmartLabrador also used the Community Voices participatory learning model for a fourth project within the same year – the Coastal Heritage Experience. They trained three participants between the ages of 55 and 64 at the Forteau CAP site in oral history collection skills as well as computer skills in order to be able to enter the digital files from the oral history collection into the project database.

As people begin to buy more laptop computers for their homes, the CAP sites in the Labrador Straits area are also exploring the option of holding a "Bring-Your-Own-Computer Café" workshop, where patrons can receive informal one-on-one assistance with their own computers from a training facilitator or technician.

Good Learning Anywhere

In 2001, the Sioux Hudson Literacy Council (SHLC) began to explore ways to increase the literacy of Aboriginal people in Ontario. Following that initial discovery period, in 2003 the Ministry of Training, Colleges and Universities (MTCU) accepted the proposal for the Good Learning Anywhere distance education platform and in 2004 SHLC piloted the platform with the Teacher's Assistant Career Training (TACT) program. TACT was an eight month program designed and delivered to forty learners in fourteen remote and isolated Northern Ontario First Nation communities, in partnership with Confederation College. The purpose was to provide upgrading and relevant skills for community members who worked as Teacher's Assistants at the local school with children with disabilities. In 2005, SHLC then launched the online program which reached 120 learning participants. The project observed that Aboriginal participants seemed to learn and work better in groups. This evolved to an interactive group learning and sharing environment. Today "Good Leaning Anywhere" has approximately 850 active participants learning and studying online.

The challenge faced by SHLC was how to deliver literacy upgrading to the Aboriginal, First Nation, Métis, and Inuit people living in remote areas of Northern Ontario. It included finding solutions to address not only the low literacy levels but also the high dropout rates of remote Aboriginal peoples in Ontario. Meeting the challenge meant exploring ways to adequately meet the upgrading, employability and independence needs of remote learners. Their journey of exploration led to the development and evolution of Good Learning Anywhere, a program which created an environment where learners could access education programs from anywhere on any topic.

In 2003, SHLC submitted proposals for the pilot phase of Good Learning Anywhere. By 2005, 120 aboriginal learners were actively studying six courses online. By 2011, Good Learning Anywhere had expanded to approximately 93 various courses in topics such as self help, academic and general interest. The program continues to evolve to include other training programs, such as a course based on HRSDC's essential skills profile for the Heavy Equipment Operator. Websites and online activities were integrated to create a combination of a Moodle (asynchronous) and Centra (synchronous) courses utilizing various social networks such as a website (http://www.siouxhudsonliteracy.com/), blog (http://siouxhudsonliteracy.wordpress.com/), YouTube, Twitter (http://twitter.com/#!/shlc_gla) and Facebook (https://www.facebook.com/siouxhudson) as ways to keep learners connected with each other.

Through its various web enhanced communication avenues, this program offers a culturally supportive, flexible distance learning environment that is designed primarily for native individuals, communities and organizations but is available and free for all learners who want to improve their skills and quality of life at home, at work and in the community. The effects are long term, increasing the overall literacy levels of remote Aboriginal communities, increasing workforce employability and independence of community members. A number of the participants in this program have gone on to participate in higher education and some have become entrepreneurs.

Getting to that point has required diligent work from many sources. In the beginning, Dr. Michelle Eadie explored and researched ways to connect with remote learners. Bolstered with her information, Sioux Hudson Literacy Council, a non-profit, community based, client centred literacy training organization which operates the Sioux Lookout Learning Centre, put together the proposal for the Good Learning Anywhere project. This program was to utilize and channel the distance delivery program. The MTCU funded the project and had strong support from the Network of Local Literacy Councils as well as the Ontario Association of Adult and Continuing Education School Board of Administrators. It now provides an online classroom and meeting space for students, teachers, coaches, trainers and leaders of adult literacy. Here they can speak and interact with one another anonymously; see and share written information, photos, diagrams, graphs, etc. on their computer monitor; use a whiteboard; visit and explore other websites; and share Word and Excel documents. SHLC has partnered with Contact North in the design and delivery of their online courses, with Alpha Plus who offer support and expertise to online learners, and a new partnership with K-Net Meeting. Other partners include the various communities the learners come from, government funders and local funding agencies. SHLC has successfully achieved charitable status and has begun accepting donations for programming. They are now offering introductory courses on how to access and use the technology in the learning environment and gathering feedback from trainers, learners, communities and experts to improve the services.

Like most programs, Good Learning Anywhere has its own share of issues that need to be dealt with. The program runs a deficit every year. This is largely due to delay in government funding approvals and it requires a close working relationship with local resources to ensure the program continues until funding is finally received. Liaising and getting the word out to communities – advertising – is something that must be addressed continuously in order to ensure sufficient uptake of the program. Also there are often attendance issues due to personal challenges and family dynamics. The introduction of a mentorship component which helps to keep learners connected with trainers and other learners has been beneficial in addressing this issue.

SHLC is a charitable, non-profit, community based, client centred literacy and basic skills program delivery organization. It is governed by a board of five directors. It networks with satellite and local literacy groups and explores partnerships with local communities and organizations. It serves anyone seeking to improve their literacy and basic skills but the Good Learning Anywhere program is targeted for aboriginal learners.

The key elements that would need to be addressed in trying to replicate this program in another area would include developing partnerships with local communities, literacy organizations and community groups, government departments and technology based learning organizations. It would be necessary to have a solid, peer-to-peer, learning platform. It would also be beneficial if the delivery organization was a non-profit organization and having charitable status has added benefits when it comes to raising funds. The Board of Directors of the organization should be representative of the region. It is also necessary to have a physical space to coordinate activities from and there must be access to internet or to a community access site. Such a program requires a committed team to coordinate research and access available resources to ensure the project meets its goals. The team would need to include trained adult educators that can utilize available social media networks to connect and share with communities.

Building Aboriginal Culturally Sensitive Protocol: Canupawakpa Dakota Nation IT Project

The Canupawakpa Dakota Nation (CDN) project commenced on June 1, 2005 and ended on August 31, 2008. The original completion time was scheduled for May 31, 2008. With some unfortunate delays, including a tornado that wiped out the tower supporting the internet wireless receiver and transponder, they requested and received 3-month extension, making the final completion date August 31, 2008. The objectives of the project were:

- to increase the number of First Nations persons qualified to provide Information Technologies support by creating an effective skills training and placement program that could lead to employability for those interested in career placement in the Information Technologies field and/or industries that employ technology;

- to work directly with CDN to form significant outside aboriginal and non-aboriginal private and public partnerships to help reduce the information/technology barriers that exist within CDN and help link CDN with other communities in the area;

- to create a technological network, comprised of current Information and Communications Technology (ICT) equipment (web conferencing equipment, for example) housed within an adult education centre and information resources that would give 185 people the opportunities to acquire employability skills;

- to increase awareness and knowledge and provide resources and tools that would encourage use of the various interactive learning technologies, such as a 4 module e-business/e-commerce "Train-the-Trainer" program and a pre-existing virtual "Business Accelerator" program that focuses on client work and business planning; and

- to reduce the technological and information barriers experienced by First Nation persons, including those with disabilities, by promoting the importance of the inclusion of First Nations communities, specifically CDN and focusing on the relationship between the cultural values of First Nations persons and the issues related to technology.

The Manitoba E-Association (MB E) managed the project which was funded by Human Resources and Skills Development Canada's Office of Literacy and Essential Skills (OLES) in the amount of $394,991.00 for its delivery. The total project costs were $776,142.00. The additional costs were covered by other funding that was obtained during the implementation of the project and went directly to CDN. For example, funding was obtained through MB Science, Technology, Energy and Mines to purchase video conferencing equipment for the adult learning centre as well as to pay for instructional resources for one full year. Additional partners helped fund some required computer equipment and paid for employing some youth. These partners who

provided funding or in-kind support included: Industry Canada, Aboriginal Affairs and Northern Development Canada, Manitoba Aboriginal and Northern Affairs Department, Microsoft Canada and INet Link.

The main gaps and needs identified in the project's initial phase included a shortfall of actual ICT infrastructure available to the community. The key factor however was the requirement of the new learners wanting to understand and utilize the technology such as those applications requiring broadband. It was also clearly evident in our inventories that the community members felt that healthcare, childcare, education, traditional values, local employment opportunities and technology were important for quality of life. As is the case in many First Nation communities throughout Manitoba, the majority of its residents are unemployed and/or underemployed, with 85% or less having a Grade 10 or under education.

The initial pilot phase allowed the team to recognize some of the gaps and needs. Although we could not assist in addressing all of these it was extremely helpful in ensuring that we expended additional resources in areas that we were competent in. The team worked diligently to ensure that ICT, IT and various other technologies were part of the project. Technologies such as broadband, new networks and/or network enhancements, up-to-date equipment, wireless environments, virtual business and technology related workshops as well as Interactive CD-ROM's were all part of filling the gaps and needs for the community. Some highlights of the activities completed in the project include: completion of four asset inventories including Business, General Skills, Cultural and Previous Efforts; the provision of additional resources to assist in providing outside resources for the Adult learners including a Virtual training project for 2 students for 1 full year; the provision of a pool of diverse expertise was made available to the community through video conferencing sessions when needed to assist with mentorship; mentorship support which enabled CDN to initiate an employment work program every year throughout our project; and training to two individuals early in the project so that they could provide evening training using the Microsoft Curriculum so that by the end of the project there several leaders within the learning environment that assisted with training to other classmates. Microsoft Curriculum is still being used by the Adult Education Centre to teach community members in the evening. In addition, there were numerous training packages provided to instructors that were used in the classroom. There were 10 modules with 26 topic areas created (3 full CD's) specifically for this project by MB E. These were used by learners at the Adult Education Centre and/or at home. A Proposal Writing Guide was created for this project and was made available to the Community Serving Organizations (CSO's) participating as a resource for project proposal creations; the Community now has their own sustainable website; and a number of virtual workshops and business resources were made available specifically to the Adult learners who had an interest in a certain career field. In addition, MB E made business planning expertise (experienced internal staff) available on numerous occasions to assist with business planning, marketing and to discuss career opportunities with adult learners. More than 30 youth were employed every year by CDN and Function 4 provided employment opportunities to more

than 5 youth over the 3 years; the virtual classroom project provided additional high school mathematics credits to 2 adult learners; and funding was been found on several occasions throughout the project that provided immediate benefit to the Adult Education Centre, the Band Office and the community. This included funding for new technology equipment, broadband services, enhanced broadband services, new technologies, employment, virtual classroom (teaching & equipment) and a replacement tower and equipment following the tornado.

One of the most unexpected outcomes of the project included the ability for everyone involved in the project to become more adaptable to the needs of the community. This was an extremely rewarding project and it allowed the team members to understand the cultural differences while providing opportunities to improve our relationships. More importantly, the organization was able to learn from the aboriginal partners how to utilize minimal resources in order to provide long lasting and sustainable impacts. Other surprises included the fact that 527 learners were reached as opposed to the original projection of 185 and that the Community Serving Organization's (CSO's) saved approximately $75,000.00 over the final 2 years of the project as a result of MB E providing IT support directly to the Adult Education Centre and the CDN Health Centre. MB E also wired both of these buildings as part of their contribution back to the community. After seeing the cost quotes by other IT private companies, the Band Administration saved over $23,000.00 and the broadband infrastructure that is currently in Canupawakpa actually provides better service than the technology that was available at the beginning of the project. This was a result of our relationship with a local Internet Service Provider as well as our understanding of the technology needs in the community.

As follow-up to the project, CDN participated in the E-Index, an assessment of the skills, utilization, infrastructure and affordability of seven different ICT's. CDN was then able to compare the results of the original asset mapping that occurred with the results of the E-Index to see the true value of this project on the nation. For example, the score on utilization jumped from a failing grade to an A+ during the life of the project. The data from the asset inventories provided by the participants and the community of Canupawakpa Dakota Nation, together with the E-Index data and the recommendations included in the final project evaluation, provide some compelling insights as to the impact of technology when it is paired with a program such as the Office of Literacy and Essential Skills.

It was found that providing solid project management and leadership proved to be the most effective strategy throughout the project. This was done by ensuring that key staff members were involved on the project. The organization has learned through the many years of experience working on such complex and unique projects that providing strong project management experience will prove beneficial and will lead to significant successes.

Some of the things that did not work all the time included providing various virtual workshops. The reason for that was because the technology did not always work prior to the workshop commencement. Virtual workshops also can appear to provide a impersonal environment, which in turn led to low attendances. The challenges encountered on this project would clearly not happen again. In fact, the project team is now confident in its ability to identify any significant issues much quicker than what occurred on this project. The other significant change that would occur to a similar project would be not to have as many deliverables. The focus would be more heavily on the delivery of the workshops and training through the use of technology. Because this community had almost no technology resources, the organization unfortunately had to expend significant resources on assisting with ensuring that the infrastructure was in place. Along with solid partnerships, funding and support in order to replicate this project, it would be necessary to ensure that all partners have the available resources available up front, before agreeing to deliver in that specific community.

The Canupawakpa Dakota Nation supported and encouraged this project for the betterment of its members and the community. CDN is governed by an elected Chief and Councils and is proximate to Brandon - about 30 kilometres from Pipestone. Its territory covers agricultural land and is located near to the oil and gas activity that is centred in the Virden area. The community language is Dakota.

Manitoba E-Association is a not-for-profit organization which was formed in May 2004. The goal and objective of this organization is to facilitate the adoption and utilization of innovative e-solutions by collaborating with organizations and/or communities to build e-capacity.

Mobile Technology Workshops

In a time where home buyers prioritize ability to receive broadband services over home inspections, Manitoba E-Association (MBE) understands the importance of connecting rural communities to the internet. As leaders in Manitoba broadband development, MBE has participated in bringing broadband services to all of South Western Manitoba, as well as the Central and Parkland regions of the Province. As a result there are over 150 communities that now receive broadband services because of these efforts. This has had a huge impact on these communities in terms of retention. It has impacted the youth and especially entrepreneurs as it was a necessity in order for their businesses to grow. Things like research, development and online sales were nearly impossible with their previous dial up. The ability to utilize broadband services has also increased the ability to acquire resources such as healthcare. This is exemplified in one community that had been unsuccessfully searching for a doctor. Once the broadband services were available, the community was finally able to reach the requirements requested by a sought out physician, who wanted to come up but needed internet as a requirement for his children. In some communities the demand for broadband services was almost double the forecasts. However, there was a big gap, people did not know all the various ways and pieces of technology they could use once they had broadband services.

The recognition of this impact provided MBE with the opportunity to use their knowledge and bring their experiences to the table in order to develop and set about providing a Mobile Technology Service. The vision for Mobile Technology Workshops was to create workshops that are interactive; they did not want to just show people a PowerPoint presentation but to actually show them how this stuff works. They wanted to bring a video conferencing unit or a laptop or a tablet out and show people how to use it. Mobile Workshops were therefore designed so that they could be brought to rural communities – so that the resources would come to the community instead of vice versa. MBE took the opportunity in all rural communities new to

broadband to market the importance of technology for everyday uses. Uses relevant to business, education, health and personal use were highlighted along with the technology itself, providing communities and organization with the training pertinent to today's technology needs and showcasing the uses and benefits of broadband.

Communities or Rural Municipalities can request a workshop by contacting MBE. To date, five communities and five RM's have done so. In addition, annually the workshop is provided at the 50+ Trade show. In order to focus the training and provide a workshop which is tailored to the needs and challenges of the community, RM or organization, participants select from topics chosen to provide flexible solutions such as: broadband's impact on education; broadband's impact on community growth; remote teaching opportunities; information sharing; community applications of technology; video conferencing; instant messaging; web training including today's usage of the Internet from Google to FaceBook to LinkedIn and mobile applications; e-Business training; business uses of broadband from cloud storage to Google apps; VoIP; Skype; SharePoint; and personal uses of Broadband from social networking to digital media, email, streaming movies and blogs.

In addition participant can select different physical pieces of technology that can be used with broadband. These include: desktop computers, laptops, Netbooks, tablets, eReaders, storage devices, web cams, printers, scanners, web based fax machines, routers and wireless cards. Recently, mobile phones have been included as well as many have a Wi-Fi option which allows them to use the broadband. Following the workshop, each participant is also provided with a directory of useful websites in both paper and interactive CD ROM format. All instruction on topics selected by the community is further individualised by establishing learning goals at the start of each workshop. The goals are determined by the participants and not by the instructors. In addition each participant is shown how to either access or produce the information, data or media on multiple pieces of technology as each instructor comes to a workshop with a vehicle loaded with equipment and suited to the learning needs of the participants. The workshops are very "hands on" where people get to learn by doing as opposed to just listening. Each workshop typically requires a minimum of two and as many as four instructors depending on the number of people attending and the topics and equipment to be covered.

The impact on participating communities was immediate. Local self employed business people like those who sold cosmetics or house wares through house parties, were able to streamline their business and seek out new customers using web based tools. People on diets and those who were trying to quit smoking found websites which offered support groups and other tools that assisted them. Small businesses who could not afford their own server to manage business-based email learned to use cloud based services at low subscription prices to handle their needs. The benefits were as numerous and varied as the participants.

In terms of politics, when going into a community it is important to know what type of technology services and businesses are available within that community. Care must be taken to include them and to point out they may be able to assist the participants in the future.

In order to replicate this project it is necessary to have people who can deliver a wide range of training topics and who can fit their work schedule to the needs of the requesting communities and/or organizations. In many situations this means delivering services on weekends and in the evenings. It also requires continuous learning and experimentation with new technologies and services on the part of the delivery agent in order to present as up to date information as possible. The facilitators cannot hold any particular product bias and must be able to present the full range of technology options available without picking any favourites.

Adoption of Technology for Economic Change: "Cultural Values Integrated with Technology"

The Adoption of Technology for Economic Change (A-TEC) was an initiative that was undertaken by Manitoba Innovation, Energy and Mines (IEM) in Waywayseecappo First Nation (WWFN), Pelican Rapids and Sapotaweyak Cree Nation, in partnership with the Manitoba E-Association (MBE), in 2010 and 2011. The objectives of the project were to:

1. Work directly with the selected communities in order to initiate a multi-tiered project that will have immediate and/or long-term economic development impacts including employment opportunities for youth; where youth is defined as ages 16 to 29 and no longer attending school.

2. Work directly with communities to form significant outside aboriginal and non-aboriginal private and public partnerships to help reduce the information/technology barriers that exist within the community;
3. Assist in developing and enhancing the technology education/innovative centre by installing and implementing various technologies that work coherently with broadband services;
4. Increase awareness, knowledge and provide resources and tools that will encourage usage of the various interactive learning technologies, such as IP web cameras, technology applications, Microsoft Curriculum, et cetera;
5. Work directly with youth and elders in order to sustain cultural initiatives such as: digital picture gathering, video interviews and language preservation.

The communities were selected through an assessment process which identified communities based on infrastructure, resources, willingness, need and. space availability for the youth. The project included the partners working together in order to undertake a multi-tiered project that ensured immediate and long term economic development impacts. It was accomplished by integrating broadband and other technologies into the local social and economic environment and without hindering local cultural values. With the exception of WWFN, each of these communities had a

website created the previous year through a program also funded through IEM. For the purposes of this initiative a website was also created for WWFN. The websites allowed us to better market the project from start to finish. The websites were used as a resource to provide updates and information to the community members on the progress of the project.

IEM, MBE and partners worked directly with Waywayseecappo, Pelican Rapids and Sapotaweyak Cree Nations in order to preserve the language and to further maintain the Métis, Ojibway and Swampy Cree cultural values. The work with WWFN preceded the other communities and provided experience and better understanding of the learning required to have the technology enhance the economic and social development opportunities in the second round of communities. This project was also designed to align with IEM's Asset Mapping program. The asset mapping inventories provided even greater value to this project as it allowed the team to look at long term learning strategies for community economic development. The Asset Mapping team worked directly with the partners and the communities in order to expand inter-relationships or synergies within the communities themselves.

IEM and MBE also worked directly with community leaders, educators, youth, elders and other private and public partners in order to rollout this specific initiative. The majority of the resources were focused on helping the communities learn to use and integrate technology in all the activities in order to enhance their social and economic environments. Some resources were also used to teach the community champions how to develop proposals and how to formally plan for important issues such as language preservation, distance education, and various cultural and technology based initiatives.

Within the project the partnership roles were clearly defined. IEM took a lead role in the project by providing resources such as equipment, project management and community economic development (CED) leadership to the project. MBE and the Cedar Lake Community Futures (Cedar Lake CF) provided CED and IT experience and did all the required training. The communities provided the necessary project personnel and space for the technology education/innovative centre required to assist this team in obtaining the objectives. They assisted in identifying local youth to be hired for this project and they provide the team with other resources that complemented the sustainability of this project as it progressed.

The project commenced on April 1, 2010 and will be completed on March 31, 2012. It provided a summer employment opportunity for three youth over an eight week summer period in Waywayseecappo in 2010 and three youth over an eight week summer period in 2011 in Pelican Rapids and Sapotaweyak Cree Nations. Following a concentrated IT training workshop the youth worked with elders. They then taught them ways, using the various technologies they had learned about, that they could maintain their cultural values and pass on and preserve them for future generations.

Milestones completed to date include:

1. Resources have been allocated to assess community capacity through community visits.
2. Communities were chosen based on suitability to fit with the mandate of the A-TEC program.
3. Role identification was finalized for the partnership between IEM, CF Cedar Lake and MBE
4. A finalized plan, budget and funding were approved.
5. CF Cedar Lake identified human resources that were offered by their community for this project and all communities prepared an innovation centre for this project.
6. Language training aids were developed for the youth to teach the elders so that language preservation could be achieved.
7. Technology was used as training aids for community educational purposes, power point presentations were developed, video clips were created and take home CD's were developed so community members could refresh their knowledge after the sessions.

8. Youth were trained to use the technology and employed during the summer term in 2010 and 2011. This included how to gather and create digital collections of pictures detailing family ancestry/history, how to conduct and create video interviews of local elders, youth, leaders and community members and how to edit and their cultural stories so that they could be captured on DVD.

11. Youth trained elders to do digital language conversion using everyday products. This provided voice over for the visuals of the digital collections which were originally in English. The conversion to local language was done by elders after receiving instruction on how to do so.

12. Interactive training models for creating and using technology were adopted and additional models were developed based on community needs by local youth employed through the summer program.

13. Workshops highlighting the benefit of technology took place.

At the conclusion of the project a plan was developed with each community which identified how:

1. The host communities can launch their own community development initiatives using all of the tools and resources that they learned to use in the project;

2. To continue using their Website as an economic development and marketing tool; and

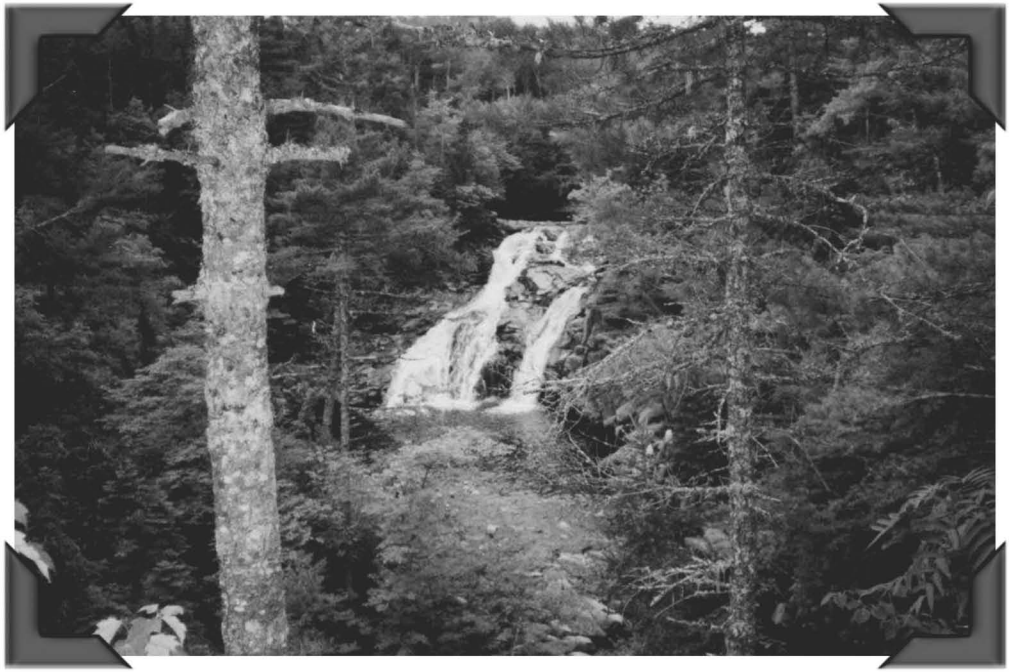
3. To utilize this model in order to share with other communities throughout MB.

In order to replicate this project, would be necessary to have funding in place to cover the costs of equipment. This project also requires constant training and ongoing development of training materials. It is not a pull off the shelf training model as it relies on the people involved to individualize all training to the activity currently being pursued and those involved with it. In some case it is the youth who need to learn how to use the technology at other points it is the elders and at still others it is community members who wish to access the final products. It would also require the availability of partners who could provide training, project management and youth supervision. At the community level there must be well grounded support in order for the elders to trust that their stories will be told in a sensitive yet comprehensive fashion.

Wolfville Radio

Times change and communities need to change along with them. The Wolfville Community Access Program (CAP) site is housed in the Wolfville Memorial Library. The CAP site provides the standard services of internet connectivity, tutorials and general information but as more and more people got access to computers and the internet at home, school or work, something needed to be done to rejuvenate this site. Forward thinking, Nick Kasteljanov married this need with his own love of music to start Wolfville Community Radio.

A few years ago, the library got connected to fibre optics. This opened the doors to much-needed expanded capacity. What could they do with all of this bandwidth? Internet radio! They wanted to build something that was sustainable with low resource requirements that the entire community could use and benefit from. Through much research, they found that they could create a community internet radio station using donated computers, free or open-source software, inexpensive hardware purchases, existing internet connectivity, a community building and volunteers.



All equipment was either free or low-cost. They use donated computers and the server for the streaming audio was built and maintained by volunteers. Much research was needed when it came time to purchase the mixer. Mixers for commercial radio stations can cost tens of thousands of dollars. They finally found that they could get by perfectly well with a $600 unit. All of the software is free or open-source (Audacity for audio recording and editing, for one example) and they are constantly researching new sources of this to improve their programming.

Internet radio requires fewer people to run then a standard radio station as much of the work is computerized and pre-programmed but volunteers are still vital to its operation. Local volunteers are used to do everything from technical assistance to programming to voice-overs. The volunteers give back to the community by working at the radio station but also become the unintended recipients of training as they learn new skills at the station. As an example, one retired gentleman, Edward Williams, volunteered to act as their web administrator but had no background in radio, podcasting or recording audio. He learned how to record audio, maintain the servers for audio streaming, transfer audio from CDs to MP3s and do voice recordings. He now teaches new volunteers how to use the technology and it is his voice on the radio station's official jingle. He now produces specialty programs (Christmas programs, Halloween programs, etc.) from his home for airing at the station. He has a penchant for old radio shows so will compile collections of them from the public domain for re-airing on Saturday evenings.

Another example is of a couple of people who get together regularly and record local Celtic music for airing twice a week. They now have listeners from Scotland and are using this venue to introduce local musicians to an international audience. Volunteers like these learn the power of the internet and how technology can connect people.

Learning has been accomplished in so many ways. Volunteers learn about the technology while working at the station. Listeners can hear, not just music and community events, but also the regular "Technology Tips" show. These are short, five to ten minutes clips produced by the CAP site that each hit one specific computer question. In this way, people do not need to go to the CAP site – the CAP site goes to them. Moreover, to promote learning at the CAP site, the DJs there are also the CAP site supervisors. Their primary responsibility is to the CAP clientele, not the radio station, making them available for all kinds of training and support. This has also allowed the CAP site to serve the community better by increasing its hours of operation.

Some of their volunteer base comes from youth in the community. Each summer they host Teen Podcast Camps. These camps are run during the summer, one camp in July and a second in August. The teens are taught in small groups of six or seven everything they need to know in order to create podcasts and how to run a radio station. Not only is technology taught but also necessary skills in public performance, people skills and speech. Hands-on experience is given at the radio station itself. The youth at the July camp are often so excited that they sign up for the August camp, as well, in order to continue the experience!

One critical partnership made was that with Katimavik. Over the years, they have received volunteers from this program for seven to twelve months of the year. The volunteers are nineteen to twenty-one years old and come to them for work experience. Each Katimavik volunteer comes with two skills that they want to develop and the CAP site/radio station provides them with training and experience in those two skills along with a host of others.

The radio station has become so popular that they have listeners from across Canada and around the world, including such places as Boston, England, Scotland, the Caribbean, South America and New Zealand. This gives their local musicians international exposure.
One challenge that they met was the noise that the radio station created. The CAP site and radio station are located in one big room on the second floor of the Wolfville library. There are computers on both the first and second floors. Commercial radio stations have their own glassed-in room but this isn't the case in Wolfville, where the radio station is located in a corner of the CAP site. At first, this created concerns from some of the users who wanted quiet in order to work. These ones were directed to use the computers in the library, which they did quite happily. This challenge lead to success, however, as it attracted more and more young adults to the CAP site. They enjoy the noisy, vibrant, "happening" atmosphere there while the adults enjoyed the quieter environs of the library atmosphere down stairs. This increase in foot traffic through the library has also lead to an increase in books being borrowed.

One thing that has been important to this group is to help others replicate this project in their own communities. Their Regional CAP Coordinator, Debbie Innes, created an easy User Guide that others can follow. It has everything needed to set up and maintain a sustainable, community focused internet radio station including advice on equipment, community outreach, care and training of volunteers, partnership building, programming and much more. They keep it up to date with situations they have encountered and advice on how to overcome them. They also have all kinds of forms, links, experiences, posters and such posted for download.

They have now been approached by different groups eager to set up their own community radio stations. One was the Indian Brook reserve. They were working on getting their own FM radio station but were running into regulatory hurdles. Internet radio proved to be just the answer for them. The Halifax Regional CAP Association also hired a youth intern to research the feasibility of building a similar project in Halifax and that is on-going.

By moving to radio, the Wolfville library and CAP site have created a welcoming community gathering place where people "learn by doing". The CAP site isn't a sterile place of technology only but is vibrant with the buzz of people, whether they are getting together on the sofa in the laptop corner, assisting with the radio station or taking part in any of the myriad of activities on the computers. The library too has progressed from being a book warehouse to hosting concerts, drum workshops, open mic nights and poetry nights, just to name a few. Radio has enhanced both the CAP site and library to create an excellent blend.

Innovative Training and Manitoba CAP YI

Manitoba E-Association has been the delivery agent of Industry Canada's Community Access Program Youth Initiative (CAP YI) program in Manitoba since the organizations inception in 2003. Regional Coordinators, Pam Skatch and Stephanie Meilleur have collaborated their stories to capture how they feel CAP YI has contributed to Manitoba's technological and economic development.

The CAP YI program was developed to provide computer training at no cost to the public. CAP Youth Interns develop workshops, cyber camps and one-on-one training based around the needs of the community. Pam and Stephanie explain that each community's needs are different and CAP Youth Interns work with the communities to ensure that training opportunities match those needs. In many areas, the interns provide service to more than one site and in some larger sites there are more than one intern. The number of interns at a site is determined by demand in the community or neighbourhood for training. They may do training such as cyber camps, which are workshops that are aimed at making learning about technology fun. Cyber camps will offer technology based activities such as t-shirt transfers, online scavenger hunts, emailing Santa or virtual to actual pumpkin carving over the holiday seasons. Alternately, workshop formatted computer training is also available in the smaller communities where it is not always possible for community members to access accredited computer classes. Pam notes, "The CAP YI Program allows people to access this computer training within their community. CAP YI interns are often the only technology based training option in smaller communities. People aren't able to travel in bad weather or don't have the time to travel an hour to go to neighbouring communities that offer the training. Therefore, in most rural communities this training is still a need."

In Winnipeg, Stephanie Meilleur's youth interns have been working on some innovative ideas around First Nations cultural awareness and are starting to touch on cultural preservation. At Ma Mawi Resource Room, the CAP YI youth started a blogging program for youth. Kids came in and were taught how to make a blog on a subject matter of their choice. Stephanie recalls, "we had lots about hunting and fishing and in the end we were actually able to get the participants connected with an ice fishing group and sent them to go ice fishing." This was an initiative to get youth using other tools on the web and expand their knowledge of alternate social networking venues. The program ran over eight weeks and during this time youth learned how to research subject matter, how to create a blog and how to add and edit content and attachments on their blog.

As well, Stephanie speaks about a program through Nor'West Community Co-op that is directed at helping adults find gainful employment. "We found that most of the people coming in were adults who wanted to get a job... they didn't know how to make a resume or search for a job properly. We had them make up resumes and cover letters using a tool that was put on the e-office (a website used by the CAP YI youth, used partly to network with each other and share resources) and make up accounts on Workopolis and/or Monster. This enabled site users to create a resume they wouldn't have been able to on their own." Stephanie explained that in the past people in this community would go to a library to try and put together their resume but wouldn't know how.

"There would either be no one there to help them or the person helping them would have limited time to assist them. At Nor'West they have the undivided attention of the intern for the term that they are there."

Benoit Vrignon is a youth intern who works at a Francophone site. His story highlights the flexibility interns must develop when their goal is to meet the needs of the community. He has stated, "When I was hired by the Community Access Program in September 2007, I wasn't sure what to expect from the job. The description was somewhat vague and I quickly realized that it was up to me to find a direction for the sites where I worked, within the CAP YI context. Being mainly stationed at the Bilingual Service Centre in Saint Boniface, I found an ideal clientele for basic computer training. The centre is home to branches of federal, provincial and municipal government services, such as Family Services and Housing as well as l"Accueil francophone du Manitoba, an organization whose main goal is to help French-speaking immigrants and newcomers integrate in their new community. Many of the centre's clients do not have access to the Internet at home or simply do not own computers. The centre provides them with the opportunity to use these tools for tasks such as job searching or writing résumés. My responsibility is to assist the centre's clients with any computer-related tasks in order to familiarize them with what one can accomplish through modern technology. Some of our clients who have never used a computer but wish to learn, may not be able to afford computer courses or workshops. Therefore, I offer free and flexible, informal, one-on-one training sessions for developing basic to intermediate computer skills. In many cases, these training sessions include an overview of Microsoft Windows, Microsoft Word, the Internet and the creation and use of email. The overview focuses on a personal and professional approach to these programs. While some of our clients might request an accelerated crash-course informative in a one-to-one session on a specific program, others will attend classes on a weekly basis for a progressive learning experience. The centre has had 1,133 people use their computers since I started out there in September 2007. I have assisted many of them with computer-related tasks and taught approximately 25, in most cases on multiple occasions. In my opinion, hosting the Community Access Program at this centre is an important asset to the community, especially for its members who may not otherwise have access to online resources or computers."

Corrine Bell, another youth intern, has a similar story to tell. She has said, "Working at The Women's Resource Centre has been a growing experience both personally and professionally. The day to day job involves the whole spectrum of emotions, the incredible high from being able to help someone conquer the forces that threaten to beat them down and the lows when the circumstances dictate that you cannot do anything or what you can do may not be enough. The women who are our clients consistently surprise me with their strength and inner beauty. Before the Christmas holidays in 2007, I was presented with a challenging opportunity, helping one of the most disadvantaged groups of women in the city of Brandon - our local immigrant women. Westman Immigrant Services approached me asking if I would take on 3-5 of their clients from El Salvador. I freely admit that I was apprehensive at first due the difficulties of overcoming the language barrier. This was initially overcome through the help of an exchange student from Honduras who was volunteering at the Centre. She translated for me and it worked well. Unfortunately, she was leaving only two weeks after I started to teach these women. I was actually teaching four women at once. It quickly became apparent to me that this was another obstacle to overcome once my translator left because it was overwhelming having to teach four at one time by myself. Westman Immigrant Services was not able to provide a translator for me because they are so overloaded. We agreed that the women would split up into pairs and come at separate times. With that obstacle dealt with, I had Christmas holidays to figure out a way to teach four women computer skills who do not speak the same language I do. I came up with what should have been the obvious solution from the start – Internet translators. I tried out a couple different ones and settled on Babelfish because I found it to be a little more user friendly. Once our lessons started back up, I found that they were much more productive with the smaller groups and that the translator, while not perfect in its translations, was a godsend. It really highlighted the absolute importance of communication. I found that the progress we made began to accelerate exponentially. Since our humble beginnings in December, my ladies have managed to become familiar with using online translators, having their own email address which has allowed them to keep in contact with their families in El Salvador, basic functions in Microsoft Word, finding educational resources for their children and finding information from home. Perhaps the most rewarding thing I saw was that what I was teaching them enabled these women to share their new life in Canada with their families in El Salvador and still keep in touch with what was happening there."

These are just a few examples of the innovative IT teaching methods that have been applied in Manitoba. They have learned that training must be flexible. Youth interns have needed to be inventive to provide training in varied locations and to tailor-make their lessons to suit a wide range of individual and community needs. To replicate this initiative, funding from Industry Canada for the CAP and CAP YI Programs would be essential as is both central coordination and community support for the youth interns.

Persons with Disabilities Individualized e-Capacity Building

This process started by engaging First Nation people with disabilities. The purpose was to create understanding and awareness of the available technology and social media. The individuals targeted were family and community members affected by disabilities or those who lacked awareness about the benefits of social media. Individuals were guided through the process of accessing technology. They created user accounts for various social media and/or networking sites and learned the basics of using a computer. Individuals began using websites such as Facebook, YouTube, JTV, Twitter, Hotmail and Gmail. As the person become comfortable with the basic elements of the website, the next phase was to explore online communities of interest, with an emphasis on health and disability related topics.

This process met each individual's challenges by guiding them through the development of their user accounts for each social media website. This then allowed them the freedom to, when they were feeling isolated, reach out to others or to secure resources when they were needed.

This approach offered a way for individuals with disabilities to move from a sense of isolation and being homebound to becoming social media facilitators and connecting with others with similar health challenges. Social media also became a way for them to stay connected with family and other and to share photos, videos and resources. Individuals began to develop their own level of comfort with particular sites and explore other ways to participate in the social media movement. The approach was a participatory individualized approach and one-on-one coaching was provided when the need arose.

The one-on-one coaching happened on an ongoing basis or when a new skill needed to be learned. It was very individualized. It was tailored to suit the time the learner had available and encouraged individuals to continually explore their own skill development and to use technology specifically suited to their needs.

The impact on each individual was almost immediate. As the person become more aware of topics they were interested in they gained a greater understanding of their role within the social media world. This included participating in entertainment oriented sites such as JTV. This site includes viewer forums where viewers can discuss the program or genre they are interested in. One learner has become so proficient at this that she now serves as a moderator for one of the science fiction forums and develops small digital stories on YouTube.

Family and community members seeking to be introduced or further develop their technology skills, specifically developing a professional presence as a job seeker or becoming involved in the social media world, also benefited. In some cases, the individuals are beginning to see the monetary value of developing or offering services to the global audience and are able to do so at their own pace. In other cases, individuals become more actively involved in their home community's political and socio-economic challenges, through their new found voice in social media. The use of First Nation's languages, though it is not always standardized, is becoming more present on community websites and even in chat programs. This serves to strengthen the culture and community.

No funding is need for the one-on-one coaching, providing one has an individual willing to volunteer their time for such an activity. The individualized facilitation is flexible to the learner's schedule and level of comfort with the technology. A home computer or laptop is required along with an internet connection. In some case, assisting the individual to utilizing alternative technologies such as voice activated and screen reader programs or modified mouse hardware may be required.

Some of the areas that need further exploration and awareness include being aware of one's own impact through social media, and how to be open with your thoughts without being gossipy or slanderous. Many First Nation people often use social media as a way to vent their frustrations, which can sometimes end up in some unfavourable situations or political interventions.

Anthony Niiganii is a capacity development facilitator offering leadership, e-capacity, employability and personal development sessions to both individual and groups. Anthony's passion is to assist the Aboriginal community members to become more active in improving the socio-economic areas of their life's, families and communities.

This process works anywhere and only requires a committed facilitator/coach to spend time assisting the individual to explore ICT and social media, help create a personal and professional web presence and act as a guide to setting up user accounts.

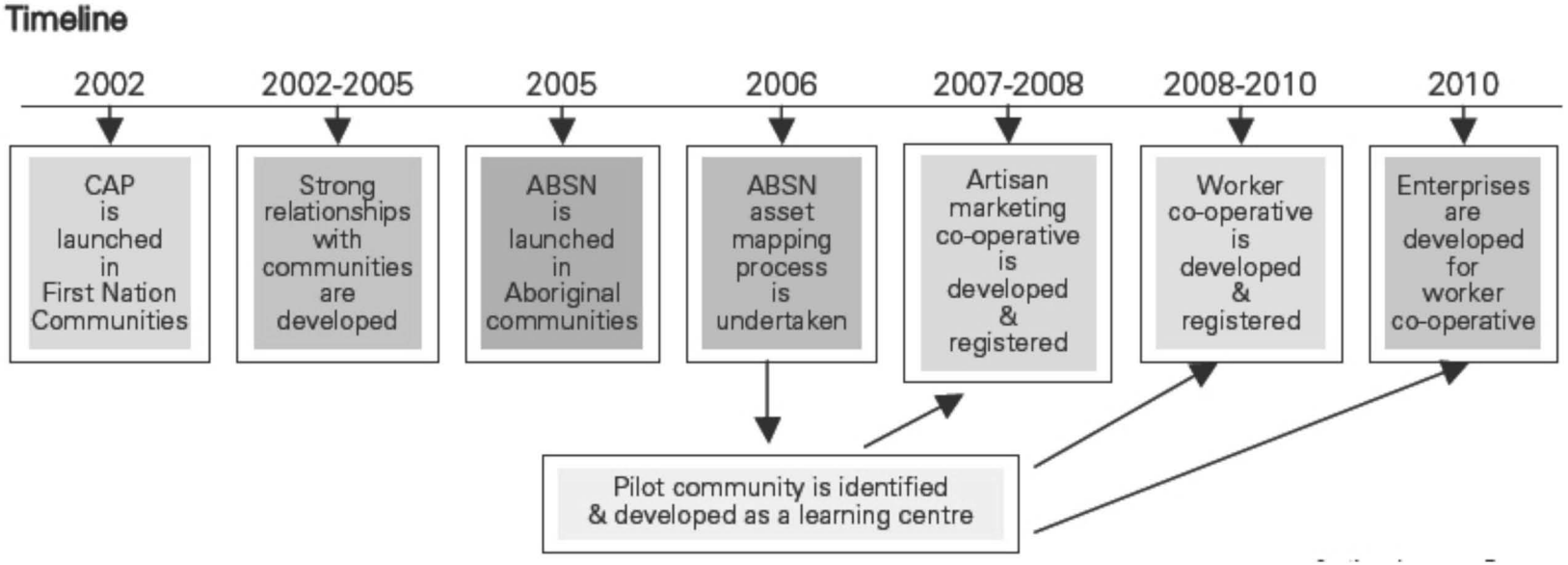
Thickwood Hills Centre of Excellence & Worker Cooperative

The Thickwood Hills Business & Learning Network (Thickwood Hills) is a non-profit organization dedicated to helping grow communities through training and by providing internet access and other business services. It is their belief that in today's age of technology, it is of utmost importance for communities to have an understanding of, and access to, the internet and to have available the vast knowledge and resources that it can provide. Through this organization, much informal and incidental ICT learning has taken place as a result of the organizations activities. The aim of their activities was not aimed at increasing ICT learning directly, but that was a fortunate by-product of their efforts, and this story illustrates how ICT learning is achieved in various ways as those skills become more and more integral to success in today's job market and economy.

Since 2005, much progress has been accomplished under the umbrella of the Aboriginal Business Service Network (ABSN) to propel economic development in First Nation communities in Saskatchewan and to provide tested approaches to foster entrepreneurship in communities so more jobs can become available. The scene was set in 2002 when Thickwood Hills was able to reach First Nation communities when it assumed the role of coordinator of the Saskatchewan west central region Community Access Program (CAP) supported by Industry Canada. The main objective of this program was to bring technology to the communities by introducing computers and Internet access.

Through the support of the CAP program, strong relationships were developed with twenty one First Nation communities. Many of these communities identified a need for projects aimed at promoting learning, access to the outside world to promote economic development. This need was especially poignant in the Big River First Nation, located 120 kilometres west of Prince Albert, Saskatchewan which was experiencing a 50% plus unemployment rate. From early discussions among community members and artisans, it was decided to pursue a cooperative. Computers and the Internet were used to do research, to obtain planning tools and to communicate with other artisan groups. Champions were identified within the community and Thickwood Hills got to know the leadership of the community. More and more information, training and resources were provided and stronger relationships were built with the communities. It remained crucial to have a presence in the communities and CAP provided the glue to providing key information and services.

The following timeline illustrates the sequence involved in introducing, developing and bringing about a formal structure like a worker cooperative and the enterprises that are necessary to sustain and grow a worker cooperative. It is quite evident that an initiative like this doesn't become a reality over night. It is fundamentally necessary to recognize that true community development with a strong economic development mandate takes time.



In 2005, when the ABSN project was launched and participating communities were identified, they were able to move to a community development strategy by developing the skills of the CAP youth interns. By 2006, the CAP youth interns were able to proceed with the development of a preliminary community asset map. This was instrumental in identifying strong and suitable communities in which to pursue pilot projects. It formed the basis for an expanded asset map. Big River First Nation was quickly identified as having the potential for the development of a pilot project so their asset map was developed further.

Through the support of ABSN, Thickwood Hills continued to provide resources, training, mentoring and developmental expertise. As part of the asset mapping process, the artisans were identified as a group interested in discussing marketing strategies. Through funding from Cooperative Development Initiative (CDI) and ABSN, the artisans were brought together as part of a round table. They soon demonstrated an interest in some kind of business development. They eventually agreed they should form a marketing cooperative to enable them to sell their art. Artisan leaders came forward to serve on the Board of Directors and to develop the bylaws and operational procedures. Much training was undertaken with the artisan's group to learn about cooperatives, budgeting and marketing, and all learning here was also indirectly aimed at increasing ICT skills in applying the new knowledge in a way that is meaningful to today's modern knowledge economy. All learning was participatory and involved all participants learning by doing. Training was often delivered in computer labs, where participants would have the opportunity to apply their learning in popular software suites such as Microsoft Office. The Ohpahow Wawesecikiwak Arts Marketing Cooperative was incorporated in July of 2008.

The unique aspect of the artisans in this group was that they were preoccupied with the needs of their community. They expressed their sorrow in the high unemployment rate of their community and sought to discover a solution to this issue. A temporary board was chosen and these individuals are continuing to learn all the details of establishing and running a co-op, including governance, establishing a board, chairing meetings, developing and enforcing member policies, writing participant agreements, developing a business plan, setting up and reviewing financial statements, marketing, quality control and designing a web page. The web page was used for online marketing, and training including elements of HTML and site design, as well as content management methods.

During 2009, with further support from ABSN and CDI, unemployed workers of the community, community leaders and the artisan cooperative worked with a cooperative developer to move forward in developing the cooperative. This task was more complex as parallel to the development of the workers was the development of enterprises that would provide work. After much effort, the worker cooperative is developing enterprises to provide employment for many residents of the community. The challenge is to keep developing and growing enterprises so the worker cooperative can really be instrumental in providing numerous jobs. As long as there is support from ABSN and other sectors, this will happen.

There are two distinct, but at the same time parallel, streams of learning crisscrossing the activities of this project: the use and adaptation of information and communication technologies (ICTs) as well as the development of skills and knowledge required to operate a business. Through this project, there was an increase in adoption of ICT skills overall. The participants learned how to use ICT as a tool to run and maintain business records and to develop marketing and communication strategies. The participants' ICT skills are assessed pre- and post-learning using both on-line and hardcopy self-assessment tools.

Some challenges to achieving this project as it relates to the ICT learning that took place included: the lack of sufficient broadband internet, the lack of locally skilled resource people, the difficulty in attracting skilled resource people to teach in the rural community, mobility and transportation issues in the remote community and also a low literacy level. Achieving community buy-in can also be problematic but the project was lucky to have strong support.

Efforts of the working group resulted in the incorporation of the Whitefish Opportunities Worker Co-operative Ltd. (WOWC) in July 2010. In the fall of 2010, the Government of Saskatchewan through its Enterprise Saskatchewan Community Development Trust Fund allocated funding to build a Centre of Excellence for Business Development. The Centre will contain classrooms, five businesses, a comprehensive computer lab and business library and offices. These are currently under construction.

STORY CONTACTS

Page	Contact Information
9	Renee Krucas (Executive Director) or Brendan Griebel (Cultural Program Development) Kitikmeot Heritage Society, Box 2160, Cambridge Bay, NU X0B 0C0 Ph: 867-983-3009 Fax: 867-983-3397 Email: heritage@qiniq.com Web: www.kitikmeotheritage.ca
13	Department of Economic Development, Yukon Government Joseph Delgado, Senior Advisor - Research, Innovation, and Commercialization Ph: 867-667-5633 Email: joe.delgado@gov.yk.ca Web: http://www.economicdevelopment.gov.yk.ca/
15	The Halifax Regional C@P Association, Dan Robichaud, Executive Director: Ph: 902-830-6638: Email: admin@halifaxcap.ca
19	Gwen Healey, Executive Director Qaujigiartiit Health Research Centre, Building 987-B, PO Box 11372, Iqaluit, NU X0A 0H0
21	Brian Beaton, K-Net Coordinator - Keewaytinook Okimakanak, Box 1439, 115 King Street, Sioux Lookout, ON, P8T 1B9 Ph: 807-737-1135 x1251 M: 807-216-5216 Fax: 807-737-1720 Email: brianbeaton@knet.ca Web: http://knet.ca
23	Lyle Johnson, K-Net Video Conferencing Coordinator - Keewaytinook Okimakanak Box 1439, 115 King Street, Sioux Lookout, ON, P8T 1B9 Ph: 807-737-1135 x 1387 Email: lylejohnson@K-Net.ca
27	Cherylynn Walters Chair/CEO and Colleen Stinson, Manager of Special Projects - Marieval Enterprise Center Inc. Box 236, Grayson, SK. S0A 1E0 Ph: (306) 794-2051 Fax: 1-800-934-5421 Email: colleen@marieval.com Skype: colleenstinson Web: www.marieval.com
29	Vanessa George, Program Officer - Community Access Program (CAP), Department of Education Government of Newfoundland & Labrador Ph: 709-729-3177 Fax: 709-729-3462 Toll Free: 1.877.929.1829 Web: www.capnl.ca
31	Sheila Downer, Executive Director, Smart Labrador Inc. P.O. Box 41, Forteau, NL, Canada, A0K 2P0 Ph: 709-931-2072 Fax: 709-931-2370 Email: sdownersmartlabradorca
33	Claude A. Pike P.O. Box 9, Netsilik School, Taloyoak, Nunavut, X0B1B0 W-Ph: 867-561-5181 H-Ph: 867-561-6336 Email: yepcap@hotmail.com
35	Neil Burgess – Project Lead Ph: 902-845-2039 Cell: 902-670-1984 Email: elearn@togetheratadistance.ca or nburgess@owls-head.ca Web: http://togetheratadistance.ca

STORY CONTACTS (CONTINUED)

37 Jakob Gearheard, Executive Coordinator - Ilisaqsivik Society
Clyde River, NU X0A 0E0
Ph: 867-924-6565 Fax: 867-924-6570 E-mail: coordinator@ilisaqsivik.ca Web: www.ilisaqsivik.ca

39 Ron Elliott, Project Manager - Nunavut Youth Consulting
P.O. Box 141, Arctic Bay, NU X0A 0A0 Ph: 867-439-8050 Email: relliott@qiniq.com Web: www.nunavutyouth.com
Information gathered through interviews with Nathaniel Chouinard and Ron Elliott

41 Shari Gearheard, Ph.D. Email: shari.gearheard@nsidc.org Web: www.ittaq.ca

45 Blackout Music
Bangem (Kenny) – producer, Hip-Hop Artist, beats and audio
Email: everythingblackout@gmail.com Web: http://www.youtube.com/user/blackoutmusicco

Jordan (Tim Butler) – Hip-Hop Artist, audio, video and photo Email: Jordan_paper@hotmail.com

3DVisualz (Damian) – Hip-Hop Artist, videography and photography Email: 3d@live.ca
Web: http://www.youtube.com/user/3DVisualZ#p/u/5/zvUbsXM1zaY

47 Fred Campbell - Ryakuga Grassoots Communications Ph: 902-684-3957 Email: fred@ryakuga.org

55 Yvonne Poitras Pratt
PhD Candidate, Communication Studies, University of Calgary and Fishing Lake Métis Settlement representative
Email: yvonne.poitras@gmail.com

Robert Kershaw - Canadian Projects / Witness Tree Director, Center for Digital Storytelling
1803 Martin Luther King Jr Way, Berkeley, CA 94709
Web: www.storycenter.org
Ph: 510-548-2065 USA Cell: 510-292-6515 CDN Cell: 403-627-7691

57 John Burton, Executive Director - Boys & Girls Club of East Dartmouth
50 Caledonia Rd., Dartmouth, NS B2X 1K8
Email: executivedirector@BGCED.ca Ph: 902-435-9918 Main Office: 902-435-3204 Fax: 902-435-1441

59 Shari Gearheard, Ph.D. Email: shari.gearheard@nsidc.org Web: www.clyderiverweather.org

61 Nunavut Youth Consulting - P.O. Box 141, Arctic Bay, NU X0A 0A0
Ph: 867-439-8050 Email: nunavutyouth@hotmail.com Web: arcticbayatlas.ca

STORY CONTACTS (CONTINUED)

63	Tim Hoyt - Najuqsivik Society - General Delivery, Sanikiluaq, NU Ph: 867-266-8816 Email: thoyt@qikiqtani.edu.nu.ca
65, 67	John Kerr - Director, Tatlayoko Think Tank, Box 14, 7116 Tatlayoko Rd. Tatlayoko Lake, BC VOL 1W0 phone & fax: 250-476-1187 Email: ttt@chilcotin.bc.ca
51, 69, 71, 73, 75, 87, 91, 93, 99	Clarice Leader, Executive Director - Manitoba E-Association 100-135 Innovation Drive, Winnipeg, Manitoba, R3T 2A8 Ph: 204-480-1069 Fax: 204-474-7830 Cell: 204- 781-6937 Email : cleader@mb.e-association.ca
77	Fernando Oliveira - Keewaytinook Okimakanak Box 1439, 115 King Street, Sioux Lookout, ON, P8T 1B9 Ph: 877-737-5638 ext.1345 Email: fernandooliveira@knet.ca Web: www.meeting.knet.ca
79, 81	Darrick Baxter, Founder/President - Ogoki Learning Systems Inc Ph: 204-804-6454 Email: darrick@ogokilearning.com Web: http://ogokilearning.com/
83	Vanessa George, Program Officer - Community Access Program (CAP) Department of Education Government of Newfoundland & Labrador Ph: 709.729.3177 Fax: 709.729.3462 Toll Free: 1.877.929.1829 Web: www.capnl.ca
85	Sandra Turner, Communications and Logistics - Sioux-Hudson Literacy Council Ph: 866-550-0697 Email: sandra@siouxhudsonliteracy.com Web: http://www.siouxhudsonliteracy.com/
97	Nick Kasteljanov, Wolfville CAP Lab Manager - Wolfville Community Radio Project 21 Elm St., Wolfville, NS E2P 2A1 Ph: 902-542-5760 Email: wocap@calculon.library.ns.ca Web: www.wolfvilleradio.ca
101	Anthony Niiganii, Facilitator 1563 Pritchard Avenue, Winnipeg, MB R2X 0H8 Ph: 204-582-1117 Email: niiganii@gmail.com Tw: @niiganii FB: Anthony Niiganii YT: Niiganii
103	Marie Prebushewski - The Thickwood Hills Business and Learning Network Ph: 306-549-4726 or Email: mpreb@sasktel.net.

INDEX

Government of Canada / Gouvernement du Canada

N-CAP

Manitoba E-Association
mb.e-association.ca

Government of Nunavut
Department of Education

ISBN 978-0-9878466-0-0