

Implementation of Development Project

BUSI641 Team Assignment 2

Executive Summary

The research aims to provide a paper following the idea of the development of a start-up venture, which will be a technology company that creates new websites and upgrades existing ones for the First Nation communities of Canada. The paper has been divided into various segments to properly acknowledge and detail every aspect related to the communities and the website. The first chapter is the introductory chapter that introduces the topic while describing the indigenous communities of Canada and how they are linked to digital media. The rationale of the study is presented along with the identification of the aims and questions of the research that can be achieved by following the objectives closely. Background of the community's association with websites, social media, communications, health, and education, etc., is provided so that the Business Model Canvas can be successfully developed to identify the digital footprint of the community or rather a lack of it. This chapter is followed by the methodology chapter that details specifically the appropriate research methods, design, approaches, philosophies, data collection, and analysis that helps in building the research and achievement of the objectives. The methodology chapter helped the researcher keep the focus on the research aims and questions to generate specific data for secondary analysis.

In this project the digital revolution program have been targeted for the First Nation people of Canada. There are 643 regions present in all over Canada where First Nation people resides. Their lifestyle is quite marginalised. They are suffering from poor income status, poor health condition, poor educational system, and poor business infrastructure. They do not well establish in the digital platform. Thus, the government of Canada has taken initiatives to make the quality of life better for First Nation people. The government is trying to connect them with the mainstream of Canada. Thus they propose VANtech, a start-up venture that can develop regional websites to provide academic education, health facilities, online trainings, or promote local businesses digitally for an overall development of the community. The

development program also aims to increase social communication of these people. Several methodologies or business strategies have been adopted to drive the development program. In this report, several features of this project and outcomes have been described. Findings have been well portrayed in this report to address the research question that ensures the feasibility of the whole work. A business model canvas has been portrayed to point out significant features of this program.

This report has analyzed various aspects of technology that have been discussed in detail. The First Nations group of people do not have access to proper information therefore, it is necessary to improve their lifestyle and along with that provide the proper information regarding the healthcare facilities and education. The new start-up company has the aim to deliver the best services by introducing websites that will help to provide various information to these communities so that they can utilize that information for their betterment. The VANtech is supposed to develop the indigenous groups of people and also other such communities who do not have the access to sufficient information. Also, the communication process is said to be improved with the introduction of the websites. Therefore this report will analyze how the First Nations communities have improved in terms of the communication process and how they have strengthened their presence in social media. The recommendation will be provided after explaining each aspect of the business model canvas which will shed light on the further development of these communities.

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Introduction

The paper will focus on the start-up venture VANtech in Canada prioritizing the development, advancement, and improve social connectivity of the First Nation communities. In order to build up the technology company that will upgrade, initiate, and develop websites for communication channels for the marginalized communities from the remotest areas so that they can have improved digital presence is the target of the business, which can be achieved by gathering and analyzing secondary data as well as detailing the Business Model Canvas properties. The 643 First Nations in Canada already are involved in websites like MyKnet, Facebook, Yahoo, MSN, etc., for socializing, communicating, and gaining technological expertise, however, the focus has to be shifted to other sectors like education, and healthcare that lacks infrastructure but can be improved with the involvement of technological skills. Therefore, the communities that are stereotyped, socially excluded, and often barred from gaining much public acceptance in the world can benefit from such a venture. The communities need financial support and social care, which can be provided by the technology venture so that the isolated communities that lack access to mainstream information, as well as basic necessities like electricity or a minimum standard of network connectivity or speed, can grow. This project will not only make the communities more connected with the outside world, thus, improving their social standards as opportunities for employment and higher education will be received, but the financial strength per household can improve eventually too. Thus, with support from programs that build capacity, telecommunications, skills training for technological expertise, and advocacy of the necessity of such companies, the venture can become successful.

Rationale of the study

In order for the start-up venture to successfully launch the website, it is important for the web developers to understand the necessities and wants of the people of these

communities. Instead of capitalizing on the products they have already, technological companies have to introduce new products that can be specifically helpful to these communities. Either the formation of a new website or the up-gradation of the old one has to be done strategically to not only offer social service but also to earn profit. Furthermore, the study can help understand and identify the market and target consumers while offering new marketing channels that can help in expanding the business venture. The Business Model Canvas furthers the cause of the researcher by clarifying the resources that are available for the company to use boldly.

Aims and objectives

The following aims have been considered by the researcher for the file to be completed appropriately so that the website development is done according to the needs of the target audience:

- To understand the relationship between social media, websites, and digital communication and the First Nation communities in Canada.
- To select and analyze websites that will be developed and upgraded by the start-up venture.
- To identify and get involved with marketing channels for website expansion.
- To help the First Nation communities improve their social media presence to avoid getting stereotyped and marginalized through technological expertise and support.
- The identification of resources and implementation of a proper Business Model Canvas so that the best available options can be taken up by the company while establishing the start-up.

The mentioned aims can be achieved by implementing and attaining the complimentary objectives as stated below:

1. Identifying topics and presenting questions for research that can best prioritize the community and its needs.
2. Application of suitable and appropriate methodologies to generate secondary data that can be used for the development of the website by considering the needs of the community.
3. Detailed analysis of secondary data to confirm the past and contemporary involvement of First Nation communities with the digital and technological world.
4. Building a Business Model Canvas to focus on the different channels of engagement, communication, and business expansion.

Research questions

The research aims to answer the following questions with an in-depth analysis of the topic:

1. What is the level of involvement of First Nations with websites in consideration of their social media presence?
2. How developed are the communication channels in the First Nations of Canada for the people to leave a strong digital footprint?
3. What are the various forms of marketing channels that can be used for website introduction and up-gradation?
4. What opportunities can a technological company offer to the First Nation people and what are the areas of improvement that these opportunities can bring in the future?

5. What frameworks can be applied by the company to successfully establish the firm?

Methodology

Introduction

This section of the paper details the research methodology used by the researcher to complete the study successfully so that the start-up venture can be established for the First Nation people. Specific techniques and procedures to identify the purpose, selection, process, as well as analysis of data on a given topic is what is ensured by methodology (Basias&Pollalis, 2018). Based on this section future researchers can find a valid and reliable study on the topic. The researcher can either select the quantitative or the qualitative method of conducting the study. While quantitative research focuses on seeking confirmation for phenomena or hypotheses by exploring numerical and statistical data, qualitative research prioritizes words and feelings to generate open-ended textual data (Basias&Pollalis, 2018). Qualitative research has been selected here to understand the humaneness of research to identify effective factors that are intangible such as emotions, opinions, socioeconomic status, socio-cultural norms or beliefs, interconnected relationships, and more.

Research outline

An outline is a significant tool aiding the writing process of the paper as the researcher can then form a structure, which can be organized and followed. An outline helps the writing become impactful as well as efficient as the researcher can categorically organize their thoughts and ensure data is not forgotten. The formation of an outline can benefit the questions and objectives of the research (Jeong& González-Gómez, 2019). For this study, a considerable outline has been structured including a design of research, research philosophy,

approach, data collection, and analysis, etc. Secondary data has been considered for the generation and interpretation of it.

Research design

The framework of research methods and techniques is the design of the research. If a research design is proper then it allows the development of research methods that is suitable for the subject matter. Research design can be an experimental, diagnostic, correlation, descriptive, and explanatory. The descriptive and explanatory research design allows the successful achievement of the four standards, which are reliability, validity, neutrality, and generalization (Jeong& González-Gómez, 2019). Although the design is necessary for qualitative research the natural phenomena that exist have to be sorted through analytical means. As the design is theory-based it helps in gathering, collecting, and analysis of data.

Research onion

Saunders introduced the research onion in the year 2007 that describes the various stages that are covered by a researcher for the establishment of a suitable methodology. Maximum credibility is inquired about by the researcher that can help in justifying and explaining every level (Sahay, 2016). The research onion has numerous layers as the researched can keep on peeling to reach the core. The main parts of it are research approach, strategies, philosophy, techniques, time horizons, procedures, and choices.

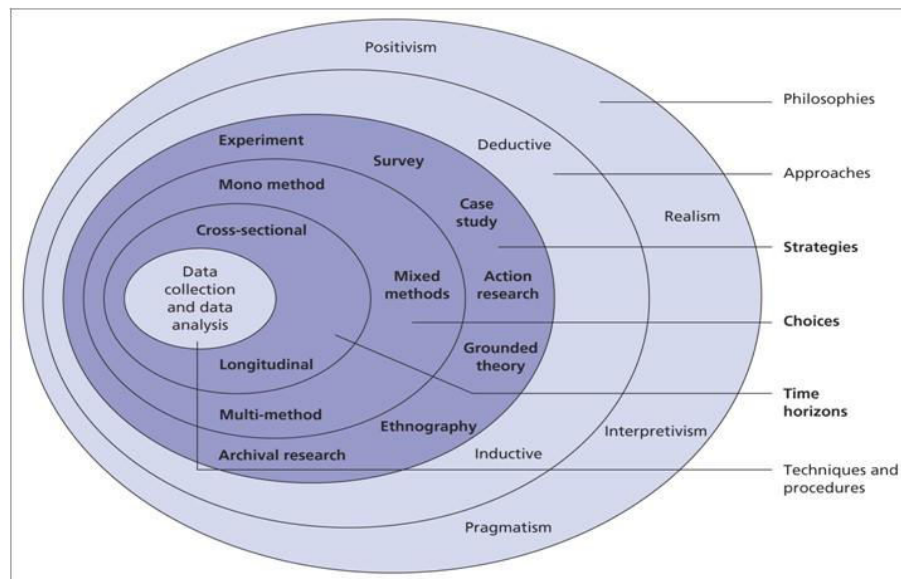


Figure 1: Research onion

(Source: Sahay, 2016)

Research philosophy

Research philosophy helps in taking decisions on significant aspects like the approach adopted to understand the view and perception of the researcher. Philosophy can follow epistemology, realism, or positivism theory. The researcher has made use of the positivism concept that allows the study of the social entities, which are the indigenous people of Canada through observation (Nugroho, Sillehu&Sunarko, 2018). Data collection and formation of hypotheses are done next, which is followed by the testing and confirmation of the hypothesis through a structured methodology. The steps in this philosophy include determination, reductionism, measurement, empirical observation, and theory verification.

Research paradigm

The collection of techniques, values as well as beliefs that the members of a community share are a research paradigm. It can follow ontology, constructivism, or pragmatism. It provides a model of the standard that the researcher has to uphold. The process of ontology gives the researcher the space to prioritize a single reality depending on

its existence (Nugroho, Sillehu&Sunarko, 2018). Ontology fundamentally is the characteristic of reality that epistemologically describes the researcher's relationship with their version of reality, techniques, and tools.

Research approach

The qualitative research approach is the way that the researcher thinks and conducts the study. It explicitly or implicitly describes the purpose of the researcher along with the researcher's role, research stages, and analysis method. There are five types of approaches namely biography, phenomenology, grounded theory, case study, and ethnography. The researcher has used the ethnography and grounded theory approaches to complete the research (Nugroho, Sillehu&Sunarko, 2018). Through the ethnography approaches the cultures of the First Nations have been studied. The researcher as the ethnographer observed the communities by immersing in their culture. Through the grounded theory the researcher has successfully generated the research questions that are used to identify core concepts eventually and developing links between data and theory. The theory can either be falsified or justified depending on how it is being handled.

Data type

The research offers qualitative data that approximates and exemplifies a topic. Data can be quantitative or qualitative following the research method and research approach used for the identification of the data. Qualitative data collected through observations, record-keeping and non-numeric in nature is the type of data for this file (Szadziawska&Kujawski, 2017). The data is categorical and can be placed in specific groups for the determination of the traits and character of the data and their frequency. The collected qualitative data type can help the researcher quantify the world as it involves the emotions and perceptions of the participants. The researcher has collected secondary data by assessing pre-existing articles and journals by peers and experts in the field. This type of data collection has helped the

researcher reanalyze the aspects associated with First Nation people to make them more involved with the website (Szadziawska&Kujawski, 2017).

Data collection process

Qualitative data can be collected through various measures such as through a textual or visual analysis of books and videos, longitudinal studies, focus groups, interviews, observations, case studies, and record keeping. Case studies, observations, and record-keeping are the three data collection processes that the researcher has used. Observations have been concerning the involvement and presence of First Nation people in the digital world through various technological means (Szadziawska&Kujawski, 2017). These data have been recorded and compared to analysis with peer-reviewed concepts. Data from case studies have been collected from articles and journals using sites such as ScienceOpen, Education Resources Information Center, CORE, Public Library of Science, OpenDOAR, Google Scholar, etc. The versatility of the method shows its significance in the analysis of complex and simple data simultaneously.

Sampling and sample size

Sampling in qualitative research can follow methods such as snowball sampling, quota sampling, convenience sampling, purposive sampling, etc. purposive sampling have been chosen following the topic as it offers purposive as well as selective samples that can be utilized for the identification of in-depth data concerning the investigated phenomena through appropriately recruited participants (Snyder, 2019). As the analyzed data is inferred from the collected information, the content is highly subjective.

The selection of appropriate sample numbers that can represent the broader section of society to avoid repetitive data risk is the research sample size. The study should have saturation by avoiding the generation of new perspectives as new samples are added. So,

information has been gathered from trusted sites, and data from the contemporary five years have only been considered (Snyder, 2019).

Data analysis

In order to form perspectives and corroborate theories, data analysis has become crucial for future researchers. The inductive and deductive approaches are the two ways of analyzing qualitative data. There is no predetermined structure, set of ground rules, or framework that the researcher offers in an inductive approach (Snyder, 2019). However, the deductive approach has been considered here as the researcher has collected data with a predetermined structure as the questions helped as the guide to easily analyze and quickly process information in consideration of the fact that the researcher is aware of the possible results unlike in an inductive study.

Research limitations

While conducting the study the researcher faced the following challenges and limitations:

- Qualitative data collection and analysis are time-consuming.
- Data interpretation offers limited results.
- The researcher's personal experience, knowledge, and skills can influence the observations made and conclusions achieved (Mohajan, 2018).
Researcher bias is a serious concern due to the subjectivity of the methodology.
- Result verification cannot be done as the study is open-ended with no objective data interpretation.

- Data cannot be represented statistically so the chances of errors are high.
There are no mathematical values attached but varied judgments and estimations of peers.
- A labor intensive-process requiring the collection, categorization, analysis, and reviewing of data over an extended period (Mohajan, 2018).
- First Nation people's geographical remoteness and minimal social presence resulted in insufficient data concerning their lifestyles.

Ethical consideration

Maintaining the agreed-upon ethical standards for qualitative research is significant for any study. These standards are:

1. Data is collected from official sites with informed consent to offer due credits to papers and avoid plagiarism.
2. Managing ethically obligated relationships between the participants and the researcher (Mohajan, 2018). Implementation of ethically designed qualitative projects through appropriate recognition of hypotheses and theories.
3. Writing practice and dissemination abides obligatory measures like ethically changing names or individuals and organizations or omitting details that are identifiable.
4. Legally maintaining privacy and confidentiality obligations like disclosing participant information (Nugroho, Sillemu&Sunarko, 2018).
5. Ethical plan to manage and store data for future tracking.

Time frame

Gantt chart

| Option | Time | Wk 1 | Wk 2 | Wk 3 | Wk 4 | Wk 5 | Wk 6 | Wk 7 | Wk 8 |
|--------|------|------|------|------|------|------|------|------|------|
|--------|------|------|------|------|------|------|------|------|------|

| | | | | | | | | |
|---|--|--|--|--|--|--|--|--|
| <i>Commencement of research</i> | | | | | | | | |
| <i>Topic choice</i> | | | | | | | | |
| <i>Setting research questions</i> | | | | | | | | |
| <i>Choosing aims and objectives</i> | | | | | | | | |
| <i>Settling on the appropriate methodology</i> | | | | | | | | |
| <i>Secondary data collection</i> | | | | | | | | |
| <i>Secondary data analysis</i> | | | | | | | | |
| <i>Identifying aspects of Business Model Canvas</i> | | | | | | | | |
| <i>Detailing aspects of Business Model Canvas</i> | | | | | | | | |
| <i>Assessing accomplishment of objectives</i> | | | | | | | | |
| <i>Finding inaccuracies</i> | | | | | | | | |
| <i>Clarifying errors</i> | | | | | | | | |
| <i>Final reassessment</i> | | | | | | | | |
| <i>Research conclusion</i> | | | | | | | | |

Findings

Various opportunities provided by the technology companies to the First Nation people

The use of digital technologies and social media has grown to a huge extent in and around Australia. The First Nation communities face several disadvantages, now they are offered various uses of social media for accessing proper information, and improving the communication among these people (Jull, Giles & Graham, 2017). The First Nation communities face social challenges specifically in the areas of education, healthcare facilities, and accessing proper information (Carlson et al., 2018). Therefore to address these social challenges, the technology company offers various opportunities like the development of educational facilities, healthcare facilities, economic and political development in these

communities (Jull, Giles & Graham, 2017). With the help of the “Indigenous Technology Summit” which was held in Montreal in 2019, Blackberry collaborated with the indigenous communities to improve the healthcare, education, economy, and safety development for the First Nations in Canada (Carlson et al., 2018). There are other technology companies like Forest Green, Mustimuhw Information Solutions (MIS), and Microsoft that provide opportunities like cybersecurity, next-generation secure communication, Artificial Intelligence, and many others to improve the technology gap in First Nation communities (Jull, Giles & Graham, 2017). Similarly, VANtech is a start-up technology company that aims to provide the proper solution to these communities for developing their information technology so that they can avail themselves of the best healthcare and education by accessing proper information (Baker & Westman, 2018). The company wants to develop several websites for the First Nation communities so that they can live better lives.

Various forms of marketing channels used for website introduction and up-gradation

For upgrading the website and introducing it to the communities of the First Nation in Canada various forms of marketing channels have been used such as email, advertising in newspaper and television, and even word of mouth (Baker & Westman, 2018). These groups of people have a strong presence on Facebook as well therefore digital advertising campaigns are being used for the introduction and up-gradation of the website. Website is a modern advertisement (Carlson et al., 2018). Many companies nowadays are depending heavily on the websites for introducing a new website and for up-gradation purposes. Email is another marketing channel that is very popular and it helps in reaching people to a great extent therefore email can also be used for up-gradation and introduction purposes (Baker & Westman, 2018). Digital advertising is one of the most effective marketing channels which helps to introduce the website successfully. Nowadays, events have also become quite popular and have gained immense importance because it offers face-to-face contact and

therefore this is also another great marketing channel (Rotz et al., 2019). Therefore all these marketing channels are very effective and potential for introducing the website and upgrading it for the development of the First Nations communities in Canada.

Involvement of First Nations with websites considering their social media presence

A strong presence in social media is very crucial nowadays, it has been seen that every person in the world has a strong presence in social media therefore the First Nations communities need to be involved with the development of websites for strengthening their social media presence (Rotz et al., 2019). The communities of the First Nation are gradually embracing the internet resources and they are willing to bring positive changes like the establishment of the technological era. Racial discrimination might hinder the growth of technology in those particular places of Canada but there is a huge development recently as people of First Nation communities have started using tools like digitization of documents, video conferencing technology, and radio broadcast through the internet (Rotz et al., 2019). Therefore these people from the First Nations communities are strongly involved with the websites and have strengthened their social media presence effectively. Through this, the indigenous people in Canada have been able to live updated life because of their strong social media presence (Szolnoki et al., 2018). Although the First Nations communities are yet to develop in the future because many of the websites are not accessible in those places, therefore, the people have very limited sources of information (Dwivedi et al., 2021). However, it has been found that various technology companies have helped to develop the First Nation communities for developing the education and healthcare services, and the new start-up company VANtech has the agenda to improve the communication process and development of many websites that will help to provide the proper information (Dwivedi et al., 2021).

Development of communication and strategies, initiation of communication activities

The development of communication is very crucial for the communities of First Nations. These groups of people lack communication and therefore there is huge racial discrimination in these communities (Dwivedi et al., 2021). Developing the communication of these communities will help to improve the lives of the people. Therefore with the help of proper strategies and initiation of communication activities can help to develop strong communication among the people of those group and this will help in reducing the racial discrimination of the people (Lisa & Jessica, 2018). Communication is very important and the backward communities of Canada with the help of communication activities can bring positive changes in the community (Szolnoki et al., 2018). However, the Aboriginal community, Tewanee Consulting Group, BC Region, and Northern Development Canada have developed the “First Nations Communication Toolkit” in 2007 which offers various tools and communication activities that have helped to develop the communication process (Lisa & Jessica, 2018). This initiative specifically focuses on the use of social media tools and developed various communication practices which helped in developing the communication process in the communities of the First Nations (Lisa & Jessica, 2018). Therefore the communities of First Nations can practice oral and written communications over social media and this will help the communities to transform the First Nations in Canada (Szolnoki et al., 2018).

As per the research study, it has been found that there are very few numbers of small and medium businesses present among the First Nation regions. There are about 18900 in-scope business operations present in the Inuit and First Nation communities (Mirzaei ,Natcher&Micheels., 2020). All these business practices can be enhanced with developed digital infrastructure. As a result of the development campaign, VANtech and associate partners can promote these business opportunities online and also make the people well aware so that they can operate their businesses digitally. This increases their business area

and also increases the efficiency of work. By driving their businesses online, the First Nation people can be able to work easier and better handling of financial aspects can be achieved (Chen et al., 2021). With the help of online marketing, they can also promote their business ideas in a larger mass that will provide them more money.

| Industry | First Nations | |
|-----------------------|---------------|------------|
| | Non-Employer | Employer |
| Goods (non-resource) | 2.9 | 1.3 |
| Goods (resource) | 5.7 | 0.8 |
| Service | 20.6 | 4.5 |
| Unassigned | 2.8 | 0.6 |
| All industries | 31.9 | 7.2 |

Figure 2: Counts of businesses per community by industry

(Source- Chen et al., 2021)

Another significant aspect of this is, the First Nation people have to face several forms of discriminations outside of their region. Their business improvement can help to increase their social communication with the mainstream people of Canada and also help to reduce discriminations that are very frequent in the lifestyle of the First Nation people. Moreover, the development program can drastically change the business status of the community members that can make better their financial condition better. Better financial condition will flourish the development process in the future.

Health status is one of the most critical aspects of the development program of the Canadian government (Pollock et al., 2018). From the figure-2, it can be noticed that the health issues are more in the cases of the First Nation community people. They have been

suffering from severe diseases such as diabetes, cancer, heart attack, and infectious diseases (Rotondi et al., 2017). The numbers are quite high for the health issues because the First Nation people are very stereotype and full of prejudices. They do not want to ask doctors if any health issue will occur. They much rely on their home remedies. Also, they are not very aware of the health care systems and hygiene control concepts, thus they have to suffer a lot from infectious diseases. With the help of digital evolution, they can be given basic health care norms. It is very necessary to make them understand to go to a doctor to avoid serious health issues. Knowledge regarding the importance of hygiene maintenance can also be provided so that they can avoid diseases and especially to make the indigenous women aware of feminine hygiene. Women are one of the major sufferers of infectious diseases. With the online health care system, better facilities can be provided to them. Moreover, the health status of the First Nation people of Canada can be improved by this development program. Ultimately, this will help to reduce the mortality rate for the whole community as well (Pollock et al., 2018).

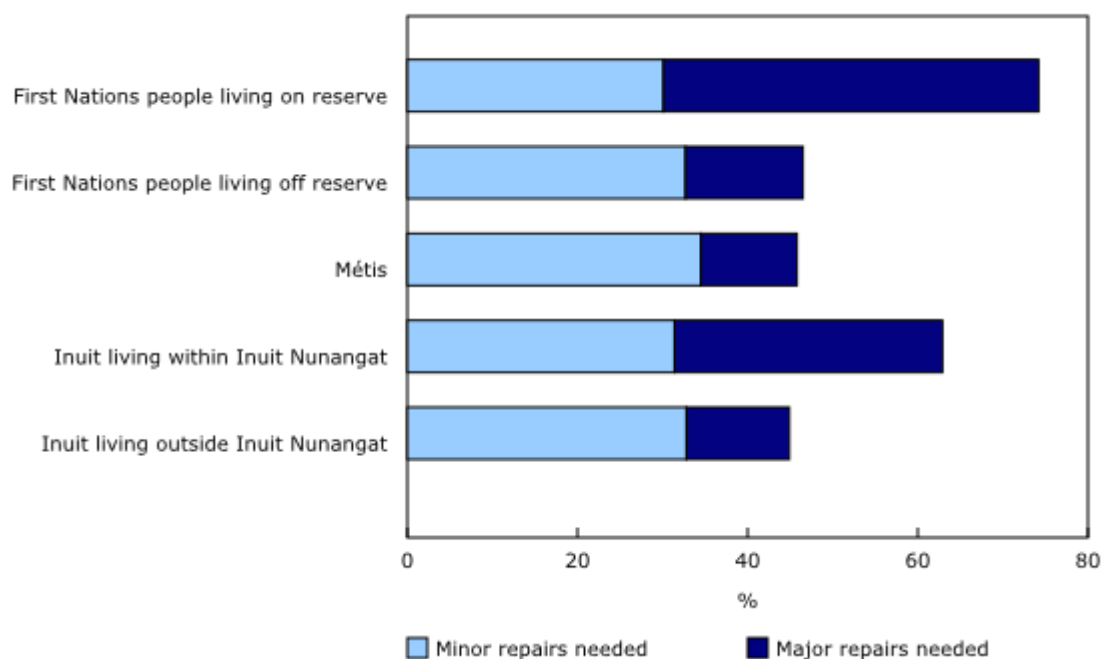


Figure 3: Health Statistics of Indigenous Community of Canada

(Source- Rotondi et al., 2017)

From figure 3, it can be noticed that the percentage of First Nation children and youths are lower than Inuit, or the Métis group of the community (Bates., 2018). This can create a large barrier to the development of the community. The education system is the pillars of a development project. With the help of this evolution campaign of the Canadian government with the help of VANtech can drastically change the educational system of this community. The children and youths of these communities are not so familiar with the outside educational institutions for their restrictions, or prejudices(Klingspohn., 2018). Another reason is the discrimination that reduces the educational percentage of the First Nation people. Online coaching can be provided to the children and youth of these societies so that they can eliminate their fear and can learn from their region comfortably. Not only academic education but several skilful pieces of training also are provided to the children that encourage their future scope in career perspectives. With the help of online coaching, the students of this community can easily interact with the teachers and can resolve their queries that help their level of knowledge. Moreover, proper education increases the confidence of any people (Klingspohn., 2018). Thus they can freely express themselves in the outside regions and thus their social communication can be improved. Discriminations, that they have to face in all places reduces. The well designed educational system can improve future educational aspects of this community, thus a continuous development rate regarding education and career perspective can be achieved.

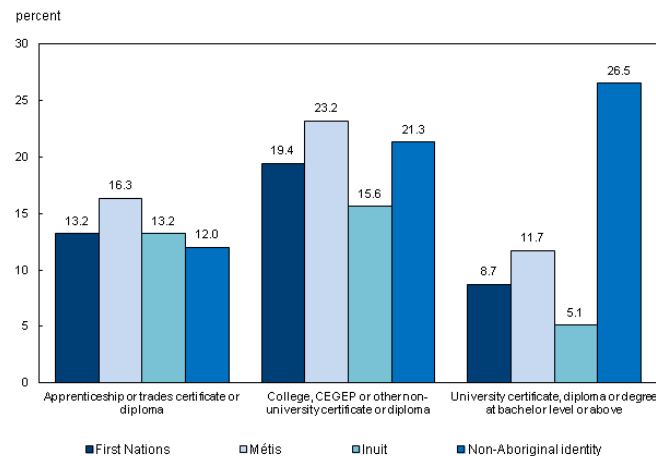


Figure 4: Percentage of Students of several Levels of Education

(Source- Bates., 2018)

There are several beautiful occasions or cultures practised by the indigenous people of Canada that can attract tourists. The cultures or rituals such as the Manito Ahbee Festival, and the Great Spirit cycle trail can be promote online so that these practices can be made a tourist attraction(Pyke, Pyke&Watuwa., 2019). From the figure-4 it can be stated that most of the people of the First Nations are earning as a labour force. Their percentage of income is also marginal. This can be improved with the help of the development program. Several other tourist spots in the indigenous regions such as Kejimikujik National Park and National Historic Site, the Huron traditional site, Wanuskewin heritage park, Tombstone territorial park, or Ksan Historical village and museum can also be promoted with the help of developed websites so that tourists from all over the world can explore these beautiful places (Pyke, Pyke&Watuwa., 2019). This can be able to create a beneficial source of income. People of the First Nation can market their crafts or rats so that they can create a separate source of income. These traditional arts can be marketed through online portals that can increase sales. Moreover, the 643 First Nation communities can be well developed promoting the beautiful tourist places and the traditional rituals, crafts, or arts that are quite different from other

cultures of the world. People of the First Nation can be well educated regarding communication skills so that they can efficiently interact with the tourists and also can market their arts or crafts that can make the developed economically and socially as well.

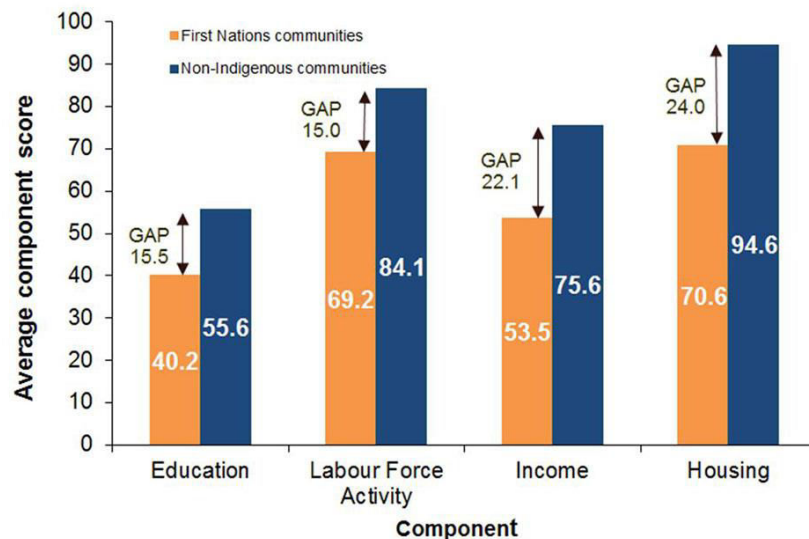


Figure 5: First Nation Community Trends

(Source- Pyke, Pyke&Watuwa., 2019)

Business Model Canvas Sections

Value Proposition

The value proposition ensures that VANtech is providing valuable services to the First Nations communities. In the business, the value propositions play an important role by developing services and products that will benefit these communities (Asongu&Boateng, 2018). Therefore the value proposition is important to provide to the targeted group of people. VANtech, in collaboration with the government, has the agenda to provide valuable services to the communities of First Nations to improve the communication process of those people.

- **Simple process for backing up-** It is very crucial to back up the data and information for further usage. Also, in those places, there is a huge issue of electricity; therefore a proper process of backing up the information and data will help to provide the communities of First Nations valuable products to overcome the electricity issues at large (Smith et al., 2018). VANtech needs to develop a simple process for creating backups so that people can create the backup easily, and this feature will help to enhance the features of the new technology company.
- **Language customization-** Customizing language to understand the information better and cater to a wide number of people, language customization is crucial. VANtech aims to provide language customization so that every person in the community can understand all the information properly (Smith et al., 2018). As the company has targeted the rural communities, elders, women, and indigenous youth, it is crucial for maintaining the issues facing all these groups of people who are equally using the websites to search for any information.
- **The user-friendly user faces implementation in websites-** The company needs to create a user-friendly interface because it is targeting all kinds of people in the communities of First Nations; therefore, VANtech needs to ensure that everyone can use the websites; therefore, the company needs to make it user-friendly to successfully cater to all people in the communities (Smith et al., 2018). The user-friendly interface would ensure that VANtech is providing valuable service to the backward communities and there is no person left who is not able to utilize the websites for getting any information (Kreiss& McGregor, 2018).
- **Specific community service designs-** The company must design the websites for the specific communities of First Nations. The service of VANtech must be designed in such a way so that all people of the communities can use the websites (Krotov, 2017).

The information is a crucial aspect and VANtech has the objectives to develop websites that will help to provide these communities of First Nations with proper service.

Key Resources

The following resources can be made available for the start-up venture so that they can utilize them to develop and upgrade the websites successfully in order to grow their business needs and desires.

1. Low costs: The most important resource for any company is the capital that was invested. The company has to consider numerous sections that need money like branding involving graphics, logo, designs, and business cards; office furniture, rent, and equipment; website hosting, email hosting, essential tools, software ad collaborating software; travel, research, engagement, meetings, and food expenses; employee salary, healthcare, and tax; marketing channels whether B2B or B2C through PR, chatbots, web analytics, SEO, and Webinars (Müller, 2019). Raw materials like transforming knowledge into reports and managing logistics and distribution are also part of it. Therefore, as a start-up venture, the company has to push through these resources while maintaining a low budget, given the involvement of the community will decline if the cost of engagement is high (Müller, 2019).
2. Exclusive functions: The development of distribution channels and marketing networks through multiple media and other social means. Exclusive involvement with the community can be done through intangible and intellectual resources such as copyrights, partnerships, collaborations, brands, patents, etc. Software development and up-gradation is a digital resource that

can be exclusively used to form legal contracts and partnerships as well as collaborations with educational institutions, healthcare sectors, travel and tourism sectors, etc., for maximum impact (Keane, Cormican&Sheahan, 2018).

3. Engineers and other workers: Employees or human resources form the most significant part of any business. They help run the operations as well as interact with the target audience while developing the firm through a suitable set of skills and knowledge as well as innovation that can give the company a competitive advantage (Keane, Cormican&Sheahan, 2018). To have maximum involvement with the community, the recruitment can be done locally by involving individuals from the First Nation communities as software developers, analysts, marketing heads, strategists, etc. This will ensure that the language barrier does not prevent the company's expansion while cultural gaps can be reduced (Metelskaia et al., 2018). The economic involvement to and from the start-up will help the community grow along with it.
4. Discoverability: The business has to penetrate the community in order to build a market that is sustainable. This is possible with marketing and advertising through social media channels and media. Social media platforms that are relevant and popular among the First Nation communities like MyKnet, MSN, Facebook, etc can provide a chance for popularizing the start-up (Kühne&Böhmman, 2018). Broadcasting channels by the government like Aboriginal Peoples Television Network or print media can also improve discoverability, which is a key resource. Marketing channels like the use of local cable networks are also significant.

5. Social brand: Along with the other resources, this is also significant in developing the business by attracting customers. The way in which a company is perceived is significant for its growth. The start-up offers a value proposition that targets a specific customer segment making it a scope-driven business (Kühne&Böhm, 2018). It is a niche business that hones resources to create social value. Additionally, the company has to propose that they are a social brand that not only aims at securing profits but prioritizes community development. This will create further opportunities for the company as collaborations with social organizations and the government targeting the development of remote communities will be possible (Metelskaia et al., 2018).

Key Partners

Key partners are also a crucial part of the business organizations and the key partners of VANtech have a strong relationship with the other business enterprises, government, and non-consumer enterprises (Krotov, 2017). The key partners help in the funding process so that the business organization can carry out the operations of the business.

- **Banks-** Banks are the integral partner because this will act as the main source of funding process to continue the service of VANtech. The company, in collaboration with several banks can take loans so that it can offer valuable service to these communities (Krotov, 2017). As VANtech is a start-up company, it is obvious that the company would not be funded with sufficient capital. Therefore, VANtech collaborating with banks can provide the best services to the communities of First Nations (Kreiss& McGregor, 2018).
- **PayPal-** Another key partner of VANtech is PayPal, which is an application that allows the transfer of money conveniently within people throughout the world. PayPal is basically for small-medium enterprises because to set up the PayPal business

account, no charges are required (Sudhakar, Kattepogu& David, 2017). Collaborating with Paypal will allow easy transactions of funds between the people so that the company can easily and securely transfer money. This collaboration is very beneficial for the company and it will help in providing proper services to the people.

- **eCommerce businesses-** Nowadays, eCommerce businesses have taken a major place in the global market therefore collaborating with the various e-commerce businesses would ensure proper funding, as well as more and more people, would be able to know about VANtech (Sudhakar, Kattepogu& David, 2017). Most people in the world use e-commerce websites to get the products right at their homes, even in a pandemic as well e-commerce businesses play an important role in delivering the products safely and properly to the customers (Kreiss& McGregor, 2018). Therefore partnering with the e-commerce businesses would benefit both the e-commerce businesses and also the company (Sudhakar, Kattepogu& David, 2017). The First Nations communities would be aware of the e-commerce websites and can make use of them as VANtech partnering with the e-commerce businesses would help these people to know about its benefits.
- **Canadian marketing agencies-** The marketing agencies also play an important role and would help VANtech to properly develop marketing campaigns by collaborating with the Canadian marketing agencies (Sørensen&Kosta, 2019). This would help the start-up company market its products and services to every First Nation community so that more and more people can utilize its features and services. Also, this would help to market the benefits of the company successfully, and more and more people would be able to know about VANtech.
- **Government and non-governmental organizations-** Collaborating with the government is very crucial because the company must be abided by the rules and

regulations of the Canadian government so that there is no issue while developing the website successfully (Sørensen&Kosta, 2019). VANtech also must collaborate successfully with the non-governmental organizations as well as this will help the company to be involved in CSR activities for maintaining the brand image of the company.

Key Activities

The key activities of the business organizations are those which the business organizations will be doing for the people. The company must perform all the major activities that will provide the services to First Nations' communities (Sørensen&Kosta, 2019). Various activities that will be performed by VANtech are being listed below:

- **Website support-** One of the major activities of the company is to provide support to the websites so that the websites can work better. Supporting the websites would ensure that the people of these groups will be able to utilize the websites properly (Sørensen&Kosta, 2019). As the First Nations communities are lagging behind, it is important to develop the websites and also provide proper support to the people of these groups so that they can use the websites properly for getting all the valuable information and data about education and healthcare facilities.
- **Maintenance and up-gradation-** VANtech also aims to maintain the websites and upgrade the websites so that the people of the First Nations communities can access the latest technology and websites. This would ensure that those groups of people are accessing the proper information and data (Carlson et al., 2019). Also upgrading the websites would ensure that it is working properly and thus the people of these groups are using the latest technology and websites. Maintenance is also required for the websites as this would ensure that there are no issues facing the people of the First Nations communities.

- **Social media apps support maintenance-** The company also aims to maintain social media apps. It is important that the websites are both working in iOS and Android and basic maintenance on both iOS and Android is required (Carlson et al., 2019). The standard maintenance is such as bug fixes, security updates, and audits. This maintenance would ensure that the social media apps are all updated and secured. As social media includes various personal information and chats that need to be secured properly. Therefore VANtech would ensure proper support and maintenance of the social media apps (Carlson et al., 2019). The company would ensure that all the social media apps are being maintained properly.
- **Customer service-** Another key activity of the company is to manage the customers and to resolve their queries according to their feedback (Shaltoni, 2017). The customers are an integral part of the company, therefore, the company needs to properly listen to the query and input of the customers. This will help the company reach out to a wide number of customers, and at the same time, the customers will benefit from the company.
- **Keeping pricing competitive-** Another activity of VANtech is to keep the pricing of the websites competitive. As this is a start-up company, it is crucial to maintain competitiveness so that it can compete with other technological companies (Shaltoni, 2017). Keeping the price on the affordable side will help to gain business enterprises to collaborate with the company, and this would ensure that the company has gained a huge competitive advantage in terms of pricing. With the help of proper strategies, the company will be able to keep the pricing competitive (Shaltoni, 2017).

Customer Segments

Customer segmentation is the categorization of the targeted people as per age and gender in the development campaign of VANtech collaborated with the Canadian

government. The segmentation has been done to provide essentials to the First Nation people better.

- **Indigenous Youth**-Indigenous people are embraces of the First Nation, Inuit, and Métis (Vujcich et al., 2018). The indigenous youth of the First Nation community has been considered as one of the major customer segments. Indigenous youths have to face several forms of discrimination by the wider community of Canada, and that is the main reason for selecting this group. The main target of VANtech is to introduce the First Nation people efficiently to the website so that they can enhance their communication skills. In this mission, the indigenous youth can be a successful target. If the youths of this community can be developed or make well educated then the future evolution will have become a natural process thus, this group of the segment is very significant for the campaign.
- **Elders of the Community**-As there are several prohibitions and prejudices are present among the community of the First Nation, the development program will be quite difficult if the elders of these group will not permit it (Ban, Wilson, & Neasloss., 2019). Thus the elders of this community can be taken under this evolution scheme to make them aware of several benefits of technology and website that can enhance their quality of life without hampering their culture. If the elders can be efficiently addressed then the interest of the whole community will increase toward the acceptance of technology in their daily lifestyle.
- **Rural Communities**-The rural or remote communities of the First Nation group of Canada are in more severe condition than other communities. They do not have any accessibility with the country mainstream. Thus they have to suffer more in health issues or financial sections (Ban, Wilson, & Neasloss., 2019). Hence, this age group of people have to be included in the technical evolution campaign of VANtech with an

interest of the government. With the help of websites, proper health care facilities or education can be provided to these people with ease, and their quality of life can be enhanced. Online education facilities can be provided to the children or youth group of these places which will make their future better than the present. Also, online training sessions can be organised to make skilled people of this group so that they can get better career opportunities.

- **Indigenous Women**-Indigenous women of the First Nation community are another significant segment of the targeted group. The health issues are more frequent for the indigenous women than others in this community(Klingspohn., 2018). They do not have any basic knowledge about feminine hygiene and thus they are the worst suffers and the mortality rate is also quite high for the indigenous women. With the help of online health care facilities, the basic health care norms or facilities can be provided to these women. Also, the women can be given training about online businesses so that they can earn by their creativity which kept behind doors still. This will increase their financial condition also.

Customer Channels

Customer channel is defined as the process or media through which a company can communicate with the customer segment(Nakano& Kondo., 2018). Several customer channels systems can be incorporated to help the whole community to succeed. These key customer channels and their significance in the partnership with VANtech are elaborated on below.

- **App store**-FewFirst Nation regions are very inaccessible for business purposes. They do not have many linkages with cities and thus they do not have any idea about technical use(Soni et al., 2020). Thus app store can help in this case. From here VANtech can launch a special user-friendly communicationapplication that can be

easily handled by the community people. Through some special applications health care routines, pieces of training regarding skill development, educational, or online marketing facilities can be provided.

- **Social media**-The concept of e-social media is not familiar to the First Nation people of Canada. They are still driving their culture through traditional communication system (Nakano& Kondo., 2018). The traditional communication system is not good enough to spread awareness about several evolutionary aspects outside the first nation zones. Several well established social media platforms such as Facebook can also promote their business ideas outside of these regions and can make them aware of several benefits of this modern technical acceptance so that they can make their quality of life better.
- **Word of mouth**-Government can play a great role to spread awareness to make a communication channel between the First Nation people and the outside investors. Government can position local authorities who will bridge for effective communication with the community people. The local government can make the whole evolution process easy for the sake of the community people. As the government itself has taken the initiative to make the quality of life better for the whole evolution process this will become quite straightforward(Katz, Enns&Kinew., 2017). The other benefit of government involvement is that the community people can feel safe if their government will present in the campaign.
- **Google Play**-Google Play is another significant communication channel. The community members can get easy access to several applications that can enhance their knowledge regarding health, education, skill, tourism, or marketing that can be very beneficial in the evolution campaign(Soni et al., 2020). Apps can make people aware of the need for technology in finance, health, education, and how technology can

make the financial process easy for people. This will help to grab the attention of the first nation people toward technology and can contribute to the development of the community as a whole.

- **Partner's Channel-**The partners of VANtech are well established in the Canadian mainstream. They have set their communication channel and that can be used in the development of the First Nation group(Slavik et al., 2021). They can efficiently collaborate with VANtech to develop the marketing as well as the financial condition of the First Nation people. These communication channels can design special communication systems for these people so that they can feel comfortable and try to make an initiative in the technical evolution that will smoothen the path of the whole community.

Customer Relations

Customer relations are the aspects through which any company can interact with their customers to serve them better and for their satisfaction (Zhao& Liu., 2019). To enhance the quality of life of the Canadian First Nation community the VANtech and the partners create several aspects so that they can deliver continuous support to the community to ensure the development. The customer relations tools are described below.

- **Self-service-** Self-service can be described as the offerings targeted group information and tools so that they can find solutions regarding their issues or questions and have good experience with the provided services(Iqbal ,Hassan&Habibah., 2018). This aspect of customer relation also helps to increase the indulgence of the community members with the development program. For this, the First Nation people can better understand the whole program and its requirements. These will encourage the development more resourcefully. People can connect their issues and needs more

critically with the evolution aspects and the acceptance will become easy for them over the stereotype thinking.

- **Customer Assistance and Support**-To support the targeted groups of Canadian First Nation people VANtech and associates has organised several online portals and temporary office rooms in the community region so that the community members can easily resolve their queries or speak about their issues so that promote actions can be taken by the authorities. With this system, the community member also can get assurance about the feasibility of the development program. As the First Nation people are not very communicative with the outside world a customer assistant and support system can make them feel free to adopt modern technologies to enhance their lifestyles (Assiouras et al., 2019).
- **Electronic Helpdesk**-Electronic helpdesk is a web-customer server-oriented allocated software framework (Assiouras et al., 2019). Electronic helpdesk facilities have been incorporated in the evolutionary program so that the community members can get enough knowledge and express their needs or issues so that these can be efficiently addressed by the relevant companies.
- **Online Support**-Online support facilities have also been introduced to provide information to a customer representative regarding skill development, basic hygiene facilities, basic education, or certification to make them more efficient to deal with the outer regions in where they have to face several discriminations (Rokhim, Mayasari&Wulandari., 2021).
- **Customer conference**-Conference system is very vital to give mass facilities to the community. A monthly conference program will be organised by the developing companies to better interact with the community members and also monitor the

development program. This face to face interaction can help in shaping future activities of these companies to serve the community more efficiently.

- **Telephone Support**-Telephonic Support system has been adopted so that the community member can easily contact authorities if they can feel any need or query regarding any development program. As the development program provides knowledge regarding several aspects of earnings, health systems thus 24/7 accessibility should be established. The telephonic interaction is thus very needed to take prompt actions. On the other hand, with this system authority can easily organise an emergency meeting or conference or can provide valuable information to the community members.

Cost Structure

A cost structure implies the form and relevance features of predetermined and erratic costs acquired by any business operations (Steverson et al., 2019). In the technical evolution program for the First Nation people of Canada, VANtech has been collaborated with several partners and has created a working framework. Several working aspects of this campaign require budget allocation to work as per the planned methodology or schedule. Those parts of the cost structure are described below.

- **Marketing and Sales**-The predetermined costs consist of salesforce expenditure, campaigns for advertisements, promotion for sales and allocation costs. On the other hand, erratic costs consist of sales performance grants, and bonuses. Several development campaigns organised by the investors need to be promoted to provide better services to the First Nation people and also the sales and marketing program will help to attract more investors to take the program in a broader range.

- **Website Development and Up-gradation**-The present websites of the First Nation regions needs development ad few changes to make them more user-friendly and beneficial for the community member(Steverson et al., 2019).This website development requires a considerable amount of budget. Also, the required infrastructure is to be established as an up-gradation program and needs a good amount of budget allocation also. Up-gradation needs a proper networking system so that online works can be carried easily even in the remote areas of the 643 regions of the First Nation (Dodd et al., 2018).
- **Vocational Training**-Vocational training can be defined as one of the training procedure that emphasises special education or skill-oriented knowledge providing procedure regarding any special target (Steverson et al., 2019). The First Nation people need basic training regarding business, health, education that requires proper infrastructure as well as money.A suitable system will be made so that mass knowledge can be provided in a single time.
- **Research and Development (R&D)** - R&D expenditures are connected with the analysis and evolution of a company's products or services and any scholarly aspect generated in the procedure (Anzoategui et al., 2019). In the development program of the First Nation communities, monitoring is an essential tool. The community members are not very connected with the outer world and thus they need constant monitoring to analyse the development feasibility and growth. Also, the monitoring system can help in the alteration of any program if needed. A special monitoring system or personnel is thus required in the monitoring and analysis process which leads to considerable expenses.
- **Information Technology (IT) Infrastructure**-IT infrastructureare the parts need to function and handle the company IT atmosphere. These pats consist of software,

hardware, operating system (OS), information storages, and networking parts

(Anzoategui et al., 2019). These are required to provide IT services to the community members and as a significant part of the whole development program.

- **Salaries**-Many personnel will be hired for sales and marketing, software development, and website development. All these personnel are required to be given their salaries which is a considerable part of the whole cost structure.

Estimated cost is tabulated below:

| Expenditure | Budget (in \$) |
|---------------------------------------|-----------------------|
| Marketing and sales | 1,416 |
| Website development and up-gradation | 20,000 |
| Vocational training | 157 |
| Research and development | 800 |
| Information technology infrastructure | 65,000 |
| Salaries | 12,000 |
| Total | 99,373 |

Revenue Streams

The revenue stream is defined as the supply of revenue of any organisation. A revenue stream has two aspects such as frequent revenue, and one-time revenue (Jacobs et al., 2019). VANtech and other associates of this evolution program need an assured source of revenue to drive the whole campaign with an assurance. Without an assured flow of cash, the companies will not be able to efficiently meet the target. Several sources of revenue are described below that are essential in this project.

- **Advertisements**-Advertisements revenue is the financial earnings that businesses and persons receive money from displaying paid promotions or advertisements on websites, applications, social media networks, or other systems that will help to

generate money(Miklosik, Kuchta& Zak., 2018). Paid promotions with the help of Google Adsense can be adopted that will cause a good amount of money. There are already company websites that are present and well established in the market. This website promotion will not require only the promotion for product, or services are required that can be achieved with the paid promotion system. Advertisements of this evolution program can also help invite new investors that will lead to a considerable revenue stream. All these need a proper presentation of the whole evolution program with the target and benefits so that people can well understand that.

- **Commissions**-Commission model in the revenue stream in which a user has to pay for every transaction. When the user pays the dealer, the market indicates a percentage or predetermined cost for the services (Staub et al., 2021). The display place may indicate either the dealer or the consumer. Another aspect is considering a commission from equally the two elements. This market revenue structure is the most generic as the fee is reasonable. The stakeholders may function for pay and free while they achieved some worth from using the site. Along with that the businesses also gain revenue from every conversion. This revenue structure helps to attract more investors, and from every transaction, money can be generated (Staub et al., 2021). This system is adopted by several leading industries. Commission structure can get VANtech and associates to get desired value or money to lead the evolution program in the First Nation regions.
- **Grants**- This system characteristically earns from the government, general people, and non-government organisations (Kerlin&Pollak., 2018). Money can be collected from the general people of Canada or the government by describing to them the need for the development program. The First Nation people are very sufferers. They lived in poverty and suffering from severe health issues with the poor economical

condition. On the other hand, the mainstream of Canada is very developed with a high-class educational system and business practices (Kerlin & Pollak, 2018). The grown people can be convinced to contribute to the development program so that the whole country can develop equally. For this, short plays or advertisements can be organised to make people aware of the condition of the First Nation people and ask them to help in this mission. Other leading multi-national companies can also be invited with the help of promotion so that with their contribution the mission can be driven more efficiently. The involvement of multi-national company also widens the future scopes for the First Nation people.

Recommendations

The role of the internet is to provide valuable information regarding the world and also to connect people from different corners of the world (Chen et al., 2020). In today's world, one cannot stay without the internet because with the help of this technology one can access abundant information regarding education and to know about a particular subject. In the case of the healthcare sector and education sector, the internet plays an important role as it helps in providing various important information that cannot be accessed without the internet. In Canada, there is a community known as “First Nation” which is a group of indigenous people who are distinguished from “Inuit” and “Métis”. This group of people do not have access to proper internet service and also lack proper websites from where they can get complete information regarding healthcare, education, and so on (Chen et al., 2020). The Canadian government has worked to improve the network service of the First Nation community. Although it is important to improve the website's facility further so that they can live like other Canadian people. Currently, the community uses Piczo, Bebo, MyKnet, and Facebook but they need to have access to other important websites so that they can get enough

information related to healthcare and education. However, it has been seen that during 2018, the internet speed was improved a lot by the “Canadian Radio-television and Telecommunication Commission” or CRTC. but in the 21st century, it is important to have access to all kinds of websites and the internet speed must be improved so that they can access all types of information which they are lagging in. VANtech aims to improve the communication process of the First Nation community by developing various websites for them and by strengthening their digital presence (Chen et al., 2020). This is a crucial step undertaken by the new start-up company. Although various aspects need to be improved for better communication and to improve it for the future generation. For this isolated group of people who have limited access to websites hence it is important to improve the connectivity of the people. With the help of these recommendations, VANtech can improve the connectivity and can upgrade the websites which are used by the First Nation communities. Also, these recommendations will help in improving the connectivity while improving the communication process (Power et al., 2020).

- The Canadian government must implement various strategies so that racial discrimination can be eliminated among the First Nation communities. Due to racial discrimination, people of the communities are not able to develop themselves hence its is crucial to eliminate it which will help to embrace new changes in the community (Power et al., 2020).
- With the help of various interventions and programs, the First Nation communities must be taught the importance of education and information, and technology in their lives (Power et al., 2020). This will help them to understand the needs for education and technology.

- VANtech needs to give importance to the Canadian language as people of the particular community are not educated hence they cannot understand other languages (Darling-Hammond, 2017).
- The people are very backward therefore they might not trust the technology, therefore it is crucial to change their thoughts so that they can embrace the new developments in their community (Darling-Hammond, 2017).
- The various initiatives must be taken by the start-up company in order to improve their educational infrastructure and also healthcare infrastructure so that the First Nation community can see a drastic change in their communities (Darling-Hammond, 2017). The improvement in technology will also help to preserve their culture while at the same time proper development will be there in the community.
- The Canadian government also must take initiatives to resolve the issue of electricity and having access to broadband internet services (Clarke, Lindquist & Roy, 2017). This will help to develop the place and these people will be able to access the high-speed internet and electricity as well.
- The Canadian government also must install towers in the remote place where the First Nation communities live so that they can access the internet on their mobile phones as well (Clarke, Lindquist & Roy, 2017).
- As there is no electricity in that place, the government needs to establish MobiStation which is a solar-powered classroom, through which the children of the community can get sufficient education with the help of a projector and lots of offline educational content are developed by UNICEF (Clarke, Lindquist & Roy, 2017).
- VANtech, with the help of various websites, needs to improve communication among the people so that the First Nation communities can mix up with the rest of the world

(Jones, Jacklin& O'Connell, 2017). It is very crucial to improve the communication service of these people as it is necessary for their development.

- Digitalization is very crucial therefore the First Nation community must have the access to digitalization that will help them to connect to social media and can access various information of the world. With the help of proper digitalization, the First Nation communities will be able to improve their communication process and at the same time, they will be able to embrace the stove changes in their community (Jones, Jacklin& O'Connell, 2017).
- As people of these communities are not interested in participating decision-making process, education and training, elections, expansion of language and culture, and healthcare development, VANtech needs to ensure that they are actively participating in all these aspects, proper guidance must be provided to the people so that they can understand the importance of these aspects and they develop themselves for a standard living (Jones, Jacklin& O'Connell, 2017).
- These people must have access to proper information so that they can live a better life and to improve their standard of living, they must be educated and must have access to proper healthcare services (Asongu&Boateng, 2018). The Canadian government needs to take proper measures for the betterment of these people and VANtech with the help of various strategies needs to improve the communication process of these people. This would ensure that these people are educated and are advanced as well so that they can mix up with other communities in the world (Asongu&Boateng, 2018).

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