

Expanding Business Strategy to Native American Communities Using Experiential Learning

A. J. Otjen

Abstract—Native American communities are struggling with unemployment and depressed economies. A major cause is a lack of business knowledge, education, and cultural desire. And yet, in the history of the American West, Native Americans were considered the best traders and negotiators for everything from furs to weapons to buffalo. To improve these economies, there has been an effort to reintroduce that heritage to today's and tomorrow's generation of tribal members, such as Crow, Cheyenne, and Blackfeet. Professors at the College of Business Montana State University-Billings (MSUB) teach tribal students in Montana to create business plans. These plans have won national small business plan competitions. The teaching and advising method used at MSUB is uniquely successful as these business students are now five time national champions. This article reviews the environment and the method of learning to achieve a winning small business plan with Native American students. It discusses the five plans that became national champions. And it discusses the problems and solutions discovered in the process of achieving results. Students who participated in this endeavor have graduated and become CPAs, MBAs, and gainfully employed in their chosen professions. They have also worked to improve the economies of their native lands and homes. By educating members of these communities with business strategy and plan development, they are better able to impact their own economies.

Keywords—Entrepreneurship, Native Americans economies, small businesses.

I. INTRODUCTION

BUSINESS strategy education is essential to the Native American communities. Unemployment rates for tribes such as the Crow and the Northern Cheyenne in eastern Montana are as high as 80%. Coal deposits under the eastern portion of the reservations remained untapped until one mine opened for operations to provide royalty income and employment to tribal members. The Crow operate only a small portion of their irrigated or dry farm acreage and about 30 % of their grazing land. They maintain a buffalo herd of 300 head [1]. But, small business and enterprise is lacking, leading to unsustainable economic growth. To improve upon this situation, tribal students attending Montana State University in Billings (MSUB) are learning to create, write and present small business plans for their reservations. Between 2007 and 2014, these plans have won national competitions at the American Indian Business Leaders small business competition held annually for Universities across the United States.

The students at MSUB take advantage of applied or experiential learning techniques to conceive and complete

their plans. In this way they take ownership and experience the complex and emotional phases of starting a business. Applied learning provides for new learning attributes into the knowledge-acquisition cycle [2]; by providing a real experience for the students to interact with the concept of enterprise. Also, these student's experiences provide synergistic learning requirements [3] by using all types of disciplines in the process. A learning-by-doing program enriches the student experience and enhances their entrepreneurial skills and knowledge.

The experience also helps them cope with emotions such as fear of failure and the ability to deal with uncertainty that are important in entrepreneurial efforts that classroom teaching does not address [4]. There are behaviors that students can observe by doing to reinforce their learning. These include exploring new opportunities, taking risks, commitment to work, applying intelligence and determination [5].

Most pedagogy is centered on academic development [6], [7]. Actually writing business plans and experiential projects are a powerful tool in making learning environments meaningful [8]. The small business plan experiential projects provided here are also done in a competitive environment that forces them to present their analysis using critical thinking and problem-solving skills. Providing an unstructured and active environment allow for a more creative learning process to take place [9], [10].

Hopkinson and Hogg [11], during a study of qualitative experiential learning at Lancaster University students, found that lectures became significant to students once they included experience. The students were surprised at the difficulties they experienced.

The knowledge and skills required developing the financial, operations, and market aspects of the business plan also increased the confidence needed to learn new ways to address problems. Developing skills in time management, planning, teamwork and presentations help students to understand the difficulties they will find with creating their new business venture.

This article reviews five small business plans that won the national championship at the American Indian Business Leaders annual conference of business colleges. Knuckle Busters is a plan for a hand salve made from the bees wax harvested from bee keepers on the Crow Reservation. Dream Catchers is an authentic eco-tourist resort at the base of the Prior Mountains, on the Crow Reservations. Translations are T-shirts that translate common words from different tribal languages into English, all produced on the Cheyenne Reservation. Bighorn Camp Grounds is a Recreational Vehicle

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(RV) park next to Bighorn River and Dam. Dance of the Sun is an art gallery located at the Little Bighorn National Monument, providing for international sales of Native American fine art, while passing on skills and talent to area youths.

II. TEACHING STUDENTS BUSINESS STRATEGY

In order to help students develop a business idea and execute the plan, several criteria were established as milestones for creating and developing their business concepts. First, the product or service idea must benefit the geographic area and local tribes, and support and extend their traditions. Second, there must be a clear indication that the market for their product is identifiable and sustainable. Third, their product must offer a unique value to a specific target audience. Fourth, they must plan their operations to make sure their product can be produced in a way that is cost efficient and profitable. Last, they must complete a financial analysis based on their quantitative forecasts of sales, monitoring income and cash flow over time.

A. Criteria 1: Benefit and Expand the Culture

Each award winning plan focused on issues including overcoming unemployment rates to extending their own culture to others throughout the country and the world. With the unemployment rate on the many reservations, including the Northern Cheyenne Reservation as an example, hovering around 75%, a great number of capable workers are unable to secure employment simply because the opportunities do not exist. Some of these individuals leave the reservation with the hope of attaining employment in the nearby towns, but struggle due to their inadequate work experience. A good example of addressing both these issues is Translations, the t-shirt manufacturing business.

Translations were located on the Cheyenne Reservation in order to offer manufacturing, production and general work experience for aspiring tribal members. Also, Translations understood that most Americans think of American Indian culture in singular terms combining the entire race into one ideal with one culture. They are not aware that there are actually 561 federally recognized tribes, most of which have drastically different languages, beliefs and values. Popular culture has a substantial impact on the perception of society as a whole and one of the most visual depictions of this can be witnessed through the influence of apparel; more specifically, t-shirts. The key concept behind our T-shirts is to stylishly showcase the rich differences that exist among American Indian tribes.

The goal was to increase awareness and raise interest in the American Indian culture. Unlike other authentic American Indian apparel companies that marketed their products to the American Indian population, Translations focused on marketing the American Indian culture to Non-American Indians from a unique perspective that could only be offered by enrolled tribal members. This was done by producing American Indian t-shirts that celebrated the diversity found throughout tribes. T-shirts initially featured words and phrases

written in various American Indian languages on the front of the T-shirts, and English pronunciations accompanied by translations on the back of the shirts. For example:

- Good Day Pevee'seeva
- Feeling Good Nap'evomohtahe
- See you soon Nesta'evah'osevooamatse
- This shirt fits me N'ataa'ovo'estse'he
- Peace, No war Wowahawa Wakte Ku

The second phase product lines featured influential American Indian leaders from various tribes. The front of the t-shirt featured an illustration of the leader and their contribution was detailed on the back of the t-shirt. These leaders included Crazy Horse: (*Thašųjka Witko*, literally "His-Horse-is-Crazy") Lakota who fought against the U.S. federal government to preserve his tribe's traditions and values; Cochise: Apache leader who resisted intrusions by the Americans during the 19th century; Geronimo: Apache who fought against Mexico and the U.S. and their expansion into Apache tribal lands for several decades; and Red Cloud: a war leader of the Oglala Lakota Sioux. One of the most capable Native American opponents the United States Army ever faced. Another example of expanding the culture was with Dream Catchers, LLC. Before the Trail of Tears, Lewis & Clark, and the sail of Columbus, the North American Continent was populated by a robust culture of more than ten million American Indians. They inhabited every region of the continent and constituted hundreds of different tribes. They respected a balance of nature and mother Earth took care of them. The American Buffalo were the lords of the prairie and an essential component to the heritage of the American Indians. Bison provided not only food, clothing, and shelter but nearly every material needed. Because the Indians of the plains depended so much on the bison for their existence, their religions were centered on the buffalo.

Dream Catchers, LLC recognized an opportunity to enrich and preserve the American Indian culture, by providing a place where people could recapture the true Native American Experience- when there was an estimated 25-70 million bison roaming in North America. Dream Catchers, LLC provided a place of education, spiritual wellness, organic mindfulness, and enjoyment. The concept was similar to a cowboy's dude ranch where people experience the cowboy way of life. But instead, it provided the most authentic, educational Native American Experience in the world. It had a low environmental impact, in an industry known as eco-tourism. The land was shared with the community of plants and animals.

As a third example of benefiting the area and expanding the culture, Knuckle Busters hand salve showed that throughout history, humans used their hands. Native Americans have used their hands to hunt buffalo, fish, build teepees, perform spiritual ceremonies, and other daily tasks, often in extreme environments. Presently, humans still use their hands in extreme environments. Construction workers, carpenters, automotive and diesel mechanics, farmers, ranchers, and welders, are all important industries that are considered to be hands on jobs.

Knuckle Busters highlighted the Native American's dedication to hard work, by presenting a product made from natural ingredients and made on reservations in Montana. It provided an organic method considered to be earth friendly and helped the economy of not just one but all reservations. The product took advantage of bee colonies located on the Crow and Northern Cheyenne Reservations. There are 100 bee colonies with 6,000 bees in each colony. By working with bee keepers and growing throughout the intermountain region, employment would increase on both reservations. And, honeybees are becoming more reliant on beekeepers because they protect them from diseases that infect the queen which come from two separate mites, tracheal and varroa.

B. Criteria 2: Identifiable and Sustainable Market

Once the students have developed their idea that benefits or expands their culture, they focus much of their time and learning on industry analysis including determining their best target audience within the industry, as well as the number of competitors for their target audience. Knuckle Busters, as an example, analyzed the national lotion industry, to be estimated as \$350 million or about 44 million buyers. The biggest share of the market was held by private labels with \$84 million annual revenues, and the largest brand shares belong to Jergens, Aveeno, and Gold Bond [12]. But to understand the potential of their brand, the students had to determine their niche market that would most benefit from the soothing qualities of beeswax. They decided on the blue collar working male in arid climates. These buyers shopped at farm and ranch supply retailers or hardware stores. Arid climates are where dry hands and cracked knuckles are most likely to occur with workers in extreme environments. There were seven strong competitors also targeted towards the blue collar male. The task of the student was to then quantify their potential sales based on their analysis. For Knuckle Busters, the calculation for share of the market is as follows:

- 1) One in four men uses some sort of facial skin-care product, whether it is facial wash, moisturizer, lip balm or eye cream, according to market research firm NPD Group [13].
- 2) The size of the Billings Market for Blue Collar workers, according to the bureau of labor statistics was $8,072 \div 4 = 2,018$ "manly" lotion customers who work in these industries [14].
- 3) $2,018 \div 7$ competitors = 288 "manly" lotion customers who work in these industries in Billings.
- 4) The size of the entire Intermountain West market for outdoor occupations was: $325,170 \div 4 = 81,293$ "manly" lotion customers who work in these industries [14].
- 5) The fair share of the Intermountain West market would thus be: $81,293 \div 7 \approx 11,613$ "manly" lotion customers who work in these industries or .0003 % of the national market.

Many of the plans focused on the demand by Americans and Europeans for products associated with the Native American culture. American Indian culture is held in high regard in the more densely populated metropolitan regions of

the U.S. and the EU [15]. Translations took this information and analyzed the clothing industry. They found that 62% of Americans own more than ten T-shirts or approximately 1.5 billion T-shirts in closets across the country. If stacked together this T-shirt pile would measure 852,273 miles, circling the globe thirty-four times, or cover 323 square miles. With an annual increase in demand ranging from 7% to 8.9% over the past ten years, the potential for success in this industry was outstanding for a company that incorporates a unique and trendy approach [16]. T-shirts are often more than just apparel. Various brands and styles offered by the market can signify the personal, social and cultural characteristics of their respective consumers. T-shirts are owned by 95% of the American population and 70% of men and 54% of women own more than ten T-shirts. Generationally, 79% of 18-24 year olds have more than ten T-shirts and 19% own thirty or more T-shirts [16]. In fact, many Americans have associated a level of sentimental value with the T-shirts in their closets. Ninety-seven percent of those surveyed have a favorite T-shirt that they would never part with. One hundred percent of 18-24 year olds and even 92% of 55-64 year olds stated they had a favorite they would never give away. According to the U.S. Census Bureau, there are approximately 25 million young adults between the ages of 18 and 24. The U.S. Department of Labor Statistics reports the average income of this demographic is \$28,258 a year of which \$1,523 is spent on apparel [17]. Translations found that the world trade in T-shirts had been growing at a healthy pace in recent years. Over the four prior years to 2006, global imports rose at an annual average rate of 14%, reaching \$26 billion. In terms of geographical region, the largest market for T-shirts is the EU. In 2006 the EU imported \$9 billion worth of T-shirts, or more than one-third of global imports. The second largest market for T-shirts is the U.S. In 2006 the country imported approximately 17% of world imports, or \$4.4 billion worth. These two regions together took more than half of global imports of T-shirts during that year. The remainder was spread over a number of countries, led by Japan and followed by Hong Kong, Canada, Australia and South Korea [16]. Industry sources from Business Dunn & Bradstreet estimated that approximately 1.4 billion cotton T-shirts were sold in North America annually with a retail value of about \$20 billion. Sales of imprinted T-shirts at the wholesale level were about \$6.1 billion in 1997 and grew at an annual rate of approximately 4% to 5%. Today that number has increased from 7% to 8% [16]. Translations' primary market was 18-24 year old Non-American Indian demographic residing in urban and metropolitan areas. The students determined their shirts would sell well in two successful novelty outlets that catered to the 18-24 year old demographic and were located in malls across the country: Spencer's and Hot Topic, including their websites. The students estimated the size of their market based on sales per store.

- 1) Production capacity at the Cheyenne Reservation is 375,000 T-shirts per year.

- 2) There are 1,340 combined retail distributors (Spencer's & Hot Topic) or 280 T-shirts provided to each outlet per year
- 3) 280 T-shirts provided to each outlet first production year times 52 weeks available on shelf =4.3 Average number of T-shirts needed to be sold per store per week.
- 4) 4.3 Avg. number of T-shirts needed to be sold per store per week times \$20 equals \$16,188 average revenue per store per week.

To further illustrate the importance of industry analysis, Dream catchers and Bighorn Campgrounds both did a thorough analysis of the tourism industry. Tourism is now the largest industry in the world, and one of the fastest growing. Two billion tourists worldwide spend trillions of dollars every year in the places they visit. In 2006, 846 million international tourists generated \$7,345,654,563 in tourism receipts [18]. In the United States, domestic travel combined with international tourism is a \$1.3 trillion industry, with a direct payroll of \$162 billion representing 1 out of 8 jobs according to Travel Industry Association of America [19]. Montana had 10.5 million nonresidents visit the state in 2010, spending \$2.48 billion. Yellowstone and Glacier Parks are the most visited sites, overall. A survey indicated fishing, wildlife watching, hiking and shopping as primary Montana tourist activities [20]. These students also focused on the demand for Native American products and experiences. The American Indian Tourism Association noted the growing interest in Aboriginal culture worldwide, looking for more than gaming venues in which to spend their money. Their study found that slightly more than half the respondents visited a casino but 48% of visitors to a Native community dined at a Native American restaurant and 37% purchased authentic arts and crafts. 22% toured a museum and 20% attended a powwow. Not only does this information help quantify the size of their market; it helps them to create specific services at their resorts [20]. Dream Catchers was a more an eco-tourism oriented resort compared to Bighorn Campground, asking visitors to experience the actual life and culture of Native Americans in history. They would live in Tepees, and cook their own authentic food. The World Tourism Organization estimates that 'nature tourism' accounts for 20% of all international travel. It is the fastest growing sector at 10 – 30% growth overall [18]. This tourism is defined as viewing wildlife in an atmosphere that is more natural than the run of the mill ride on a jeep or the back of an elephant. Eco-tourists paid \$1200 more than the average tourist back in 2000 according to Trails.com. Currently, resorts are trying to establish a Green Star System or accreditation system to improve sustainability. It must be "low impact, education, ecologically and culturally sensitive that benefits local and host communities" [21]. Demographics interested in nature tourism, according to a study by the US Small Farm Center:

- 1) 27% are 44 years or younger, 23% are between 45 and 54
- 2) 20% are 55 to 64 and 30% were 65 and older.
- 3) 56% were male.

- 4) Upper income \$75,000 and more educated, college and beyond were more representative,
- 5) 40% and 67% respectively
- 6) 78% were European descent
- 7) 79% were urban suburban

Though Dream Catchers are targeted on the week long natural tourist, the Bighorn Camp Ground was developed for the overnight campers. Approximately 179 million total camper nights were generated in the United States Last annually. About 101 million of those nights were spent in private campgrounds. One in 10 mentions revealed that campers mentioned Florida, Montana, Wyoming, Oregon, California, and Washington. Bighorn Campground was on 40 acres of land in Montana [22].

According to Campgrounds of America (COA), at least 63% of campers utilize campgrounds on the way to the destination, and 17% are used for the destination for their vacations. This makes the location essential to the product description. KOA also describes the largest targets as baby boomers, families with children under the age of 18, Caucasian families with an average age of 37 with an income greater than but not limited to \$50,000 [23].

RV survey respondents cited desires to enjoy nature (66%), travel anytime and anywhere at their own pace (57%), escape stress (54%), and spend quality time with family (51%) as other top reasons for using their RVs more this spring/summer. RV owners plan to use their RVs an average of 40 days including nine weekends in spring/summer, according to the survey. In addition, those surveyed plan to log approximately 2,900 miles and visit an average of five states and nine campgrounds this season [22].

Camping is the overwhelming favorite activity of RV's, according to 88% of respondents under the age of 55, the largest and fastest-growing segment of the market. Approximately 8% of vehicle-owning households also own an RV. The highest RV ownership rates were among Baby Boomers (ages 55-64). Factory deliveries of RVs in 2005 were higher than at any time in the past 25 years. Based on this information, the students profiled specific camper customers. They found that seventy five million U.S. Baby Boomers are set to retire and enjoy their retirement years, making the RV and the camping industry very promising. According to the latest "Campfire Canvass" survey by Recreation Vehicle Industry Association (RVIA), three-fourths of RV owners expect to travel more this spring/summer than they did last year. Almost a quarter (23%) says they will travel the same amount as last year, whereas only 2% plan to travel less. [22]

TABLE I
MEANS END CHAIN FOR BIG HORN CAMPGROUND

Attribute	Consequences	Values
Teepees, river access, activities, Bighorn River being nationally recognized as one of the premiere trout streams in the United States for anglers	Authenticity, tours semi-convenience, backcountry, and health Cultured, experience unmatched by other campgrounds, and a relaxing atmosphere	A once in a lifetime experience and self-satisfaction of experiencing the real thing.

Similar to the data found for Dream Catchers, fishing was the most popular physical activity on a camping trip, followed closely by swimming and hiking. Twenty-eight percent of campers camp as part of a group outing. Thirty-nine percent of camper's camp with pets, and 93% of these pets are dogs. More than half of all campers have taken a trip for the primary purpose of participating in an activity such as fishing, snow skiing, or rock climbing. Two-thirds of RV owners plan to go camping more often as they get older [22].

Demand for RVs will continue to grow during the next decade, due to favorable population trends and purchase intentions. The following statistics are reported by rvia.org. By 2010, RVs will be owned by 8.5 million households, an 8% increase, outpacing overall U.S. household growth of 6%. The enormous baby boomer generation is reaching retirement age and is expected to continue dominating the RV market, the study forecasts [22].

"Overall, there is a strong and enduring appeal to the RV lifestyle that is as valid today as it was twenty years ago. The latest survey data only adds support to an optimistic forecast of RV sales and future ownership growth." U.S. ownership of recreation vehicles has reached record levels, reveals a newly released study by the University of Michigan's Survey Research Center. Today nearly 8 million U.S. households own at least one RV, a 15 % increase over the past four years and a stunning 58% rise since 1980, according to the study. One in twelve U.S. vehicle-owning households now own at least one RV [22].

The two tourist business plans did not compete against each other as they were aimed at different segments. The RV camper is different than the eco-tourist. Weaver and Lawton's [21] study in Australia clustered natural tourists into three segments of harder, structured and softer. Bighorn Campground appealed to the structured segment preferring to have more facilities for meals and overnight stays.

Dream Catchers targets the harder tourists as they favor the teepees, nature based learning, a preference for undisturbed destinations, less service, and a willingness to experience hardship which the Structured and Softer Targets are not. Self-discovery, being physically active and having new experiences motive these tourists. Both targets value rest and relaxation. The most favorite activities are national park visits, hiking and wildlife viewing. Harder tourists are younger than structured tourists and are more likely to have attained a university degree and are more liberal.

The students were also able to find information on the best way to market their resorts. The Harder segment is motivated most by environmental clubs and organizations where structured target audience is motivated by media and travel agents. Though brochures and word of mouth are important for both, the students were able to develop distinct marketing efforts for the different resorts.

The Bighorn River is considered to be one of the finest trout streams not just in Montana but the lower forty-eight states. Unlike many rivers in Montana, the Bighorn is a high quality fly fishing river for the entire year, offering anglers who do

not mind the elements the opportunity to catch large fish in the middle of the winter. Also, Fort Smith has the Bighorn Canyon National Recreation Area. It has breath-taking scenery, countless varieties of wildlife, and abundant recreational activities, such as boating, fishing, ice fishing, camping, and hiking. Bighorn offers visitors what few other National Park areas can, that of solitude, serenity, and beauty. One of the best assets of location is the Crow Indian Reservation also known as The Teepee Capitol of the world which offers visitors a chance to view the biggest encampment of American Indians that replicates the most authentic experience anyone could imagine.

Schools	Inspiration
	Translations
Pop Culture	Native Culture
Music	REZ Dog
	Adoration

Fig. 1 Map of the Values for Translations T-shirts

Bighorn River American Indian Campground was the only authentic Native American resort with full RV hookups and Teepee camping in the Bighorn River Area on the Crow Reservation. The only direct camping resort competition is the 7th Ranch RV camp in close vicinity to the Crow Reservation. There was competition with another 27 campgrounds along interstate 90 in the Montana area and the 32 campgrounds along interstate 90 in the Wyoming area where campers could use their facilities for camping. Within Southern Montana and Northern Wyoming, about 50 campgrounds with similar RV hookups already exist, and see the competitive grid that follows.

- 1) 8 campgrounds within the Bighorn County
- 2) 9 campgrounds in Sheridan Wyoming area
- 3) 27 campgrounds along Interstate 90 in the Montana area
- 4) 32 campgrounds along Interstate 90 in the Wyoming area
- 5) Other campgrounds exist around the area of Mount Rushmore

C. Criteria 4: Operations Plan for Profitability

Translations developed a process to produce 375,000 T-shirts produced first production year. Two Machines running 12 hours a day, 5 days a week with a 5% internal failure rate and 5% down time has the capacity to make 650,000 shirts per year using the ink sublimation process. Sublimation is a process using heat to transfer (embed) ink into a fabric surface such as a shirt. The alternative method of creating shirt designs is called silk-screening; a process in which a screen is made with an image and that image is transferred onto a shirt. The main disadvantage with this method is that silk-screening applies a thin layer of ink to the surface of the shirt inhibiting breathability. The sublimation process avoids this problem since the ink is not coating the fabric's surface, but rather, is embedded in the fabric. This technology creates an image durable enough to withstand thousands of washings.

The first phase of production consisted of twenty translations, five each from the Crow, Cheyenne, Lakota (Sioux) and Apache tribes. Each phrase was designed to appeal to the targeted demographic and the graphic design reflected that goal. Examples of the five phrases were: Have a nice day, Peace, Vote, and What Up? these words and phrases were displayed on the front of the t-shirts in each of the four languages and had English pronunciations accompanied with their respective translations. The second phase of production was comprised of ten historical American Indian leaders. The imprints were applied on the front of the shirts and featured depictions of leaders Cochise, Crazy Horse, Geronimo, Red Cloud, Dull Knife, Quanah Parker, Sitting Bull, Tecumseh, Sacagawea, and Chief Joseph. On the back of the shirt is a description of the contribution the leader made to his culture and the United States.

The third phase of production featured ten styles of traditional regalia from various tribes. The graphic representations were stylistically designed to address the aesthetic preferences represented by current trends in apparel. The regalia included the following: squash blossoms, breast plates, beaded medallion, bear claws, medicine bag, and beaded vest. On the back of the shirts is a description of the symbolic nature and tradition associated with the attire.

Translations manufacturing was in the Northern Cheyenne Reservation located in the Southeastern part of Montana with has approximately 9,496 enrolled tribal members, about 4,135 reside there. The majority of the reservation population lives within five distinct community areas Ashland, Birney, Busby, Lane Deer, and Muddy Creek. The largest population center is Lane Deer with approximately 2,900 people.

Knuckle Busters production was located in the town of Pryor as it provided a convenient access for shipping and delivery of the product as well as an appropriate entry and exit for suppliers.

The hand salve process has three separate tasks. One task was to use a solar wax melter to melt and purify beeswax. Another task was to add the ingredients to our molding, filling, injection, and packing machines. Other important tasks

required employees to test, store, package, ship, and deliver our product. Cleaning equipment and the facility was required after each day. Each batch of production was 12,000 units. The first year's infrastructure produced 300 a day over 40 days using the following supplies.

- 1) There are 12,000 units times 3 ounces each or 36,000 ounces.
- 2) There are 36,000 ounces divide by 3 ingredients or 12,000 ounces for each ingredient.
- 3) 12,000 ounces/16 is 750 pounds of bees wax as an example.
- 4) One colony of bees to make 30 pounds of beeswax.
- 5) There are 40,000 bees in a colony.
- 6) Beeswax is only harvested twice in the summer months, in Montana.
- 7) Four batches a year needs 3000 pounds of beeswax harvested in the summer, or 1500 pounds per harvesting.
- 8) 1500 divided by 30 pounds is 50 hives.
- 9) There are up to 100,000 bees in a hive.
- 10) It requires 20 acres of wild flowers, wheat, weeds, and other Montana foliage for a hive to be productive, making the reservations a wonderful home for professional bee keepers.

The Beekeepers are located in Busby and Crow Agency, MT. Cocoa Butter was shipped from Bulk Apothecary, located in Streetsboro, Ohio. The almond oil was processed and shipped from local almond farmers located in Riverbank, California. The finished products were stored in separate rooms that also do not exceed 80 degrees Fahrenheit with an average value in inventory supplies is about \$14,000. The average value of finished product in inventory was about \$60,000.

D. Criteria 5: Financial Analysis and Feasibility

The students used the following criteria to decide if they would undertake their new business venture:

- 1) Undiscounted Payback
- 2) Net Present Value (RRR)
- 3) Internal Rate of Return (IRR)
- 4) Modified Internal Rate of Return (MIRR)
- 5) Discounted Payback
- 6) Net Present Value (WACC)

Undiscounted payback calculates the length of time it takes to recover the initial investment of all the parties involved. However, the undiscounted payback does not consider the cost of capital. This problem is somewhat solved by the discounted payback, where the expected cash flows are discounted by the cost of capital.

The net present value (NPV) discounts the cash flows back to the present and subtracts the initial investment. It is a good indicator of the current value of the business, and if it is positive, it is a signal that the business is generating more cash than is needed to service the debt. Calculating the NPV using the required rate of return (RRR) is ambitious as it is usually larger than a weighted average cost of capital (WACC) as it is a better indicator of sustainability.

The internal and modified internal rates of return are discount rates that result by adjusting the calculation of the NPV to a value of zero. Both indicate similar conclusions; however, the modified internal rate of return takes into consideration the idea that the funds could be reinvested into another security earning the same amount of cash. If these returns are positive, the business is worth undertaking.

To calculate the required rate of return, the students use the risk-free rate (e.g., rate on a treasury bill) plus a risk premium (e.g., the market rate minus the risk-free rate). The risk-free rate of 5% added to the risk premium of 20% gives the required rate of return of 25%. To provide a better understanding of the financial analysis, the cash flows are extrapolated out to 10 years. Dances of the Sun, LLC had balance sheet showing a net profit of \$1,034,240 at the end of year one. Most importantly, the cash flow statements showed ending cash position of \$5,073,139 after 10 years. Not only did this increased cash flow allow for business expansion and improvement, it also opens the doors to the many ways that Dance of the Sun could be the leader in Native American art and cultural education as well as a catalyst for change within the community. Many doors which were once closed due to lack of funds could be opened and the possibilities discovered. Start-up costs were a key indicator of the initial investment by the students. The initial startup costs for Knuckle Busters was \$49,249. The other plans had much higher start-up costs. Payback was thus an important calculation for return on investment. Bighorn Campground provided a base case showing the payback would take less than 2 years, meaning it would recover the initial cost of the venture within the first 2 years. This was good indication that Bighorn River Campground was a positive venture. Even when discounting the cash flows at a WACC rate of 14.39% and an RRR of 25%, the positive numbers are an indication of adequate future cash flows. This case included construction of a building, ten teepees, and 40 RV hookups, for initial startup cost totals \$670,195. Inclusion of an SBA loan covered the purchase of land and building and guaranteed a fixed rate of 10.75% on the total loan amount. Amortization of the loan was over a 25-year period.

Dance of the Sun, LLC planned for eight expenses financed with cash before the gallery doors opened and business commenced. They included: 1) financial and business advising 2) the financing portion of the soft costs association with the land purchase and building construction; 3) the initial installation of security by Kenco Security for the purpose of asset protection; 4) the purchase of gallery collection management software in order to catalog all artwork coming in prior to the start of business; 5) initial website development for immediate web advertising and sales; 6) the cost to transfer public utilities to our name with an initial set-up charge; 7) the state filing fee charged when submitting an application to register as a limited liability company within the state of Montana; and 8) local and Tribal licensing fees. These separate amounts totaled \$61,051. Start-up assets included both the cash required to cover the 35% equity required to

obtain the full amount of the Montana Department of Environmental Quality and the Business and Industry [24] Guaranteed loans needed for the purchase of the building and cost of complete construction work as well as all long-term assets. A loan of \$717,000 to cover the cost of building an art gallery up to the standard of the U.S. Green Building Council is needed, so 25% was needed for equity is \$179,250.

Star-up cost financing opportunities existed for Native American ventures. Dance of the Sun, LLC, as a cooperative with a primarily rural membership of both local businesses and individuals was eligible for the Rural Business Opportunity Grant (RBOG) through the United States Department of Agriculture Rural Development Department. The RBOG program provides training and technical assistance to promote sustainable economic development for business and entrepreneurial development. The project was also eligible for funding from Developing Trade Strategies (DTS) with local, national, and international business contacts and opportunities, technology-based economic development planning and training. DTS companies have received the maximum amount of \$50,000 for a business serving a single state. The Montana Department of Commerce, through the Montana Indian Equity Fund, would grant \$7,000 to assist in the purchase of assets including furnishing, equipment and technology as well as for the use as working capital for business operations. The art gallery and cooperative qualified for this grant as the business owner was an enrolled member of Montana's federally recognized Northern Cheyenne tribe.

Assumptions including forecasted sales based on market analysis provide sources of revenues. For example with Knuckle Busters, sales estimates were based on taking the fair share of the salve market, specifically targeted to outdoor workers in arid climates. Gross income in the first year was \$240,000. Cost of goods sold was \$56,760.

III. STUDENT LEARNING

The plans required a significant amount of marketing research, understanding of financial feasibility, clearly developed operations, and an overall risk assessment by the students. Developing these plans was learning through experience, enabling students to realize they can start businesses and change the economic outcome of their communities. Experience as the key component in the learning process has been proffered as early as Plato with "compulsory learning never sticks to the mind...let lessons take the form of play: (427-347 BC). Studies suggest that experiential learning works as it increases student involvement, encourages thinking and leads to better test scores [25]-[27]. Titus and Petroschius [28] say that "discovery techniques such as real world class projects have been shown to offer numerous advantages over other expository approaches such as lectures and objective exams" (p.20). Experiential learning techniques offer students the opportunity to apply the concepts and theories they have learned to "real-life" situations. In applying their classroom based knowledge, students practice skills in

planning, problem-solving, decision-making and written and oral communication.

TABLE II
STUDENT LEARNING

Criteria	Learning	Significance
Benefit and Expand the Culture	Social Responsibility	Determines the reality of the situation
Sustainable Market	Research, Critical Thinking	Decides to move forward with concepts
Unique Product	Creating value and competitive analysis	Affects choices for product development
Plan to operate with profit	Time Management, Project Planning, Human Resources	Determines costs versus capacity and sales
Feasible and Sustainable	Financial Analysis, Financing Alternatives, Industry Indexes	Determines if the business is a good investment

In the case of these business plans, half of the points awarded in the competition were based on the presentation to business industry judges. Many of these students had never heard the sound of their voice speaking in a classroom. To present well, they had to practice speaking in a microphone to a large room. They had to practice not reading the words on a power-point presentation but to point out the most interesting concepts. And they had to be able to answer detailed questions to prove they knew the material. Table II is a summary of student outcomes for the project. Our approach to teaching business strategy to the Native American community is similar to the idea of learning-by-doing as discussed by [29]. Her three main areas of contribution were aimed more towards Social Entrepreneurship where ours are based more on Economic Entrepreneurship. Chang's and ours are to (1) give insight into how business strategy education is learned more effectively with real world projects; (2) use business disciplines to show how they work together to create a business; and (3) provide an example on which university professors can teach required skills and competences of an entrepreneur.

IV. CONCLUSION

Overall, these business plans delivered many unique experiences and provided pedagogy that is now being repeated at MSU Billings. Most students cited this project on their resumes as they entered the market plans for employment. The ability for aboriginal communities to develop strategies for business that are both sustainable with profitability but also benefiting their cultures is critical for the growth and expansion of their homes and families. This type of pedagogy of experience has shown that these communities want and can succeed economically without giving up their history and freedoms.

ACKNOWLEDGMENT

Thank you to the student members of American Indian Business Leaders at Montana State University-Billings.

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