UBC Social, Ecological Economic Development Studies (SEEDS) Student Report

International Field Course in Sustainable Agriculture: Business Plan

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I. Executive Summary

a. Program Concept

The concept of the UBC Farm is to become a world-class facility that offers the resources to promote and practice sustainable agriculture.

b. Opportunity and Strategy

In addition to offering students the use of the farm for their own research interests, the goal of this project is to develop an international educational program for students during the summer months that will provide them with hands-on sustainable food production experience. There is a generally growing trend in agricultural production; however, food production in developing countries has not progressed at the same rate, partially due to the decrease in aid from the first world (Appendix XII, XIII, XIV). Inviting international students to the UBC Farm to study sustainable agriculture is therefore beneficial as they will have an opportunity to gain the knowledge and skills to promote and practice sustainable agriculture that they can apply in their own countries.

Since the 1970's, sustainable agriculture has been a growing concern. As the global depletion of natural resources becomes a more pressing issue, interest in a more sustainable way of life has gradually become a popular topic. "More than 90 percent of Canadians fear that over-consumption of the world's resources threatens the health and welfare of their children…" according to a survey done by James Hogan. (2006) The development of agricultural additives such as radiation, chemicals, and genetic modification used to increase productivity along with poor planning and marginal land use has lead to declining soil fertility and desertification, creating a need for sustainable agriculture worldwide. (MSU, 2006) Organic farming, as it is also called, is farming which does not involve the use of industrial chemicals but rather, uses nature's

cycles and products and “involves design and management procedures that work with natural processes to conserve all resources, minimize waste and environmental damage, while maintaining or improving farm profitability”. (McGill, 2006)

c. Target Market

Reached by way of promotional brochures, flyers, school recruitments and exhibitions, the main target customers are secondary and post secondary students from around the world with an interest in learning about farming and agriculture. The program provides a well-rounded introduction to sustainable agriculture at competitive prices.

d. Competitive advantage

The UBC Farm provides more than a sustainable farming program; its urban setting and distinctive climate provide a unique opportunity to learn how to adapt sustainability principles to a variety of climates. It also provides students the option of being linked with UBC and its educational opportunities.

e. Economics and Profitability

The program will show near future profits as it becomes economically successful in the subsequent years after the pilot program. The economic success will further contribute to the existing abundant academic resources available within the UBC farm and the faculty. The rising importance of sustainable agriculture and global interest is an important factor for the program’s financial success.

f. Future Opportunities

Separate from the pilot program and the six-week program instituted here, further development of the program will bring a more concrete contribution to the UBC farm, faculty

and university, both in terms of education and finances. Future Development of the program will involve a more comprehensive and completed curriculum.

II. Background of the Farm/Agricultural and Farm Industry

a. Background

Agroecology is an interdisciplinary study of ecological theory and agricultural systems that look at how these systems can be designed, managed and evaluated based on productivity and resource conservation. Agroecology has global importance as it can help us discover the best approach for sustainable agriculture in different geographic locations and climates. (Altieri, Berkley, 2005)

The UBC Farm is the only working farmland in UBC and in the city of Vancouver. Operating with the vision of being an integrated part of the academic facility, the farm provides a unique space for education, research, and community activities related to agriculture, botany and forestry.

Located in south end of the campus, the UBC farm is a student-driven initiative that, among other objectives, develops and promotes sustainable farming practices. On approximately 24 hectares of university land, the farm is stewarded by the Centre for Sustainable Food Systems until at least 2012. In order to maintain the current academic use of the site after this date, programs need to be developed that will further promote academics and education at UBC.

b. The Industry

There are a significant number of North American universities involved in sustainable agriculture, many with their own farms. Agricultural programs ranging from three-weeks to year-round accredited programs are offered and are a part of the curricula of the agricultural

departments at each of these universities. Summer programs are available to children, teenagers, college and university students as well as adults.

It is easy to promote sustainable agriculture. However, successful entry into the industry includes obtaining land, acquiring expertise and raising funds which is challenging. Farm courses offered through universities such as UC Santa Cruz and UC Davis that are around 20 years old, and Cornell, around 12 years, to name a few, have had sufficient time to develop profitable programs. The UBC Farm, only six years old, is located on expensive property that has alternate real estate uses that can be more profitable. Thus, there is an urgent need to accelerate the number of valuable programs offered at the Farm in order to justify maintaining it as an educational center instead of developing the land into housing facilities.

The most relevant industry suppliers are the landowners who have large supplier power. With the land prices increasing as a function of population growth, the use for land as real estate is becoming more crucial and thus a threat to farming. This is exactly what UBC Farms is facing as the land is on loan from the University and may be converted to housing if not proved to be educationally viable and financially profitable.

Buyers in this industry include incoming students. As such, prices have to be low in order to make the program more attractive and give them incentive to choose the UBC Farm over other programs at different universities.

The UBC Farm is working towards developing a program similar to that of UC Santa Cruz where the “sites are managed and serve as research, teaching, and training facilities for students, staff and faculty”. (UC Santa Cruz, 2006) The UBC Farm is still budding in the introductory stage of its life cycle. The farm can blossom into the growth stage with this international program.

III. Program Design and Development

a. General Program Description

UBC Farms will offer a new international summer program in agroecology. The six-week program will emphasize a hands-on practical learning experience to instill agroecological concepts. The program is divided into two parts that are carried through simultaneously. The first part is the actual subject matter being covered. The second part is a sustainability farm design contest.

b. Pilot Program and Regular Program

The pilot program is a smaller concept of the regular program. Being the first run of the program, it will be experimental in nature. Hence, the pilot will be offered at a reduced rate from the regular program. The size of the pilot will be limited to just under the capacity of the farm to ensure an absolute maximum learning opportunity for every student, faculty and staff member. The feedback on program content, format and logistics from the pilot is extremely important to the future improvement of this program. In addition, the pilot will not be operating under the full cost but will provide a better understanding and estimate of financial costs and program schedule that will facilitate the start of the regular program.

The regular program will run at the allowable capacity of the farm. Certain aspects of the program will be re-tooled depending on the feedback from the pilot program. This is to ensure that regular programs become more efficient at allocating expenditures and most of all, adjust to cater to student and global needs. Quality assurance of the program will be continuously collected, analyzed, and applied during the regular program.

c. Operation Details

- Admissions

Admission into the program is open year round and applications will be made available on the Farm's website, with quick links to the Department of Agriculture. Deadlines for admission will be the end of April. Applicants may submit applications on-line or by regular mail. There will be an application fee of $30 for processing.

Application packages will include the application form, personal resume, and a 500-word essay. The essay should cover the students' previous agricultural experience (if applicable because no experience is required), general interests, and diversity.

An admissions committee, consisting of members from the Farm, the FLFS, and those involved in the Farm community will evaluate admission applications for academic and social capabilities. International students will be briefly interviewed by telephone for English proficiency.

- Document Administration

Program administration and academic evaluation is conducted by the UBC Farm summer program team, who manages the academic operation, curriculum and teaching materials and student's academic works. The Global Partnerships Office in FLFS manages students' files of application, course records, certificates and rewards.

- Curriculum structure

Composed of two parts, the subject matter and the farm design competition, the curriculum consists of 80% hands-on practical experience and 20% classroom theory in a Canadian and international context. Trips of cultural and academic interest around the Greater Vancouver Area will be at the discretion of the faculty and may be subject to changes.

Week	Classroom Subject	Field Study/Trip/Experiment
1	Introduction to ecology and agro ecology	Orientation of UBC Farm
2	Population dynamics and regulation	Experiment 1: Energy measurement of agro ecosystem
3	Community， succession and ecosystem	Experiment 2: Matter measurement of agro ecosystem
4	Agro ecosystem structure	Experiment 3: Experiment of plant allelopathy
5	Sustainable development of agriculture	Contest project preparation
6	Sustainable agriculture project study	Design project presentations and evaluation

(Curriculum reference: Course list and description of agro ecology, UBC Calendar 2006/2007 http://www.students.ubc.ca/calendar/courses.cfm?code=AGRO "Agroecology", Bu Chen, China Agricultural University Publish, 2002)

Community synergy and diversity sharing will be highly encouraged and harvested through the students' involvement with the Farm's marketplace, gardens, trails, and other various activities.

Synthesizing the knowledge and experience gained during classes, students will be required to design their own sustainable agricultural projects. At the end of the program, each student will present their design in front of a panel of judges who will be selected members from the community and agricultural department. Criteria for judging the design projects will be at the discretion of judges and include creativity and feasibility of the project. Students will be notified of the criteria before hand.

There will be one project winner for every year. The reward will consist of a certification and discounts for attendance to other future UBC Farm programs. Recognition will also be posted on the Farm website. All design projects will be filed at the Farm.

d. Operation Location

The practical education will mostly be conducted on the Farm, including some theory teaching. For theory, classes will be conducted in classrooms with access to the internet and multimedia at FLFS. (Appendix XI)

e. Faculty

Faculty or sessionals will be recruited through the Farm and FLFS. They will be contracted per program. The faculty student ratio will be one faculty member per seven to ten students.

f. Ancillary English Program

Students who are interested in improving their English skills will be able to attend a conversational program with a light agricultural context for an additional cost. This program will be adjusted based on demand and provided as a supplement to the agroecological program. The class will meet twice a week in the evening for an hour. The program will be taught by volunteers from the community and promote cultural exchange through learning English.

g. Operation Outcome

The anticipated outcome of the program is to develop interactive agroecology education, promoting the idea of active learning, and enhancing UBC's international impact on sustainable agriculture education and UBC's notion of sustainable development.

IV. Program Logistics

a. Student Liaison

A student liaison will look after the students' non-academic needs. The liaison's responsibilities will include arranging transportation, making sure the students are settled in comfortably, keeping students informed and addressing any issues and needs the students may

have before and during the course of the program. The liaison will be selected from the Farm's large volunteer network. As the capacity of the program increases, compensation for the liaison can be instituted.

b. Visas

Visa applications will be handled by the students or their home-schools. However, an invitation letter or letter of acceptance into the program will be sent to the students in support of their visa application. The letter will be in UBC's standard format but mention a brief description of the Farm program and duration of the program.

c. Accommodation

Conveniently located on the UBC campus, accommodation at the Pacific Spirit Hostel will be provided. A few nights may be spent camping at the farm, but the primary residence for the students will be the hostel.

d. Food

All meals will be included in the program package. The meals will mainly consist of the vegetables and produce from the farm. There will also be two catered meals – a welcome and a farewell dinner catered by The Sage Bistro (a major consumer of the UBC Farm products).

e. Transportation

The program will arrange for transportation to and from the airport and the farm as well as for fieldtrips. To reduce costs and stay within the scope of the program, the Farm can rent a van or minibus on a per need basis. The administrative expenses will cover costs.

V. Market Research and Analysis

a. Target Customer Demography

The pilot program is designed to attract secondary and post secondary students who are interested in the field of ecological and sustainable agriculture. Ideally, the typical customer is between the ages of 16 and 25 and has a strong awareness for the environment, is enthusiastic about learning new cultures and languages, loves nature and the outdoors, is hard-working and has good interpersonal skills.

b. Target Geography

The farm has piloted summer internship programs involving international students from the USA, Japan and Mexico. The pilot program will continue to build on these existing relationships and primarily target students from these countries. To cut down on logistical issues for the pilot program target students will also be recruited from commonwealth countries such as Australia and England where visas are easily acquired to enter Canada. In addition, there is less economic risk in commonwealth countries. The fluctuation in currency does not dramatically affect students abilities to pay fees for the program, which has been an issue in the past when dealing with developing countries.

The post pilot program will target a much wider geographic scope. In addition to the countries from the pilot program, nations in South America and other developing countries such as China, where much of its population is still living in rural areas will also be targeted.

Due to the unreliability of primary research given the extensive target geography and the scope of this project, this marketing plan only utilizes secondary marketing research.

c. Competitors

As interest for sustainable farming continues to grow, so does the number of universities interested in providing courses related to this subject. The UBC Farm faces competition from institutes such as UC Santa Cruz and the Lost Valley Ranch which have well established programs on sustainable farming; these programs have been operating for several years and include credited courses. Although these programs represent competition, their primary target market is domestic, while the UBC Farm program will mainly target international students.

d. Competitive advantages

Having an ideal climate and location in urban Vancouver, as well as the closeness to the world class academic and research resources of UBC, the UBC Farm is a perfect place for interactive learning in sustainable agriculture, botany, forestry and environment. With Vancouver's convenient geographic connection both to the eastern and western hemispheres, the UBC Farm is an ideal place for students and professionals from all over the world to study, research and exchange.

VI. Marketing Plan

a. Marketing Strategy – "International thinking for local farming"

The primary marketing goals for the UBC Farm's International Field Program are:

1. To promote sustainable agriculture and education
2. To raise agriculture and agroecology awareness
3. To raise the international profile of UBC Farm
4. To make the program profitable for UBC Farm
5. To create a stronger bond between the UBC Farm and the rest of the University

The program's marketing campaign focuses on the motto "International thinking for local farming". The marketing channels will be divided into two categories: "seed" and "pollen" channels. The "seed" channels are considered the primary channels which will include:

1. Educational and professional exhibitions where potential customers, partner and rivals gather
2. Agriculture and farming journals and magazine advertisements
3. Developing a program website in order to have an affordable permanent information platform to communicate with international students that is linked to the main UBC Farms website.

The "pollen" channels mainly involve mass distribution of information at a more economical level than "seed" channels. Those secondary channels will include:

1. Emailing and mailing flyers and information packages to universities and high schools in the target countries since they provide the Farm with exposure to a large number of students at a significantly low cost as well as provide a larger window of time for advertising
2. Advertising in professional association newsletters to inform teachers and professionals who can suggest the program to their students.
3. Posting information on related internet forums to create awareness among internet communities interested in the topic.
4. PR exposure events can raise the international profile of UBC Farm and will include:

i. Providing fresh farm food for social functions such as the UBC and City gala events for local and foreign dignitaries. This provides a great opportunity to promote the UBC Farm and its products.

ii. Submitting research and development papers on farm activities to international publications.

As more students are required to make the post pilot program financially feasible, the marketing campaign will be more aggressive and both “seed” and “pollen” channels will be used. In conjunction with relationship based marketing, the pilot program will use “pollen” channels to comply with the smaller marketing budget.

b. Marketing Periods

The time line for a year round marketing plan is divided into three major periods, fall, winter and spring. The fall period, following the end of the summer program, will consist of reflecting on the experiences and highlighting achievements accomplished during the summer programs. The winter months will primarily focus on developing promotional material such as flyers, booklets and informational pamphlets for the following summer programs including new goals and opportunities within the program. The spring period will be focused towards participating in agricultural exhibitions, high school presentations and university information sessions. Information regarding the Farm’s participation at these activities will be available on the program website, internet forums and at the PR events. (Appendix XVII)

c. Advertising Angles

Flyers and booklets will promote:

1. The solid curriculum with hands-on and theoretical teachings on agroecology in a Canadian and international context

2. Low Teacher – Student Ratio

3. The bundled program that includes learning material accommodation and meals

4. A great way to learn about other cultures, meet new people and improve English language skills

5. Vancouver as one of world's top tourism destinations

6. An optional English course

7. A pilot program offered at a special discount rate to attract students

VII. Financial Plan

a. Financial Resources

Currently, the farm relies on funding from produce and plant sales, courses, workshops, tour fees, and various grants from sources such as UBC and VanCity. Because the Farm is breaking even with these existing resources, capital for the program must be raised elsewhere. The initial investment of $10,000 can be obtained through the following two options:

Option 1: Agriculture and Agri-Food Canada – This is a five year government program with $240 million for Canada's agriculture and agri-food sector for "leading edge to seize new opportunities". (AGR, 2006)

Option 2: Various financial institutions such as VanCity where obtaining a loan would be more accessible because of the existing relationship.

b. Income Statements

The projected income statement shows that this is a profitable program. Profits are realized during full implementation of the program and the loss only occurs during the pilot portion, which is expected. This exception is because the pilot program is offered at a discounted

price to attract students. However, the number of students admitted into the pilot program has been limited to 80% of its capacity. The initial investment of $10,000 covers the pilot loss. (Appendix II)

c. NPV and Sensitivity Analysis

The project shows further potential with an expected positive NPV for the projected profit. Since the most uncertain factor is deemed to be the number of students joining the program, a sensitivity analysis was done with respect to attendance. Assuming that nothing else changes, a pessimistic outlook yields a loss of investment at 108% below the projected profit. On the other hand, the optimistic outlook mirrors this as 108% of the projected NPV! (Appendix I)

d. Performa Balance Sheets

If the basic trend continues, the program shows an increasing cash balance in the current assets. This cash can be invested in updating tools or equipment used in the program. Further, a stipend could also be given to the volunteer student liaison. Since the Farm land is still on loan and the sustainability of the program is uncertain, no long term investments for fixed assets will be made until a confirmed position of the Farm property is determined. Examples of fixed assets could be the possibility of building permanent camping facilities such as outdoor bathrooms and kitchenettes as available in other programs such as the Lost Valley Ranch in Oregon. (Appendix III)

e. Cash Flow Statement

Future cash flows for operating activities are positive which means that the program is making profits from its activities. Once again, the operating activity for the first year is negative as expected because of the pilot program. If this increase in cash can be considered a trend, then

the program will have enough money to sustain itself and may begin pursuing opportunities in investment activities. (Appendix IV)

f. Pricing Breakdown and Breakeven Point

Prices are broken up into fixed and variable costs. Fixed costs include overheads and salaries for the instructors, whereas variable costs are associated with the student, such as their accommodation, food, and learning materials. An application fee of $30 per application is also included in the revenues.

The breakeven point is calculated as the price each student must pay in order for the program to breakeven. It was determined that a price of $550 per week would be charged to each student because it would still be profitable to the Farm while also being competitive with other programs. (Appendix V)

VIII. Difficulties and Risks

Every business opportunity brings with it a certain level of risks; the international farming program is no exception. The main risks for this plan include:

1. A low demand for the program. Low student numbers for the pilot do not pose a significant threat since it is only run during the first summer and its purpose is to initiate the program and fix any problems that may arise. However, a consistently low student turnout due to lack of interest or for any other reason can jeopardize the project's financial sustainability as reflected in the sensitivity analysis.
2. A weakened currency from countries within the target market. In the past, students from Mexico's Tecnológico de Monterrey have been unable to attend programs at the farm due

to a drastic weakening of their currency, putting the program costs out of their financial reach.

3. A lack of human resources. Having a limited budget and relying heavily on volunteers creates a risk of not having enough volunteers to operate the international summer program efficiently.
4. Time. Time is both an ally and a risk for the UBC farm; it guarantees the farm the use of the land until 2012 while at the same time this could potentially not be enough time for the farm to become financially sustainable.
5. Changes in costs. An increase in faculty or material costs can diminish the farm's summer program profit margin possibly eliminating the financial benefits of the program.

IX. Future Opportunities

Not only does this program forge a hybrid of international relationships, it also improves the farm's long-term viability, which is in alignment with UBC's vision as expressed in Trek 2010 and contributes to Policy#5: Sustainable Development. The combination of promoting sustainable agriculture in a global context and UBC's notion of incorporating sustainable development with education, along with the idea to keep and continually utilize the academic resources of the UBC farm and the FLFS leads to the further development of the program that will establish perennial educational, social and financial outcomes. Possible developments are discussed as follows.

a. Course content of Future Programs

By accumulating the successful experiences of the pilot and regular programs, more courses and experiments can be added to the curriculum. For example, the intermediate and

advanced courses in agroecology, more in-depth courses such as energy use in agriculture, and the energetics of agroecosystems, urban agriculture, direct farm marketing, sustainable soil management, seed saving, small farm economics and business management, crop rotation planning, greenhouse propagation, pest management and soil biology primers.

b. Credits, Length and Scale of Future Programs

Following the implementation of the pilot, the program will be prolonged to a semester or year-round course. Although the course will be more formal, it will still emphasize experiments and practical learning in the FLFS. With the appropriate course selection, students enrolled will be able to accumulate enough academic credit for an academic term or year in the agriculture discipline. Credits will be comparable to other established academic programs. Similar to other programs, ideally, a minimum of thirty (projected) students will be in the program. Faculty will mainly be from FLFS and the UBC Farm.

c. International Contest Exchange Programs

While opening up to worldwide participants who have an adequate academic background in sustainable agriculture, the international sustainable agriculture contest will also be an integrated part of the program. Student exchanges between comparable programs over the world are welcomed to the program and contest. The contest runs once a year in the summer at the end of the program. Academic and financial rewards will be given to the winner.

d. Academic Program for Agriculture Professionals

The student base of this program will be extended to international agriculture professionals to carry out wider and direct impacts into the agriculture industry. Professionals are admitted based on their previous experience and achievements. Professionals could choose a credit or certification program depending on their needs and interests. Qualified professionals

could participate in teaching assistantships in practical or experimental subjects. Tuition and fees for professionals are determined by a combination of their selected courses and teaching efforts.

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Appendix I – NPV and Sensitivity Analysis

NPV Calculation and Sensitivity	2006*	2007	2008	2009	2010	NPV
Profit (Loss) Pessimistic(~ - 30%)	$ (10,000)	$ (6,750)	$ (166)	$ 4,252	$ 14,952	$ (2,026)
Profit (Loss) Base	$ (10,000)	$ (5,583)	$ 6,968	$ 14,952	$ 31,003	$ 25,463
Profit (Loss) Optimistic (~ +30%)	$ (10,000)	$ (4,416)	$ 14,102	$ 25,653	$ 47,054	$ 52,952
*2006 is the initial investment						

Appendix II – Income Statement

UBC Farms International Program Income Statement For the Year Ended	2007	2008	2009	2010
Revenue				
Application Fee	$ 150	$ 420	$ 630	$ 900
Program Fee	$ 10,500	$ 46,200	$ 69,300	$ 99,000
Total Revenue	$ 10,650	$ 46,620	$ 69,930	$ 99,900
Expenses				
Fixed				
Sessionals	$ 4,000	$ 8,000	$ 12,000	$ 12,000
Marketing	$ 2,000	$ 7,500	$ 7,500	$ 7,500
Administrative	$ 1,500	$ 1,500	$ 2,000	$ 2,000
Total Fixed	$ 7,500	$ 17,000	$ 21,500	$ 21,500
Variable				
Food	$ 1,000	$ 2,800	$ 4,200	$ 6,000
Housing	$ 6,233	$ 17,458	$ 26,178	$ 37,397
Learning Materials	$ 500	$ 1,400	$ 2,100	$ 3,000
Miscellaneous	$ 1,000	$ 1,000	$ 1,000	$ 1,000
	$ 8,733	$ 22,658	$ 33,478	$ 47,397
Net Income (Loss)	$ (5,583)	$ 6,962	$ 14,952	$ 31,003

Appendix III – Balance Sheet

UBC Farms International Program Balance Sheet For the Year Ended	2007	2008	2009	2010
Assets				
Current Assets	$ 4,417	$ 11,385	$ 26,337	$ 57,340
Fixed Assets	$ -			
Total Assets	$ 4,417	$ 11,385	$ 26,337	$ 57,340
Liabilities and O.E.				
Current Liabilities	$ -	$ -	$ -	$ -
Fixed Liabilities	$ -	$ -	$ -	$ -
Owner's Equity*	$ 10,000	$ 4,417	$ 11,385	$ 26,337
Retained Earnings	$ (5,583)	$ 6,968	$ 14,952	$ 31,003
Total Liabilities & O.E.	$ 4,417	$ 11,385	$ 26,337	$ 57,340
*Assume $10,000 to start up the program as a grant from financing activities				

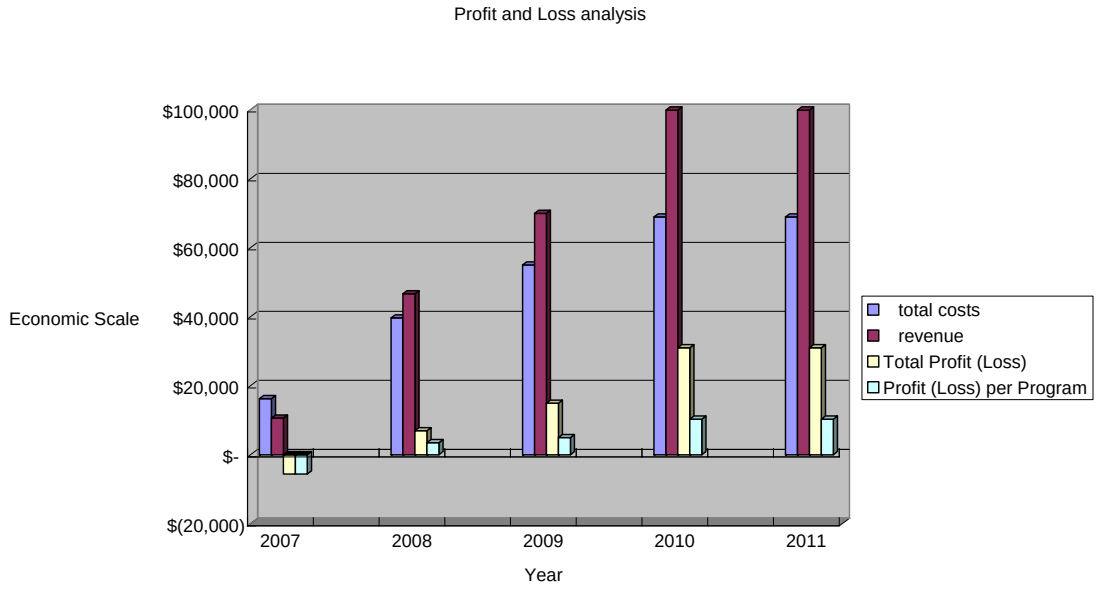
Appendix IV – Cash Flow Statement

UBC Farms International Program Cash Flow Statement For the Year Ended	2007	2008	2009	2010
Opening Cash Balance	$ -	$ 4,417	$ 11,385	$ 26,337
Operating Activities				
Add				
Total Revenues	$ 10,650	$ 46,620	$ 69,930	$ 99,900
Less				
Fixed Expenses	$ 7,500	$ 17,000	$ 21,500	$ 21,500
Variable Expenses	$ 8,733	$ 22,652	$ 33,478	$ 47,397
Total Operating Income	-$ 5,583	$ 6,968	$ 14,952	$ 31,003
Investing Activities	$ -	$ -	$ -	$ -
Financing Activities	$ 10,000	$ -	$ -	$ -
Ending Cash Balance	$ 4,417	$ 11,385	$ 26,337	$ 57,340

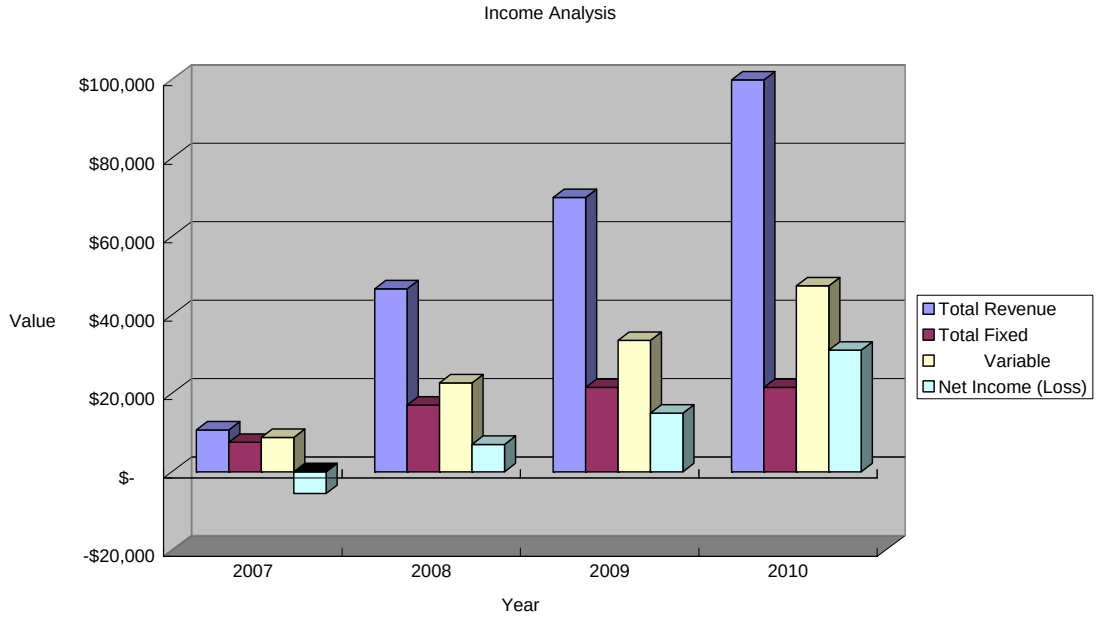
Appendix V – Program Operation Breakdown

Program Operations	2007		2008		2009		2010		2011	
Number of Programs	1		2		3		3		3	
Number of Students per Program	5		7		7		10		10	
Total Number of Students	5		14		21		30		30	
Fixed Costs										
Sessionals	$4,000		$ 8,000		$12,000		$12,000		$12,000	
Marketing	$2,000		$ 7,500		$7,500		$7,500		$7,500	
Administrative	$1,500		$ 1,500		$2,000		$2,000		$2,000	
Variable Costs										
Food per Student	$200		$ 200		$200		$200		$200	
Housing per Student	$1,247		$ 1,247		$1,247		$1,247		$1,247	
Learning Materials per Student	$100		$ 100		$ 100		$100		$100	
Food Total	$1,000		$ 2,800		$4,200		$6,000		$6,000	
Housing Total	$6,233		$17,452		$26,178		$37,397		$37,397	
Learning Materials Total	$500		$1,400		$2,100		$3,000		$3,000	
Miscellaneous Costs	$1,000		$1,000		$1,000		$1,000		$1,000	
Total Costs		$16,233		$39,652		$54,978		$68,897		$68,897
Breakeven Fee per Student	$3,247		$2,832		$2,618		$2,297		$2,297	
Student Cost per Week	$541		$472		$436		$383		$383	
Total Application Fee	$150		$420		$630		$900		$900	
Student Fee per Week	$350		$550		$550		$550		$550	
Student Total Fee (6 weeks)	$2,100		$3,300		$3,300		$3,300		$3,300	
Revenue		$10,650		$46,620		$69,930		$99,900		$99,900
Total Profit (Loss)		$(5,583)		$6,968		$14,952		$31,003		$31,003
Profit (Loss) per Program		$(5,583)		$3,484		$4,984		$10,334		$10,334

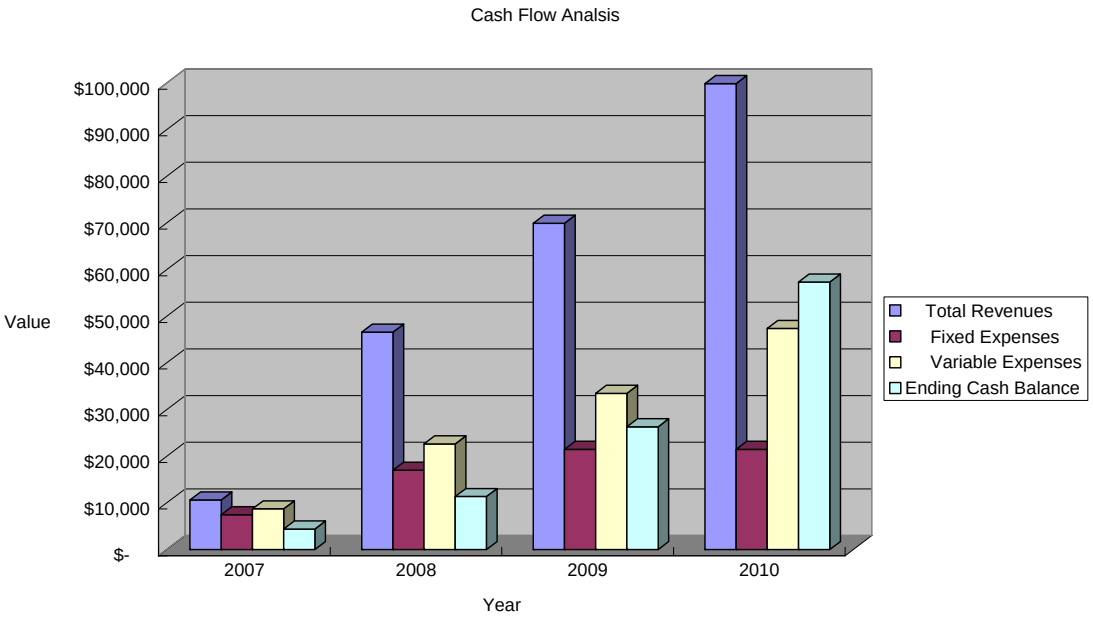
Appendix VI – Profit and Loss Analysis



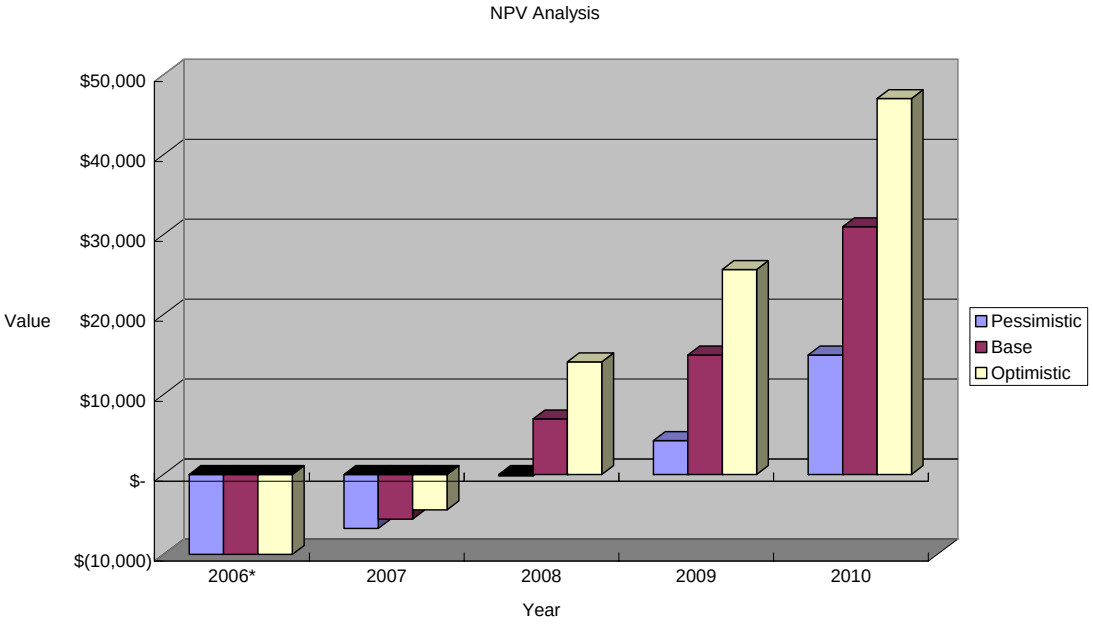
Appendix VII – Income Analysis



Appendix VIII – Cash Flow Analysis

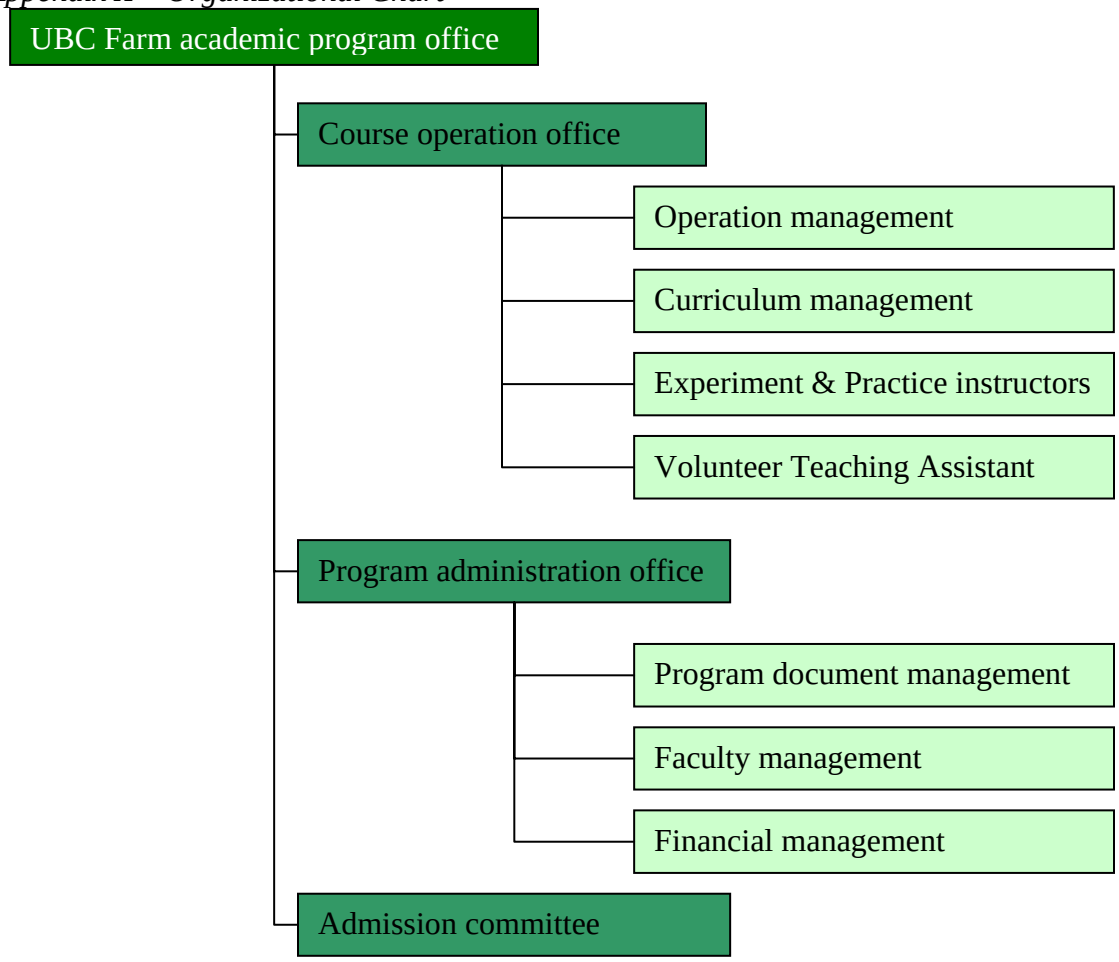


Appendix IX – NPV Analysis

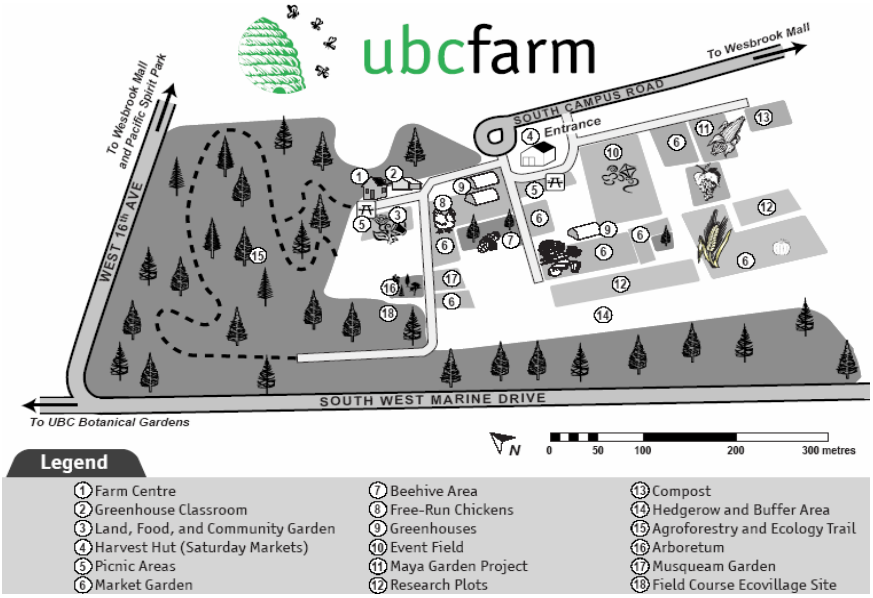


	NPV
Pessimistic	$ (2,026)
Base	$25,463
Optimistic	$52,952

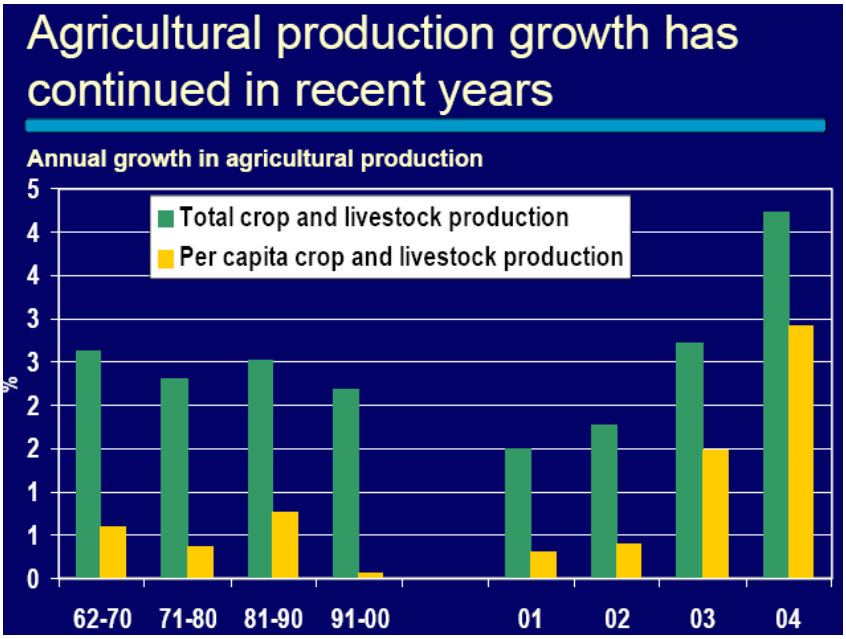
Appendix X – Organizational Chart



Appendix XI – Operation Location Map

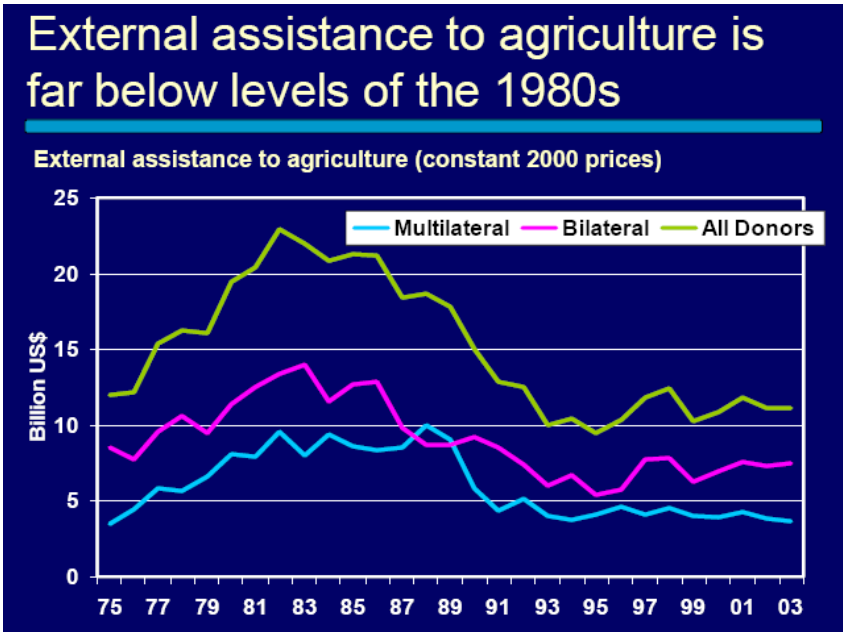


Appendix XII – Agriculture Production Growth



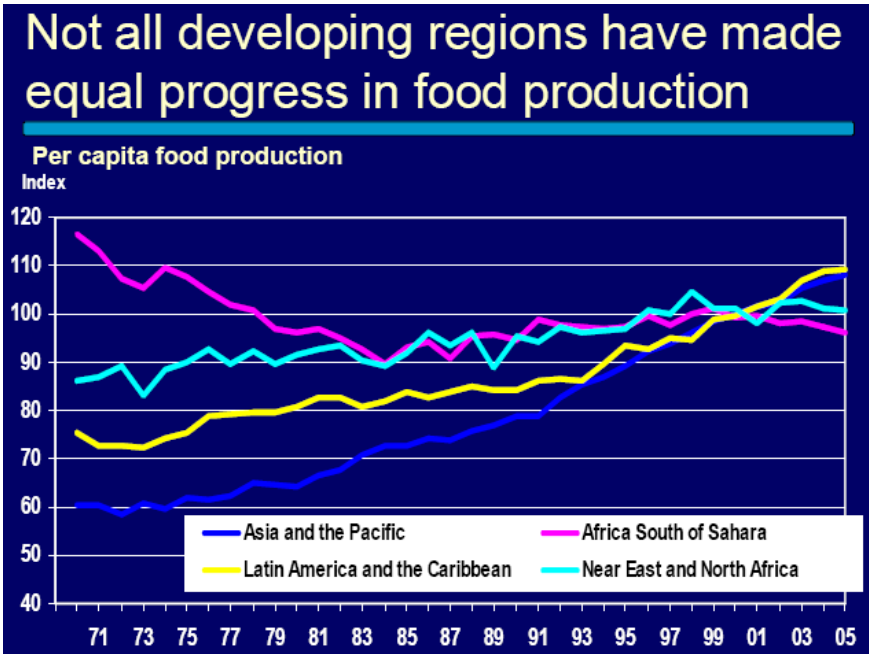
Source: ftp://ftp.fao.org/es/esa/sofa/sofa_2006_pingali.pdf

Appendix XIII – External Assistance to Agriculture



Source: ftp://ftp.fao.org/es/esa/sofa/sofa_2006_pingali.pdf

Appendix XIV – Per Capita Production



Source: ftp://ftp.fao.org/es/esa/sofa/sofa_2006_pingali.pdf

Appendix XV – Marketing Mix

Marketing Mix	
Product	Hands on agroecological sustainable farming course.
Price	Total program price of $3,300 is competitive with that of the Lost Valley Ranch and the UC Santa Cruz alternatives. It is also sufficient to cover all program expenses and creates a profit when the program is operating with its target class size of 10 students.
Placement	South area of campus.
Promotion	Promotion would occur through advertising in other countries as well as future possibility of early application discounts for students who apply to the program before the end of January.

Appendix XVI – Value Position Statement

Value Position Statement	
Who is this program for	secondary and post secondary students
What is their need	gain knowledge in the field of agroeology and sustainable agriculture
Describe the program's role	interactive, practical and global
What are the benefits that solve a student's problem	80% hands-on and 20% theoretical teachings on agroecology in a Canadian and international context
Features and reasons to believe this is the benefit	knowledgeable staff and great learning facilities
Differentiation	low student to faculty ratio, farm facility in an urban setting, variety of weather and season, and international city setting (Vancouver)

Appendix XVII – 2006 – 2007 Marketing Calendar

	2006	2007											
	December	January	February	March	April	May	June	July	August	September	October	November	December
Marketing events			PR Events: Provide fresh farm food for a social function such as UBC or city galas for foreign dignitaries									attend educational and agricultural exhibitions	
Marketing activities	web page development	- Email, Flyers and/or Booklet to universities - launch website	Post advertisements in professional association newsletters and magazines										Exhibition contact follow up
Marketing material	Program booklet, flyers, photos, key chains and pens												
Plan			Registration and preparing for summer program			pilot summer program: July to Aug post pilot summer programs: May to August				Collect feed back from program participants and related international organizations		Based on pass summer program and data result, modify curriculum and marketing material	

* 2007 is a typical representation of the marketing calendar for 2008 to 2010.