



The Community of San Francisco: Creating a Path out of Poverty

AGBL Team: Dr. Heather Kohls, Mr. Peter Kranstover, Dr. Jason Meyler, Sr. Janet Gregorcich,
Richard Bernard, Robert Borowik, Clarisse Cucueco, Brady Gerndt, Jacob Hansen, Daniel Parks,
Monica Raciti, Erin Thomas, and Samantha Zlevor

Contents

I. Acknowledgements	3
II. AGBL & Caritas	4
III. San Francisco	4
IV. Contextual Overview of Economic Solidarity	6
V. Consumption Analysis.....	10
Table 1: Top 10 Expenditures for the average family in San Francisco over one year	10
Table 2: Consumption per Family over various time periods	11
VI. Methodology.....	12
VII. Project Analysis	13
VIII. Implementation.....	17
IX. Conclusion	23
X. Bibliography.....	25
XI. Appendices.....	26
Table 3: Aggregate production by families in San Francisco based our surveys	26
Figure 1: Current San Francisco Organizational Chart.....	27
Figure 2: Extended Organizational Chart.....	28

“¡Oh hijos nuestros! Nosotros nos vamos; sanas recomendaciones y sabios consejos os dejamos... Hemos cumplido nuestra misión, pensad en nosotros, no nos borreís de la memoria, ni nos olvideis”.¹

I. Acknowledgements

This report was prepared by Marquette University’s Applied Global Business Learning team (AGBL), as co-advocates, under the overall supervision and guidance of Caritas of the Diocese of Quiché (Pastoral Land and Pastoral Social). We are indebted to the many people who helped us in the preparation of this report. For their valuable contributions, suggestions, and revisions, we would like to thank Dr. Heather Kohls, Dr. Jason Meyler and Peter Kranstover. We are grateful to Jorge Luis Castro, Florencio Macario Mejia, Pablo Mejia, Manuel Ventura, Luisa Chay Morales, and Silvia Saguic, who conceived of and then assisted with this project with great benevolence and enthusiasm. We would also like to thank members of the Cocode and the San Francisco community more broadly for welcoming us into their homes, while exercising great patience and willingness to assist us in our research. Likewise, we are extremely appreciative to the families who opened their homes and treated us with great hospitality throughout our time in Chinique. We also learned a great deal from Sr. Virginia Searing at the Center for Peace – Barbara Ford. Lastly, we would like to thank Marquette University and the Center for Global and Economic Studies for providing the platform, upon which, gave us the opportunity to bring the Jesuit ideals to fruition.

¹Recinos (1992)



II. AGBL & Caritas

AGBL's mission is to foster sustainable business practices while preserving cultural ideals by providing micro-enterprise solutions. Our mission became tangible upon receipt of the request by Caritas to evaluate the indigenous community in San Francisco, Quiché, Guatemala. The purpose of such request was aimed toward achieving "Economic Solidarity" which is characterized by the self-governance of a community through the use of cooperative production methods.

Caritas of Guatemala is a charitable, apolitical and non-profit foundation. Their call is "To God, for the love of your neighbor". Caritas has defined both thematic and context-specific issues. The thematic issues focuses on justice, peace, reconciliation, migration and human trafficking, the environment, risk management and emergencies, internal human development and solidarity, and institutional capacity building. On the other hand, the contextual issues include gender, communication and civil participation, and political advocacy. Caritas creates and develops communities, builds potable water projects, and uplifts whenever and wherever they can.

III. San Francisco

The community of San Francisco belongs to the municipality of Santo Tomás, Quiché, located 15 kilometers from the head municipality and 23 kilometers from the provincial capital. Our mission was to appraise the economic circumstances and constraints under which the San Francisco community was operating, and in turn, offer a method of implementation for creating a form of communal economic cooperation or economic solidarity. Specifically, our research was focused on evaluating and quantifying the environmental, agricultural, social, cultural, and health related constraints that have evolved from years of oppression and persecution.

Currently, the community of San Francisco is one of the least developed communities in relation to the rest of the communities in the Quiché municipality; this is due to its history. In prior years, the citizens of the community were tenant farmers who inhabited land owned by the estate of the Girón family, where they were subjected to many years of service without pay. It was not until the 1980's that a group of families organized and began to demand rights from the owner of the farm. After negotiating for several years, workers were finally able to achieve compensation for the years worked, and as a form of payment, were granted a piece of land to live and work in 2000. Specifically, the land granted to workers was 5 caballerias," (5 caballerias = 556 acres), however, such lands are not ideal for agricultural production. Additionally, the property is owned jointly, where about 80 families now live. In 2007, the community of San Francisco gained formal legal recognition of their right to live on the land. Caritas continues to work with government authorities to provide each farmer with an individual title to their land.





Despite the obstacles the people of San Francisco have overcome, the quality of life is deficient as measured by both international and national data due to the absence of jobs, water, and an uneducated labor force. As a result, families experience deficiencies in nutrition, housing, and access to basic services, such as drinking water and basic healthcare. Fertility rates are high, with families of 5 to 8 children not uncommon. According to the Central Intelligence Agency, infant mortality in Guatemala, a common indicator of quality of life, is about 23.51 per 1000 live births² in 2014. From previous work done by AGBL students, our estimates are that most development indicators for Guatemala as a whole are far better than the actual results found in Quiche. This means that more than 23.51 out of 1000 children die before the age five and it could be as high as 40 children out of every 1000 births in some areas.³

IV. Contextual Overview of Economic Solidarity

In light of the current situation, resources, location, culture and historical background of San Francisco, economic solidarity will serve well as its economic model. The organization and

² The World Factbook: Guatemala (2014). Central Intelligence Agency. www.cia.gov

³ Based on AGBL Guatemala 2013 report that found indicators roughly 3x worse in Quiche than the whole of Guatemala.

union of the community's pursuits and missions will empower the community to advance towards a better situation. The community can leverage the economic solidarity model to capitalize on abundant resources, eliminate redundancy in work and improve village infrastructure. Ultimately, success would lead to an atmosphere characterized by security and the ability to exercise free will in all aspects of daily life. As Arruda explained it, "[The] Solidarity Economy is a dynamic [system] of reciprocity and solidarity which links individual interests to the collective interest. In this sense, [the] Solidarity Economy is not a sector of the economy, but a transversal approach that includes initiatives in all sectors of the economy."⁴

Socially, the economic solidarity model integrates well with the belief structure that the community possesses. It places high value on relationships, ethics and moral responsibility. The basis of the model reflects Mayan traditions, particularly those of shared land ownership and a society oriented towards cooperation. The Mayan culture that predates the Spanish conquest originally centered on ensuring a consistent and dependable agricultural lifestyle, but was altered with the introduction of a foreign influence. The Spanish model imposed a framework of private land ownership that led to conflict and displacement of the indigenous Mayans. Popularity for the economic solidarity model surged, in the past few decades, in light of the Guatemalan civil war where disparities in land distribution culminated in armed conflict. The effects of this history of dispossession and foreign influence are certainly evident in San Francisco. The compatibility of the economic solidarity model with Mayan tradition provides evidence for the potential of this model as a measure to counteract the negative practices fomented by colonial plantation agriculture.

Mance (2011) proposes that we "start from what already exists". He suggests an "analysis of economic needs and demands" specifically looking at consumption patterns, production flows and the potential for the creation of economic value.⁵ Throughout this report, we will highlight areas of potential economic value within the community. These are the areas in which investment of time and talent would be feasible and sustainable and could likely be developed into

⁴ Arruda, Marcos (2003)

⁵ Mance, Euclides (2011)

cooperatives, entrepreneurial endeavors and organizations that will provide future growth for the community. As economic theory would dictate, investment in these areas will allow for improvement in production, leading to a surplus of products and ultimately profit. Subsequently, the perpetual re-investment of this profit will allow for further projects that increase quality of life and improve capability of community members. Overtime, improvements will become more expansive, allowing for greater investments, such as a potable water project. Focusing on present strengths will be important in developing the sustainable and productive community that San Francisco strives to be.

Before economic solidarity can come to fruition, it is necessary to address the constraints that exist for the community. Mance (2011) refers to these as “Economic Means – all the material or immaterial objects, goods, or services that can be used to attend to human necessities.” They can potential prevent the transformation of a community into the solidarity model.⁶ The limited supply of water, the quality and ownership of land, and lack of transportation must be considered, and ultimately addressed if the people of San Francisco are going to reap the benefits of implementing our economic solidarity model. Numerous health and production issues experienced by the community may be addressed by enhancing the availability of water. As we discovered in our time with the people, they spend a significant amount of time each day traveling to acquire water. Such water is not of drinking quality, which leads to many citizens consuming various bacterium and parasites. The implementation of a water pump would significantly increase the quality of life for citizens and make their efforts more effective. Healthier citizens will be able to carry out activities much more efficiently, whether it be studying, farming or working in a service role.

The issue of land ownership is certainly one of the economic means and affects the amount of risk involved in investing in production activities. So families will be weary of untried products displacing those they need when resources for are scarce. Likewise, the quality of the land and the threat of erosion impede production activities for many of the potential entrepreneurial activities.

⁶ Ibid.

Economic solidarity may only be able to function in a weakened form if until these constraints are addressed.

The success of the economic solidarity model depends heavily on the specialization of processes throughout the community. In identifying the potential products, areas of strength and abundant materials in San Francisco, it will be beneficial to analyze how the community could combine the efforts of each family to provide each product or service. For example, if a certain group of families has a consistently high yield of jocote, they would invest in that particular crop and improve the production process. Each family that produces jocote would join together to form a jocote cooperative. By joining together and focusing solely on jocote production, this sector could become an expert in the production of this fruit. They could join together to invest in tools to make production more efficient and profitable. Specialization in production would then lead to economies of scale, a lower cost per output and ultimately lower cost of jocote production. Similar cooperatives or entrepreneurships would be formed around the strength areas or abundant materials that exist within the municipality. The creation of specialized collaborative operations will be a core aspect of the economic solidarity model.

Lastly, it will be important to consider the risks that are involved in transitioning to a model of economic solidarity. The model will be built upon a foundation of trust. Each member of the community must have faith that they will be provided for, by the community as a whole. If one member must give up corn production to focus on specializing in another area, they must have the feeling of security that their neighbor will provide this necessity for them. A strong confidence must be present in the entire community for this concept to function. This will be one of the most difficult barriers to overcome, especially when facing scarcity of resources such as water or land. Families may question their security when transitioning to this model, but a level of trust must be present for the success of the economic solidarity model.

All of these considerations are integral parts of developing an appropriate and successful model of economic solidarity for the community of San Francisco. Free market incentives, community established institutional safeguards and cooperation in agriculture, marketing,

production and village projects are all vital in development of a successful economy. Mance⁷ (2011) argues that the process to begin economic solidarity should begin with an analysis of consumption and production and then seek out the products that produce a flow of value in the economy. Each of these aspects will be addressed in depth throughout the remainder of this report.

V. Consumption Analysis

Consumption Details

Our conclusions were based upon a consumption report compiled by Caritas that included baseline figures of annual expenditures and tracked the everyday consumption of sixty families. Specifically, the consumption data included everyday items such as clothing, specific foods, and other necessities. The table below shows how much a family would spend on basic necessities in a year.

Table 1: Top 10 Expenditures for the average family in San Francisco over one year

Top 10 Expenditures				
Expenditures	Amount	Units	Unit Value*	Total Value*
Corn	2,727	Kilograms	1.25	3,408.75
Soda	360	Liter	6	2,160
Soap	360	Unit	5	1,800
Beef	90	Kilograms	16	1,440
Bread	1,200	Unit	1	1,200
Mosh	60	Kilograms	20	1,200
Local Fruit	600	Unit	2	1,200
Chicken	90	Kilograms	12	1,080
Cheese	180	Package	5	900
Guicoy	180	Unit	5	900

* In Quetzales

Presently, many families choose to send members to the coast of Guatemala for work in hopes of reaping greater returns than remaining in San Francisco. Based on our findings, jobs on the coast provide upwards of 50-60 quetzales per day. Additionally, the income that the families earn is often time sporadic, and unpredictable. If there is high demand for labor or services, the

⁷ Ibid., p. 11

families will do well, until the cycle of low demand arrives. In our interviews, we heard from some members of San Francisco that it was not uncommon to go two or three days before work was available. One goal of the solidarity economy would be to limit the amount of people who leave the community to work on the coast. By providing a sustainable way for the families to generate income, a cooperative system could provide supplemental income as well as other visible benefits to the community.

Table 2: Consumption per Family over various time periods

Consumption Per Family (in Quetzales)	
Consumption Per Week	26,471
Number of Families	60
Weekly Consumption	441.18
Monthly Consumption	1,764.74
Yearly Consumption*	21,301.84

*Includes annualized data for medicine, clothing, and school supplies)

The roughly 21 thousand quetzales per year necessary to maintain a family in San Francisco could be achieved in a number of ways, which will be discussed below. Each week, the average family spends approximately 441 quetzales. This information represents the amount of money a typical family needs to make in order to meet their basic needs.

Based on the data we received from Caritas and the information gathered from our interviews, we deduced that both bread and cheese production could serve as additional sources of income for the families. Throughout our interviews, the people of San Francisco told us that bread is in demand, however there are very few people within the community who actually know how to make bread. Therefore, it would be beneficial for families to be educated in bread making. The same is true for the production of cheese - the demand is there, however the families just need to learn how to produce it in order to sell it to other families and in the marketplace. These are just two of the areas where families could focus on in order to provide themselves with another revenue stream.

Additionally, many of the expenditures that are highest in the community, can be decreased. One of the areas of high expenditure is soda, where, on average, a family spends 36 quetzales per week. Most often, water is not available due to the poor quality therefore; soda has become a beverage of choice for many families. The health benefits of soda are non-existent, and the increased consumption has the potential to cause long-term health consequences for the community. As part of the economic solidarity system, a focus on healthy food products is recommended especially in a community that is lacking healthcare services.

VI. Methodology

Upon arrival to the community of San Francisco del Quiche, we met with the members of the Cocode, a group of seven community leaders, which work on a volunteer basis for the betterment of the community. Their past and current projects include the construction of a road as well as bringing electricity into the village. During the meeting, the Cocode indicated the greatest struggles that the community faces and hopes to have addressed. Following the meeting with the Cocode, we met with the entire community in a meeting on the grounds of the school. There we asked questions regarding the issues the community faces as well as their hopes for the future.



In order to better understand the socioeconomic circumstances of the individual families of the community of San Francisco del Quiche, on the second day in the village we decided to split into three groups in order to interview the fifteen families interested in participating in the economic solidarity experiment proposed by Caritas. The first group conducted interviews with

five families in sector two. The second group interviewed five families in sector three. The third group interviewed two families in the Green Sector, the sector with the most fertile land in the community. We had prepared questions to better understand the economic situation in each family. The questions we asked included the following:

1. What new products did the families try producing this year? How did it go?
2. Where does the family pride for itself?
3. How successful are they?
4. How often do they water each product? How do they store water? Can they store it from the rainy season? Where do they get their water?
5. What is the total production for the family? Do they have a surplus of products?
6. What are the family's sources of income?
7. What does the family purchase regularly?
8. What animals does the family own?
9. What is the number of people the family is supporting, and what are the ages of the members?
10. Where does the family get firewood? How often? How much?
11. What are the skills in the family including amount of schooling?
12. How long has the family lived in their current home?
13. How much do families in the community help each other?
14. Is the family interested and enthusiastic about adding new products to their farm?
15. Does the family produce any medicinal plants?

These questions allowed us to gain a better understanding of the characteristics of the families of San Francisco del Quiche as well as the products they produce. The following section elaborates on the community responses to the above-listed questions.

VII. Project Analysis

Our interviews gave us valuable insights to San Francisco's social and economic circumstances that we believe will affect the success of economic solidarity within the community.

Below, we have highlighted the major trends observed that may be obstacles or catalysts to the economic solidarity process.

Water

We found access to water to be the greatest need of the community. We spoke with families who walked anywhere from 30 minutes to two hours to the nearest water source, twice per day to collect water for their families, animals, and crops. Several families collected rainwater, however, explained that with the resources available to them, they could only make rainwater last two or three days at the most. The lack of access to water not only directly affects the health of the families, but also the productivity and wellbeing of the land and animals. We spoke with mothers who explained that their families get sick from various parasites being present in the water they collect. The families also explained to us that crops requiring an abundance of water are not feasible to grow, because it is so difficult to acquire large amounts of water. Without reasonable access to clean water, we believe it would be difficult for this community to thrive.

Education and Literacy

Because the older generations lived the majority of their lives on Girón's land, they did not have access to education. Therefore, most of the adults are illiterate. Since gaining their independence, the community has established a school, meaning that the younger generations have been able to learn to read and write. In addition, due to the lack of healthcare, need for labor at home, and distance to school, children often miss significant numbers of class. The lack of education among older generations is a factor that prevents economic and social mobility for their families. This creates a need for direct oral instruction for adults, either to learn new skills or refine basic reading and math skills.

Production

In the interviews, most families were unable to give us exact numbers of the crops they harvested on their land. Precise production data is difficult to assess. However, families know that what they are producing currently is not enough to feed their families, as stores of corn and beans often end before a new planting season begins. Families therefore must purchase food from markets and stores to supplement for the foods they are not able to grow enough of. Due to the

fact that San Francisco is primarily a subsistence farming community, it is an important market failure to recognize.

The aggregate production in the community of San Francisco is included in appendix 1. The data is separated by sector, described in the methodology section of this report, of the community in which each family lives. Blank cells represent a lack of information of the quantity produced.



Migrant Work

The lack of sustainable production has also led to men leaving the community to find work. We learned that men between the ages of fifteen and fifty will go to the coast or the city to work for several months out of the year because wages are higher and the supply of jobs is more abundant. We found that staying in the community, men were able to find work once or twice per week for about 40 quetzales per day, but on the coast or in the city, they could make up to 800 quetzales in a month. Of course, there are costs associated with leaving the community for work, including transportation and general living expenses, however it seems that the benefits far exceed those costs. Additionally, the community members stated that they view going to the coast for work as a freedom afforded to them since they gained ownership of the land. It is another way to create income for their families. Therefore, in order for the concept of economic solidarity to work,

the benefits of staying in the community to work on the land must outweigh the benefits of leaving the community for work.

Land Conditions

Due to the mountainous nature of the land, deforestation, and a lack of rotation in crops, the land in San Francisco is in danger of soil erosion and desertification. These factors contribute to the already deteriorated land conditions which prevailed under the ownership of the Girón family. Moving forward, it is necessary for the community to look for ways to keep the land nutrient-rich and productive to create a stable and sustainable economy including using pines and gravilea, terracing the land, or even macadamia nut trees to stabilize the terrain.

Transportation

Based on our interviews, it appears as though transportation is a significant structural barrier to initiating trade within the families. The families we spoke with do not own vehicles, however they do have access to transportation for rides to and from the markets for about five quetzales. There are three vehicles in the village. Most of the community members walk to a local store or to a water source, but walking may become an issue for trade because they would have to carry large amounts of products to trade with other community members, or be forced to make multiple trips. Also, the households are relatively far from one another. Therefore, the prospect of building a community center to facilitate trade may prove to solve the issue of transportation as it could consolidate marketing efforts and serve to regularize and draw agricultural product marketers to the village.

Differentiated Skills

We found that many community members in San Francisco lacked specialized and differentiated skills. All of the families were able to grow crops, but only several families were able to create processed goods, such as cheese or bread. They expressed a willingness to learn how to produce other goods, however they lacked knowledgeable sources. We attribute this to the history of the people. Many of the community members were all doing the same work on Girón's land for generations, and therefore were never taught other, more marketable skills. The families

also do not currently have the necessary tools to make these goods. We see this as an obstacle to economic solidarity because specialization will be difficult when each family has similar skills.

Risk

The people of San Francisco are risk averse, not unreasonably so, given the subsistence agricultural world in which they live. Due to the unstable conditions they are already experiencing, any new agricultural practices and a shift to economic solidarity is a significant risk for the families. At this point, each family is struggling to sustain themselves, and therefore, unable to partake in trade. We noticed sentiments of competitiveness in several cases because resources are already scarce, particularly water.

Summation

Based on the above-mentioned factors, we believe specialization required to achieve economic solidarity will be difficult. However, many of the people in San Francisco are optimistic and open to work with others and learn new ways to improve their lives and the wellbeing of the community, more broadly.

VIII. Implementation

Strategy

The premise of economic solidarity is the ability of each farmer to specialize and trade the surplus of his crops with neighbors in order to improve the quality of life of the whole community. Unfortunately, in the case of the village of San Francisco the foundation necessary to implement this strategy is lacking an essential element: water. Water is the source of life in intensive agriculture communities. At this stage the members of the village have to travel more than two hours on a daily basis to procure water. This makes it impossible for many of the farmers to have sufficient water for their families' daily needs, and supplying water to the animals is a difficult task. If the water needs of the community are met, we would like to propose additional means to help economic solidarity be a means to improve people's lives in San Francisco. A few of our ideas are highlighted below.

Bees and Honey

Bees can be a source of a myriad of goods for a community to both consume and trade with neighboring villages. Additionally, bees are an important part of the pollination process that allows agricultural lands to prosper. The honey can be collected and used to sweeten foods and drink. This product can also be sold at a profit to external customers, which will provide additional capital to invest in more seed and necessary tools to improve the farming practice.

Wax collected from the hives can be molded into candles. If the candles can be brought to market, this can be an additional source of income for a family. Also, even though the community has been working on an electricity project, electricity can be costly and candles can provide some light to help mitigate these costs. Due to the unique skills needed for bee keeping, we recommend that there be a class for the members of the community who will engage in this prospect.

Bread and Cheese

There is a great demand for bread, however the community members are in need of classes that teach techniques for producing higher quality bread. From conversations with people from the village it was clear that they are all eager to learn, but lack the means to pay for classes. If they were able to make a variety of breads that appealed to them, it would provide a more nutrient rich alternative to corn tortillas. There would also be additional income for reinvestment in the community in the form of internal trading.

The members of the community already know how to make cheese, there just needs to be more people engaging in this trade. At this point the families are subsistence farmers, and due to a lack of specialization there is no ability to trade beyond simply selling the surplus of their production. This strategy is not without risk and would be more certainly beneficial if the trust required for the solidarity economy were achieved.

Dried Fruit

One of the most abundant crops in San Francisco is the jocote fruit. Due to poor transportation means, and a short shelf life this crop only provides income for a short period. However, drying the fruit would allow it to be more easily transported and would spread out the

life of the fruit. Also in order to make this endeavor more profitable, the community should invest in tools to help with the harvesting. A simply, claw-like pole would capture more of the fruit, and prevent much of it from falling on the ground and going to waste. In order to help with the implementation of this strategy we will discuss the role of a social promoter.

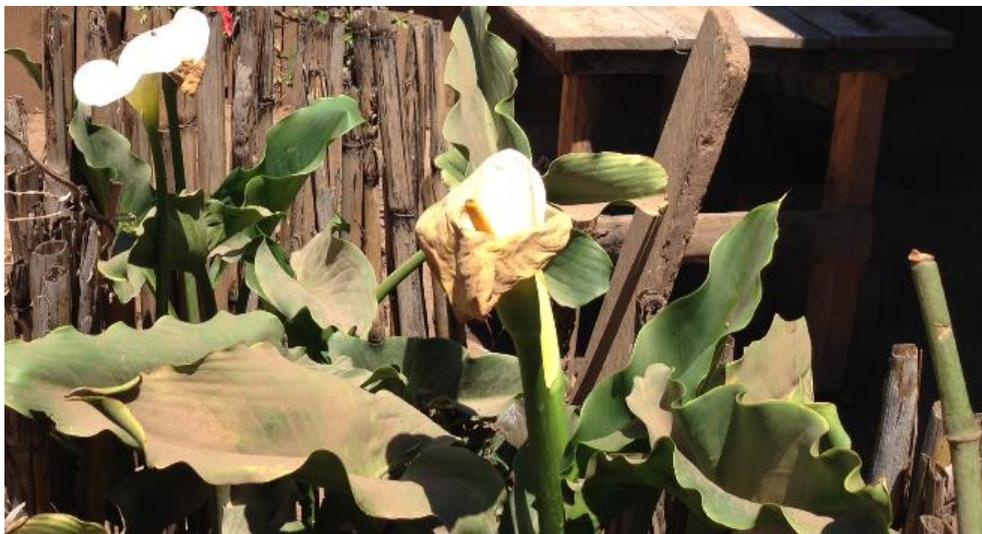
Herbal Remedies

Once the community starts to engage in trading food it will help alleviate burden from the individual families. This will hopefully have a spill-over effect on the health of those living in San Francisco. However, due to the lack of education in regards to medical care in the village, it would be providential for some of the women to be educated on making and distributing herbal remedies.

The plants necessary for many of these remedies could be garnered from what is already grown in addition some could be donated from outside sources. The social promoter could give classes on simple herbal remedies. Finally, any remedies that were found to have a high success rate could be traded in markets outside of the community. These plants can be grown in small quantities as well to ensure adequate demand as in the images below.⁸



⁸ These pictures are from the sustainable farming training area at the Centro de Paz Barbara Ford. Some products could be sold to the Caritas pharmacy as well.



Leadership Organization Chart

In order to further develop San Francisco, we believe that implementing a leadership organization may bring more structure and foster a collective community effort. We understand that an original characteristic of Mayan culture is to work and live together. However, the Civil War, as well as the acts of the former landowners, has caused the people of San Francisco to become individualistic and almost competitive. A high degree of specialization is necessary, but a different organization structure can offer a strategy for collectivism and productivity. Keep in mind that this organization structure will not overtake the current government structure held by the Cocode. This proposal is merely an addition to the Cocode. The president, currently Juan, will work with this new proposal of an extended organizational structure.

We would like to preface this proposal by highlighting that these strategies of organization cannot be accomplished without the provision of water. The people have passionately communicated with us that water is their number one need above anything else, even more important than the need to transport crops to the market. In collaboration with Caritas, grants are needed and to be written in order to receive funds to supply water to this community. With these funds, the people may be more inclined to work together, as water can now be one less thing for

⁹ Calla Lilies could be another source of supplemental income.



families to be concerned about. An organizational structure can be implemented, and the people can become a cohesive force for long-term benefits in their community.

First, we created a current organizational chart of San Francisco. As the figure in appendix 2 shows, entities include the president, vice president, treasurer, secretary, and two voices. We have not made any changes to this organizational chart. The families vote for these positions, and the person with the most votes holds the position of the president. Whoever receives the next most votes becomes the vice president and down to the voices. Families who are voices are able to contribute at Cocode meetings and offer suggestions. Positions can be held for up to two years, but reelections are allowed if the people in office so desire. The current Cocode is undergoing their second term. We believe the families are content and feel well represented by the current Cocode. All of the Cocode are male and make decisions for their individual families, growing different crops and tending various animals.

In addition to the creation of the current organizational chart of San Francisco, we propose an extended chart that is in direct correspondence with the current organizational chart. The voting for this extended chart is done by the Cocode, since the families already vote for the Cocode. The Cocode will elect these different positions within the community. As the figure in appendix 3 shows, the top of this chart is held by the project manager. This position will be in close contact and relation with the president of the Cocode. The project manager has the responsibilities of planting, harvesting, and transporting crops. This way, there is more order and structure to what the community is sending to the markets. The project manager will direct the families to ensure that all crops are being produced in an efficient manner. Whoever is in this position can have assistants underneath for smaller tasks and assistance to the different families. Without this position, the farm owners are left to fend on their own and remain competitive. For example, transportation is a large problem in the village because copious amounts of fruit are dropped on the road while taking products to the markets. The project manager has the task of finding a new way to transport products, thereby assisting the families and fostering a culture of cohesiveness. The water engineer is an internal position underneath the project manager, as this person will ensure that water is maintained and brought in to the community. Furthermore, a director of sales is an external position (someone from outside of the village) that has the task of assigning a market

associate to collect information on crops being sold in the market. Also, this position assigns a trading associate for tracking crop trading between families. The director of sales allows the community to not worry about pricing strategies and sales patterns. It empowers the village to collectively produce crops and sell them for a living. We feel that this organizational extension will bring a positive structure and foster a collective effort for the community. It is in direct conjunction with the Cocode structure, and it will empower families to make influential decisions.

There is evidence that other communities who followed this model of an extended organizational chart have actually succeeded. A community such as Chujupen started with only a development committee, and then branched off to create more committees. They have created committees of water, labor, and even history. Chujupen has maintained this model, as other rural communities in Guatemala have formed this type of structure as well. Caritas must give confidence to San Francisco that an extended model has proven to be beneficial. We do not desire to enforce this upon the community, but it is a strategic option that can bring together the families.

The community needs specific capital expenditures for the organizational charts to fully function. However, these capital items cannot be used without proper funding and grant writing. As we alluded to earlier, transportation is a key issue that can be easily mitigated with wheelbarrows for farmers. Some other capital expenditures can include: trucks, aluminum ladders, large pots, backpacks with lids, and rope. Farmers can share these items to work together and produce their crops more efficiently. These are needs that were directly communicated to us when we spent the day with the families.

We would like to highlight the need for volunteers to come and train the community, as the people like to call these volunteers *promoter social*. These people are external volunteers who care about how challenging situations can be for the families. They should come twice a week for a period of two years. San Francisco does not need to pay for the people to come. We feel that Caritas, with its connections and networks, must send out alerts to the surrounding areas about San Francisco's many needs. These volunteers can come from the Peace Corps, Caritas, the municipality, hospitals, financial institutions, universities, veterinarian associations, and people with specialties. The villagers have expressed needs for additional training on the proper use of

their crops, or even new ways to alter their crops for better value. An example can include a volunteer coming and training a family on how to dry jocote to have better shelf life and sell in the market. Another example is how one family owns a furnace and would like additional training on how to make different types of pastries. These are simple tasks that can be delegated to willing volunteers. Caritas must take the initiative to search for these people and perhaps offer different incentives for the volunteers¹⁰.

IX. Conclusion

In conclusion, based on our findings, we believe that economic solidarity would only work if the families of San Francisco agree on cooperation. In order for cooperation to occur, families need to trust one another. The biggest problem that the village of San Francisco is facing is the lack of a water system. Water is such a big factor for the betterment of their living situation. Water determines what crops they can grow, and this will factor in the trade that they would do amongst themselves. We believe that in order for economic solidarity to completely flourish, the village of San Francisco would need an effective water system.

As this community develops, Mance (2011) and MESA (2003) propose a systemization of the supply chain links and reorganization necessary to thrive in the model of Economic Solidarity. “It is important to underline the role of Solidarity Economy-based collaborative networks, community banks, and systems of economic barter.”¹¹ These will represent the next steps after the community has begun to integrate production trading and reallocating its resources.

Finally, although going to the coast in search of employment may seem to be a good idea, the cost of transportation, food, and housing takes income out of the San Francisco community and doesn’t provide enough money to support the families when they return to the village. It is likely also exposing the community to illnesses that their immune systems are not prepared for.

¹⁰ During our investigation we identified a few places where additional, low-cost training is available for the members of the community particularly at the Centro de Paz Barbara Ford and a medicinal herb store in Chinique.

¹¹ Mance (2011) p. 13

We propose that encouraging community members to stay at home would be more beneficial to the community as a whole. If these workers use their entrepreneurial minds instead toward creating economic value for the community (for example, incorporating some of the ideas listed within), the economic benefits would most certainly spillover through the community boosting the ability of the community to focus on the idea of cooperation and trade, the foundation for the solidarity model.



X. Bibliography

Arruda, Marcos. 2003. “What is a Solidarity Economy?” Presentation at the World Social Forum, Porto Alegre, Brazil, 23-28 January 2003. Posted on June 20, 2005.
<http://www.tni.org/es/archives/act/511/>

Esteves, Ana Margarida, 2014. “Contextualizing Solidarity Economy in the field of Social Entrepreneurship”. Posted on August 25, 2014.
<http://ideas4impact.blogspot.com/2014/08/contextualizing-solidarity-economy-in.html>

Kohls, et. al., 2013. “The Return on Investment for Water Projects in Quiché”, done for Caritas in January of 2013.

Jaramillo, Nathalia and Michelle Carreon, 2014. “Pedagogies of resistance and solidarity: towards revolutionary and decolonial praxis”, *Interface*, vol. 6 (1), pp. 392-411, May 2014.

Mance, Euclides. 2011. Solidarity Economy.
http://solidarius.com.br/mance/biblioteca/solidarity_economy.pdf

Recinos, Adrian. 1992. Popol Vuh: Las Antiguas Historias del Quiche, Piedra Santa.
<http://cms.fideck.com/userfiles/onu.org.gt/File/2401394130262032.pdf>

The World Factbook: Guatemala (2014). Central Intelligence Agency. www.cia.gov

XI. Appendices

Table 3: Aggregate production by families in San Francisco based our surveys

	Sector Two					Group 2					Green Sector		Aggregate		
Family Number	1	2	3	4	5	6	7	8	9	10	11	12			
Family Size	8	14	5	7	11			8	9	13	10	10			
Harvested Products	Corn (lbs/year)	1500	1000	1100	22000	2500		1500		1500			31100		
	Bean (lbs/year)	75	200	50	200	300		300		300			1425		
	Jocote (#/year)	300	500	1000	0							40000	41800		
	Coffee (lbs/year)	0		300	15	0		70				600	600	1585	
	Bananas (#/year)		0	72	1125	0								1197	
	Ayote (#/year)	0	50	60	20	0						0	0	130	
	Guisquil	0	0		0	100						0	0	100	
	Raddish	0	0	0		50						0		50	
	Cilantro	0	0	0		50						0	0	50	
	Orange (trees)	0	0	2	2									0	4
	Lime (trees)	0	0	2	0	0								0	2
	Lemon (trees)	0	0	2	2							0	0	0	4
	Peach (trees)	0	0	2	0	0						0	0	0	2
	Mango (trees)	0	0	2	0	0						0	0	0	2
	Carrots	0	0	0		0						0	0		
	Cucumbers	0	0	0		0						0	0		
	Beets	0	0	0		0						0	0		
	Sugar Cane	0	0	0	0							0	0		
	Avocado	0	0	0	0							0	0		
	Mandarin (trees)	0	0	2	0	0						0	0	0	2
	Herbal Medicine	0	0	0	0	0						0	0	0	0
	Papaya	0	0	0	0	0						0	0	0	0
	Potato	0	0	0	0	0						0	0	0	0
	Melon	0	0		0	0						0	0		
	Sweet Potato	0	0	0	0	0						0	0	0	0
Onion	0	0	0	0	0						0	0	0	0	
Soybean	0	0	0		0						0	0			
Squash Seeds											50 lbs	0	50		
Pumpkin	0	0	0	0	0							0			
Animals	Cows	0	0	0	0	0					0	0	0		
	Pigs	2	3	1	0	7					0	0	13		
	Goats	0	0	0	1	4					0	0	5		
	Turkey	2	1	4	4	5					2	2	20		
	Chicken	0	10	10	10	100					10	10	150		
Duck	0	0	4	0	1						0	0	5		
Finished Products	Bread	0	0	0	0	0						200/week	200		
	Cheese	0	0	0	tofu	0					0	0			
	Clothing				1/weel	1/4days									
Honey (bee hive)	0	0	0	0	0						2	0	2		

Figure 1: Current San Francisco Organizational Chart

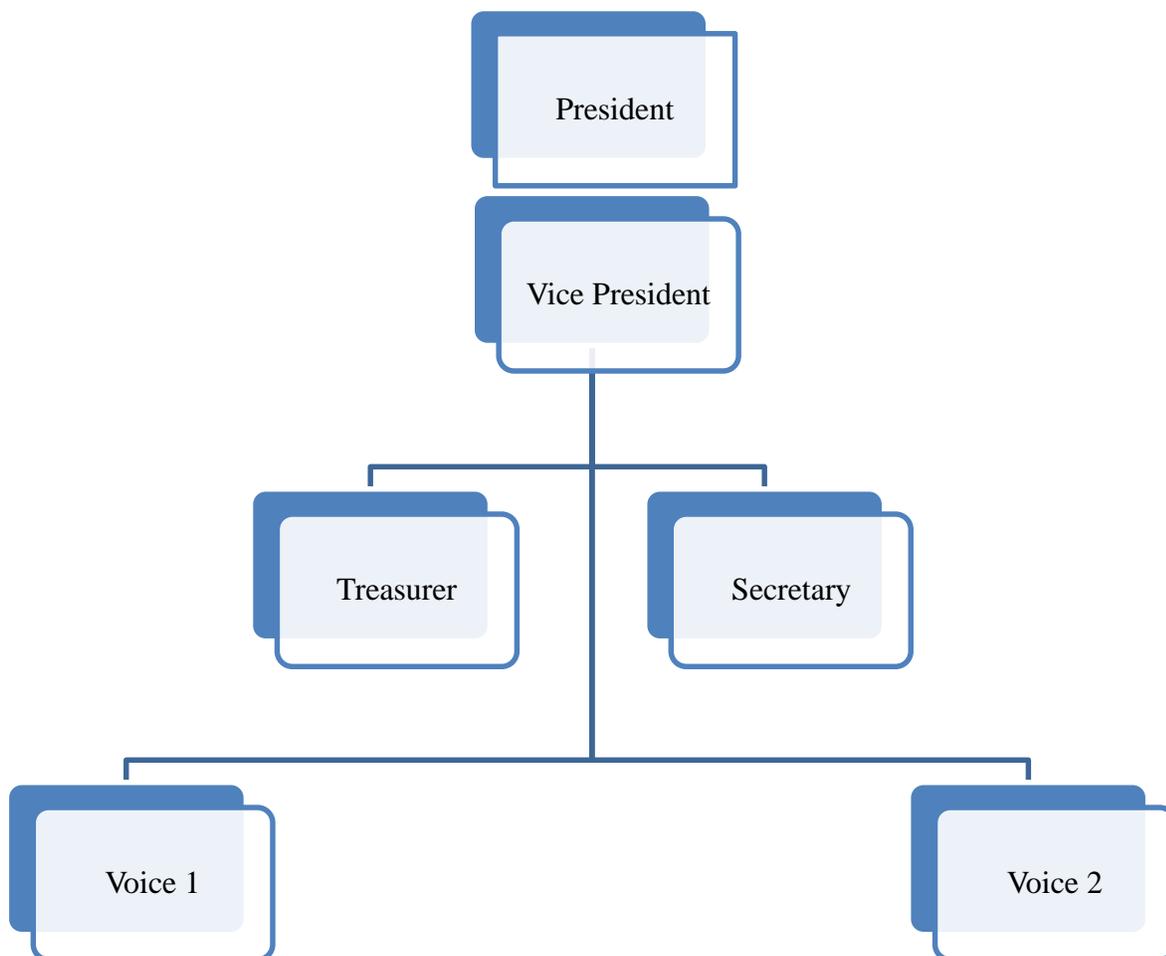


Figure 2: Extended Organizational Chart

