University of Minnesota Masters in Development Practice Student Field Experience Work for Rainforest Alliance, Guatemala May 2017 - July 2017

Cody Raasch, Franklin Zumba-Deleg, Katrina Becker

Table of Contents

- 1. Acknowledgements
- 2. Executive Summary
- 3. Introduction
- 4. Xate
  - a. Interviews / Success Stories
  - b. Church Survey
  - c. Marketing Materials
  - d. Cost Analysis Tool (forthcoming?)
  - e. Recommendations
- 2. Ramon Seed
- a. Interviews / Success Stories
- b. Market Analysis
- c. Marketing Materials
- d. Cost Analysis Tool
- e. Recommendations
  - 2. Conclusion
  - 3. Appendix
- a. Interview Questions and Transcripts
- b. Success Stories
- c. Xate Marketing Materials
- d. Ramon Marketing Materials
- e. Ramon Cost Analysis Toolkit

Acknowledgments:

Our work was largely dependent on the kindness, openness, and assistance from many different individuals both in the US and in Guatemala. We would like to thank the many different people that have helped our project in Guatemala be as successful as it was.

First off, we would like to thank Dean Current, the University of Minnesota, and the MDP program for providing the opportunity and assistance that allowed this project to exist.

We would also like to thank the communities of the Peten for welcoming us into their homes and workplaces and allowing us to conduct our research and inquiries. Special thanks to ANSA, AMUL, OMYC, AFICC, and the Ramon and Xate committees for taking time to work with us, and the communities of Uaxactun and Carmelita. Our work would not have been possible without the kindness and openness of those that we interviewed.

Lastly we would like to thank Rainforest Alliance Guatemala for all the help and support that was provided to us during our stay. The entirety of the staff was incredibly helpful in giving us guidance, assistance and support that was needed for us to complete our work. In particular, we would like to thank Juan Trujillo, who was an excellent form of support, guide, and friend. Additionally, the work of Manuel Manzanero and Cesar Mendoza provided the foundation of our background information on the ramon seed and helped guide us in our work.

Executive Summary:

As part of the Master's in Development Practice degree, a team of students from the University of Minnesota spent their summer "field experience" in the Peten region of Guatemala working with the Rainforest Alliance's USAID-funded Climate, Nature, and Communities in

Guatemala (CNCG) Initiative. The students that completed this work were Franklin Zumba-Deleg, Katrina Becker, and Cody Raasch. This report contains a summary of the research and work of the students, who worked in the Peten from May 17th to July 24th 2017. The work was primarily completed to aid in the production and marketing of Non-timber Forest Products in the Maya Biosphere Reserve, as part of the CNCG initiative.

After meetings with Rainforest Alliance staff, the Association of Forest Communities in the Peten (ACOFOP), ANSA, AMUL, and both the xate and ramon committees, the MDP team set objectives and a workplan for the summer, focusing specifically on two Non-Timber Forest Products, xate (palm leaves) and ramon seed. The MDP team then conducted interviews with community members working with xate and ramon, wrote impact/success stories from these interviews, conducted a brief market analysis for xate and ramon, created marketing materials based on this analysis, and developed a cost analysis toolkit.

This report is divided into two distinct sections. The first section centers on the Team's work with xate (palm leaves), and the second focuses on the ramon seed.

Xate, a type of palm common in the Maya Biosphere Reserve, is sustainably harvested and has provided income and work opportunities for many individuals, particularly women, living in the concession communities. Our work with xate involved interviewing xate harvesters and packagers, surveying U.S. churches, and creating marketing materials based on the results of that survey. Additionally, the cost-tracking toolkit developed for businesses selling ramon seed products was adapted for use by xate producers.

The Ramon Seed, or "Maya Nut" (also called breadnut), comes from trees common in the Peten region and is gaining popularity as a nutritious additive to various foods and drinks. The seeds fall to the ground and can be dried and ground up into a powder, which is used as a coffee substitute and in flour (among other things.) Ongoing inquiries into the marketability of the Ramon seed have been far reaching, including the nutritional content, foreign market penetration, and yearly forest yield. Our team focused on supporting local businesses producing ramon seed products, including analyzing local markets, creating marketing materials, and developing a cost analysis toolkit.

All of the materials developed by the team are included in the appendix of the report. Both sections of the report include recommendations for future development and research of xate and ramon products.

#### Introduction:

As part of an ongoing relationship between the University of Minnesota and Rainforest Alliance Guatemala, our team of Masters of Development Students began working with the Rainforest Alliance to support their Climate, Nature, and Communities in Guatemala initiative in the Peten on May 17th, 2017. This field work focused on the marketing and production of several non timber forest products (NTFP), including Ramon seed, xate, chicle, and allspice. As the project began, the scope of project quickly tightened to mainly focus on the ramon seed and xate.

The form of the the research was multifaceted in nature. In the beginning of the project, several meetings took place with the major stakeholders in the region. This included Rainforest Alliance, ACOFOP (Association of Communities of the Forests of Peten), the Ramon Committee

and the Xate Committee. Quickly, trips to the communities of the MBR were scheduled, and interview questions developed. During our time in the Peten, our team interviewed 33 people from the communities of Carmelita and Uaxactun, and the organizations ANSA, AMUL, and AFICC. These interviews were used both to guide our project and to develop the stories and marketing materials that we were tasked with creating.

Our team developed a survey that was sent to churches in the United States in order to better understand what marketing materials and information would most motivate churches to buy eco-palms produced in the Peten. This survey was sent to over 100 churches across the United states, and while the response rate to the survey was low (18 responses), it did provide helpful insight for our team to develop marketing materials. We hope that this research can be expanded in future years to further increase the market-share of eco-palms.

The need for a toolkit to help calculate the costs, revenues, and target production of Ramon products was quickly identified during our initial meetings, as well as the need for an updated analysis of the operational costs of ANSA and AMUL. Our team quickly got to work developing a simple excel sheet that could automatically calculate the costs, profits, and break-even points for different products. We utilized previous operational costs estimates conducted by Agencia Alemana de Cooperación Internacional (GIZ), as well as new information conducted through interviews with members of ANSA to create a new break-even analysis for the organization. Due to conflicts in scheduling, we were not able to develop an analysis of the costs for AMUL, but did develop a similar toolkit for their future cost tracking.

While an initial goal of our project involved market research for Ramon products in the United States, this quickly fell beyond our scope, due to a lack of time and resources. As well, the difficulty of inconsistent Ramon seed production proves to be an ongoing problem for marketing Ramon in the United States on a large scale. Currently research is being conducted that should hopefully provide reliable data for consistent Ramon production. Instead, research was conducted within the area of Flores and Santa Elena, to better understand local markets for Ramon products. In ways, this provides a first step for marketing penetration in the United States. Flores is an area of high tourist activity, and selling Ramon products to tourists can create product awareness for future exportation of Ramon products to the United States.

While our stay in Guatemala was brief, we hope that the materials that we provided to Rainforest Alliance and the communities of the Peten provide a lasting impact. Xate

Xate, or Eco-Palms as they are known in the U.S., are one of the original non-timber forest products that the Rainforest Alliance has worked with in the Peten region. Xate palms are abundant in the Maya Biosphere Reserve and can be harvested year-round, so they are a main source of income for many families in the Peten. The palms are carefully selected and sustainably harvested, which helps protect the forest. Once cut, they are cleaned, sorted, and packaged (providing jobs for women) and then shipped to floral companies and churches in the United States.

Communities in the Peten have been collecting xate to sell to churches and floral companies in the United States since 2005, when the University of Minnesota's Center for Integrated Natural Resources and Agricultural Management and the Rainforest Alliance began the Eco-Palms project. The project started small, with just a few churches purchasing Eco-Palms (xate) for Palm Sunday. Now, over 5,000 churches in the U.S. and Canada are buying Eco-Palms, with the help of Lutheran World Relief and Continental Floral Greens.

In the last 12 years, xate has grown to be a primary source of income for many families living in rural communities in the Peten. Typically the palms are harvested by men, but the increase in sales has brought with it a need for more people working on cleaning, sorting, and packaging the palms, which is done by women. Thus, the sale of xate has created many employment opportunities for women in these communities, where before there were few to none.

# Interviews / Success Stories:

Our initial work with the producers of xate involved conducting 23 informational interviews with xateros, selectors, quality controllers, packagers, managers and people working in the administrative level. These interviews were conducted in Uaxactun, AFICC, and Carmelita, all major producers of xate in the Maya Biosphere Reserve. After conducting these interviews, our team transcribed the recorded interviews in both Spanish and English. These transcriptions were then used to develop the marketing materials for xate and eco-palms.

# Church Survey:

In order to guide the development of the marketing materials for xate, our team developed and distributed church survey, designed to gauge the general interests and motivations of churches. This survey recorded the demographic information of churches (location and size of church), as well as general attitudes towards eco-palms. The survey included several pictures that the respondents were asked to rank, in order to capture which pieces of media would be most compelling in a marketing campaign.

The survey was distributed to over 100 churches, via email. The churches were chosen semi-randomly, through a process of searching for personal emails of churches throughout the contiguous United States. While the response rate of the survey was relatively low (18%), the 18 responses were still informative in helping develop the marketing materials for xate.

While the study was not designed to be a statistically significant representative of churches in the US, the results were still interesting. Of particular interest, 65% of church leaders stated that they were not aware of eco-palms, and 78% percent stated that they would be more likely to buy eco-palms if they knew they would receive information about what improvements their money helped the community to buy. Also importantly, personal stories about improvements in livelihoods, and pictures of women working with xate were the marketing materials that church leaders rated as the most important.

While this survey was not a statistical sample of churches in the US, the information was still helpful for the development of marketing materials for xate.

# Marketing Materials:

The marketing materials developed for xate were primarily aimed at Churches in the United States, however are designed so that they could be used to market to churches, businesses, and families. Examples for the marketing materials are included in the Appendix (section X-Y). The marketing materials were developed in both Spanish and English, and are planned to be distributed to Rainforest Alliance, ACOFOP, Lutheran World Relief, and other organizations to help increase the market share of xate in the United States. The stories, pictures, and information collected by our team can also be used to develop and update the current marketing materials for future years.

# <u>Toolkit:</u>

A toolkit was developed for the organizations AMUL and ANSA, to help keep track of costs and profits, as well as calculate the break-even point of specific products. A simplified version of the toolkit was developed for use by the communities that sell xate. Further work is likely needed to adapt this toolkit for efficient use by the communities.

### Recommendations:

 Increase promotion to U.S. and Canadian churches - utilize Lutheran World Relief for connections to churches, strengthen partnerships with other sects • Diversify products - are there different types of xate that would be appealing to consumers? Explore other handmade items (such as Thanksgiving centerpieces) that could be sold through existing channels (i.e. Continental Floral Greens) and can generate income year round

Low Risk: Medium Risk: High Risk:

### Ramon

Ramon seed, also known as "breadnut" or "Maya Nut", is a seed native to the Maya Biosphere Reserve. The seeds grow on Ramon trees (Brosimum alicastrum) and fall to the ground, where those that aren't eaten by animals are collected by local communities. Traditionally a staple of the Mayan diet, ramon seeds are very nutritious, high in calcium, antioxidants, magnesium, potassium, and folate. Similar to coffee beans but naturally caffeinefree, ramon seeds can be ground up into a powder and used in drinks or flour, or they can be boiled whole and eaten like mashed potatoes. Through the CNCG initiative, the Rainforest Alliance has provided technical assistance to a few local businesses selling ramon seed products - Alimentos NutriNaturales, S.A. (ANSA) and Asociacion Muralla de Leon (AMUL).

## Interviews / Success Stories:

Following a similar fashioin as our interviews with xate workers, our team conducted (HOW MANY) informational interviews with ramon collectors, processors, toasters, managers and people working in the administrative level. These interviews were conducted in Uaxactun, which is a major collector of Ramon, was well as ANSA and AMUL, to major producers of ramon products in the Maya Biosphere Reserve. After conducting these interviews, our team transcribed the recorded interviews in both Spanish and English. These transcriptions were then used to develop the marketing materials for Ramon products, understand the market for ramon, and to develop a cost-analysis toolkit for ANSA and AMUL.

#### Market Analysis:

Initially a market analysis for Ramon products in the United States was proposed as an area for our team to do work. However, while a study is currently being developed to better understand the forests production capacity for Ramon seed, the problem of inconsistent production of ramon seed has yet to be solved. It was shown that without a steady production of ramon seed, the entry of Ramon products to the United States would be difficult.

Instead our team conducted informal interviews with restaurants and stores in the Flores area. These interviews were intended to help our team understand how the local market see's Ramon products. As Flores is a tourist area, selling Ramon products to tourists has the added benefit of increasing consumer awareness of the product if and when the product begins to be sold in more lucrative foreign markets.

In general, our inquires into the local market showed that several stores were interested in selling ramon, they did not always have a solid estimate for how much they sold. All of the stores that sold ramon products were interested in having ramon marketing materials, as they stated those materials would help them sell the products. Just as well, restaurants stated that they at times produced ramon products in the past, but often found it difficult to purchase ramon flour, as they did not know who to contact. This helped our team develop business cards for members of ANSA, so that restaurants would have direct contact information that they could use to by product. The recommendations developed from these interviews is continued the recommendations section.

#### Marketing Materials:

Utilizing some of the opinions of our teams market analyse, our team developed a series of marketing materials aimed to help the local sale of ramon products. These marketing materials were developed in both Spanish and English, so that they could be aimed both at locals and tourists in Flores.

Generally these marketing materials highlighted a couple of different elements that surround ramon products. Several of the marketing materials highlight the plethora of health benefits that are associated with the consumption of Ramon products. These marketing materials are especially helpful because of the growing market for health products in the United States and in the world, as well as the fact that these marketing materials can be adaptive for several different ramon producing organizations.

Other marketing materials highlighted the production of ramon by specific organizations. These materials, for example, highlighted the fact the ramon provides economic opportunities for women, or that these products are produced by an all women organization (ANSA).

### Cost Analysis Toolkit:

\_\_\_\_\_The need for a toolkit to record the costs and incomes for ramon selling organizations was quickly identified as a strong need, both by our team and by members of ANSA and AMUL. Our team quickly got to work building an excel sheet that could be used by community or cooperative members to record the current operational costs for the organization. Up until that point, these costs and profits were either recorded on paper or memorized by organization members. This toolkit was then used to apply the costs and incomes recorded by ANSA December 2015, in order to analyze their operational costs.

While the toolkit was designed to be simple, it does use several different excel sheets and formulas in order to calculate the break-even point for different products. Despite these formulas, the excel sheet only requires the user to fill in several categories to complete the sheet, and most of the totals (both for costs and profits) are calculated automatically). Just as well, the title sheet for the excel document includes a introduction page which explains both how to use the excel sheet and the general concepts behind things like fixed and variable costs.

This toolkit was developed by our team and presented to ANSA, who provided feedback on how to improve the sheet. The finalized version includes those changes, which includes a sheet that calculate the costs, productions, and profits for different categories on a monthly basis.

Recommendations:

- Consistent/collective supply/inventory will allow for international market penetration
- More, consistent sales in Flores coordinate a meeting with shopkeepers and restaurant owners in Flores, provide business cards with main point of contact for sales (whether it be just for ANSA or for the whole committee), provide other marketing materials to accompany the product on display in the stores & in menus
- Updated labels with barcodes for all products in order to enter local markets
- Utilize the cost tracking toolkit to maximize profit and sales and minimize costs

Low Risk:

- Utilize the New Cost-Tracking to to have better understand the full costs and profits for ramon production, and to have a more accurate estimate of break-even costs and the what if's of production.
- Update barcodes and labels for all products to enter local markets and prepare for international markets
- Provide business cards with a centralized contact person for ramon products, to establish relationships between sellers and producers of ramon.
- Continue to record the supply of ramon seed to better understand the current forest yields of products.

Medium Risk:

- Set a weekly schedule for deliveries for ramon products to shops and stores in flores. This will allow stores to more regularly sell products and will illustrate to stores that supply of ramon products is fairly consistent, allowing them to add items to the menu.
- Coordinate a meeting with shopkeepers and restaurant owners in Flores, provide business cards with main point of contact for sales (whether it be just for ANSA or for the whole committee), provide other marketing materials to accompany the product on display in the stores & in menus

High Risk:

- After the results of the ramon production study are released, develop a plan to market ramon products directly to the United States.
- Research the possibility of creating ramon plantations in order to increase and stabilize the supply of ramon products.

Conclusions