Qualitative Data Analysis Report:

An analysis of the company's mission statements and interviews for the development of Non-Timber Forest Products in the United States market

Authors: Luiza de Almeida Lucena (<u>lucen017@umn.edu</u>)¹, Allison Richards (rich1557@umn.edu)²

Advisor: Dean Current

¹M.S. student in Natural Resources Science and Management, University of Minnesota; and ²B.S. student in Applied Economics & Environmental Science, Policy, and Management, University of Minnesota







Introduction

Studies over the past two decades have demonstrated that despite the potential to improve livelihoods and conserve forests, particularly tropical rainforests, a consistent number of Non-Timber Forest Products (NTFPs) are also economically important (Jensen, 2009; Shackleton et al., 2011; Endamana et al., 2016; Ojea et al., 2016; Shackleton & De Vos, 2022;). Nevertheless, only a few generate the majority of the value in most contexts (Jensen, 2009). Although significant research has been carried out on value chain analysis and consumer preferences, there has been no detailed investigation of which attributes influence the trade of NTFPs into different markets (Shackleton & De Vos, 2022) and which attributes the companies value when exploring work with NTFPs. It indicates a need to understand the various preferences of businesses and consumers that impact the introduction of NTFPs into their product lines.

This report compares the qualitative analysis of 18 interviews conducted with companies in the United States and their mission statements. The authors analyzed the interviews and mission statements to identify companies' commitments to sustainable supply chains and social-environmental attributes of business practices to determine the best approach to promote NTFPs from the Maya Biosphere Reserve (MBR) in the United States (U.S.) market to support conservation and livelihood improvements in Northern Guatemala's MBR.

The qualitative interview and mission statement analysis aim to identify trends for NTFPs in the U.S. market and potential social-environmental attributes linked to natural products. They are aimed to:

 Gather and analyze data from over 2800 companies attending the Natural Products Expo West 2022

- Select companies aligned with the social-environmental attributes of NTFP from the MBR
- Identify connections between companies' mission statements and interviews
- Identify social-environmental attributes of companies' practices
- Use results from the data analysis to guide the next steps of the research

Research Questions

- 1. What are critical attributes to expanding market opportunities for Non-Timber Forest Products in the United States?
- 2. Are natural product companies positioning sustainability as a key attribute in the development of new market products?

To reach these answers, we analyzed what companies report about product attributes, sustainability, product development, issues related to working with a sustainable supply chain, certifications, and marketing strategies.

Moreover, this approach allows for drawing initial findings and hypotheses concerning the development of markets for NTFPs and sustainability commitment among companies. Additionally, the researchers paid attention to product-specific attributes that appear to impact how the products are produced, processed, analyzed in terms of quality, impact, and market potential, and inserted into the U.S. market.

Methodology

This report presents the findings of the qualitative comparative analysis and consists of a series of semistructured interviews with 18 U.S. companies that attended the Natural Products Expo West 2022 and their respective mission statements.

Research Design

The qualitative component is to be interpreted in a mixed-method research design pilot project (Kelle 2006: 08), consisting of a subsequent series of 18 qualitative interviews with selected companies and their respective mission statements. The rationale behind the qualitative component of the study was to provide more in-depth and more contextualized insights into how companies are making decisions on sustainable products development.

Data Collection

The study was carried out with companies working with sustainable supply chains in the United States. The authors searched for companies present in the Natural Products Expo West 2022, a leading trade show in the natural, organic, and healthy products industry, to identify potential companies to be interviewed. The authors have selected companies based on their attributes, values, and missions.

Further, the authors searched for "keywords" on mission statements on their websites.

Non-Timber Forest Product	Categories	Keywords
Allspice	Bulk Grocery (baking; herbs & spices), Condiments, Diet & Nutrition (herbal supplements), Oils & Salad Dressings; Raw Ingredients; Sauces, Spices & Seasonings; Special Attributes	Pepper, black pepper, spice, spicy
Honey	Organic Exhibitor	Honey
Ramón Seed	Bakery; Baking goods; Cereal and Breakfast Foods; Diet & Nutrition;	Gluten-free, organic, environment, social impact,

Non-Timber Forest Product	Categories	Keywords
	Raw Ingredients; Snacks, Cookies &	brewing, tea, coffee substitutes,
	Candy	brewing

After selecting the potential companies, the second step was to contact the companies through email to schedule an interview during the Natural Products Expo West 2022. An interview protocol was developed and used to interview de companies (Attachment A). A total of 18 companies were interviewed at the trade show.

Research ethics

All interviewees gave their explicit consent to be interviewed and audio-recorded. They were informed of the context of the study and the use that would be made of their data.

The interview data were anonymized in such a way as to make sure neither the respondents themselves nor other people they are referring to in the interview cannot be identified. The interview transcripts contain no information allowing to link back the interview data to the survey responses of the interviewee.

Finally, this study was subjected to a determination form through the University of Minnesota's <u>Institutional Review Board</u> (IRB), and the activity is considered "Research not Involving Human Subjects."

Data Analysis

In the first coding cycle, the authors utilized In Vivo Coding to attune participants' language and perspectives (Saldaña, 2013). The second cycle of interview coding was conducted on the basis of descriptive coding (also called "Topic Coding"), following the approach suggested by Saldaña (2013). This type of coding consists of a summary

in a word or short phrase – most often as a noun – of the basic topic of a passage of qualitative data.

The coded segments were then grouped and synthesized 'up' into more general themes, which get linked to more general codes and subcodes (**Figure 1**).

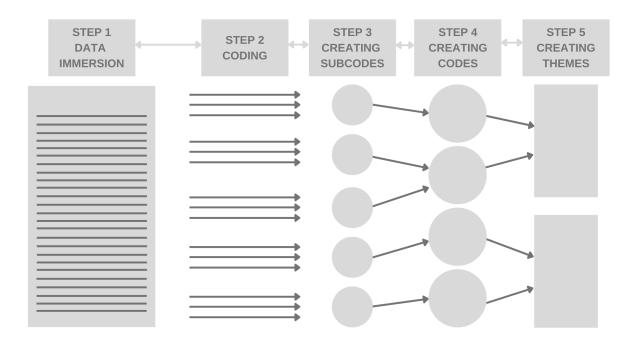


Figure 1 - Data Coding Process; In Step 1, the authors immerse themselves initially in the data to acquaint themselves with the participants' language and perceptions; In Step 2, the authors begin to code the data by applying the descriptive code approach (Saldaña, 2013); In Step 3, the authors create subcodes In Vivo in the first cycle of code. In Step 4, the authors create codes as categories that are further incorporated into themes in the second cycle of codes.

The data was further analyzed in frequency counts, which consists of counting the frequency of coded segments or units in each category and can help identify which themes, ideas, or domains were shared and which rarely occurred (LeCompte & Schensul, 2010).

Code system and test coding

The investigation was performed in two steps, with deductive and inductive coding (also called "hybrid" coding, cf. Fereday & Muir-Cochrane 2006). The coding system (together with the categories and topics that resulted from the coding process) was

created over time and in collaboration. The following categories were included in the final coding system:

Themes	Мето
Attributes	Properties that describe a product. They include details that are tangible and intangible, subjective and objective. All of this information enables shoppers to find, compare and choose products.
Challenges	Refer to the constraints that businesses face when working with a sustainable supply chain.
Consumer Preferences	Consumer preference is defined as the subjective tastes of individual consumers, measured by their satisfaction with those items after they have purchased them. This satisfaction is often referred to as utility.
Decision-makers	People and the company's teams that are involved in the process of new product search and development.
Marketing Strategies	A marketing strategy refers to a business's overall game plan for reaching prospective consumers and turning them into customers of their products or services. A marketing strategy contains the company's value proposition, key brand messaging, data on target customer demographics, and other high-level elements.
Product Development	Process involves the development of new products in a company, and what types of products the companies buy
Sustainable Supply Chain	Refers to companies' efforts to consider the environmental and human impact of their products' journey through the supply chain, from raw materials sourcing to production, storage, delivery and every transportation link in between.

Each of these categories had a number of subcategories and codes. The most important category was "attributes." The category "decision-makers" was created for

the people to be contacted to collect additional information that could help interpret the information coded under the themes.

Overview and summary of the results

The frequency and rank order of themes for the 18 participants responses are reported in **Figure 2**.

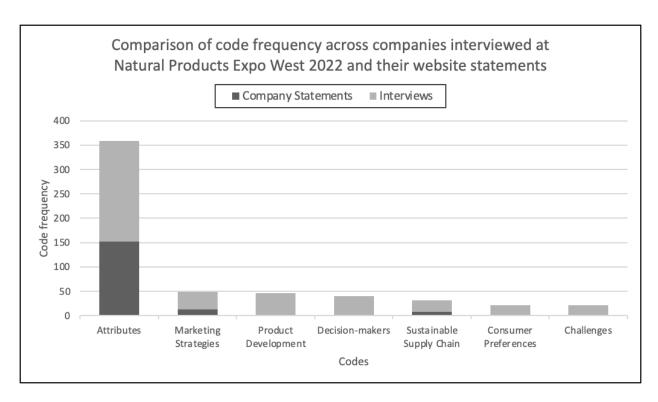


Figure 2: Frequency of the themes among the interviewed companies and their respective website mission statements.

The theme "attributes" itself produced 152 mentions in company statements and 207 mentions in interviews, by far the most often used code, suggesting that 'Attributes', as well as its codes and subcodes, was an important issue for respondents. Other codes with high numbers of mentions were 'Market Strategies' (13 mentions in company statements; 36 mentions in interviews), 'Product Development' (0 in company statements, 46 in interviews), and 'Decision-makers' (0 mentions in company statements, 40 mentions in interviews); While other themes such as

'Sustainable Supply Chain', 'Consumer Preferences', and 'Challenges' were found rarely in most of the interviews and company statements.

'Attributes' and 'Marketing Strategies' are often interconnected and hard to distinguish. For instance, when functionalities are mentioned as a marketing strategy or a certification is used to make some appeal among consumers, etc. In many cases, these two themes were analyzed together, since the connection proved to be strong. The following quote is an example of 'Attributes' and 'Marketing Strategies' merge:

We see that as a must, that the pure attribute peak somebody's interest, and you might just get some sales off of that, but then oftentimes you have to communicate to the customer more in-depth of like "Hey, what does that actually look like in terms of how you use the product?" And then perhaps just the more general lifestyle benefits that you get out of that.

Attributes

All the participants mentioned 'Attributes,' and the transcription referred to 'Nutritional Attributes,' 'Sustainability Attributes,' 'Functional Attributes,' 'Clean Ingredients', and 'Price' (Figure 3).

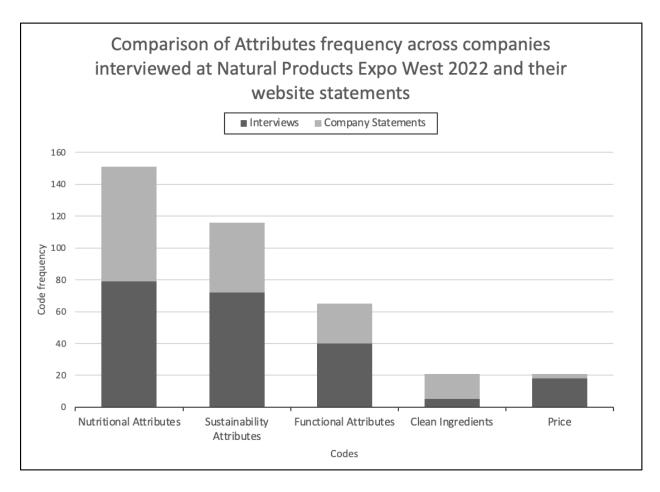


Figure 3: Code frequency of the theme "Attributes" among the interviewed companies and their respective website mission statements.

The majority of the respondents used the theme 'Attributes' to describe 'Nutritional Attributes' (72 mentions in company statements, 79 mentions in interviews).

Nutritional Attributes

'Nutritional Attributes' is a predominant category in all companies and for the majority of the interviewees and statements. The analysis shows different aspects of this specific attribute, including gluten-free certification, dairy-free, plant-based certification, and so on (complete list in **Figure 4**).

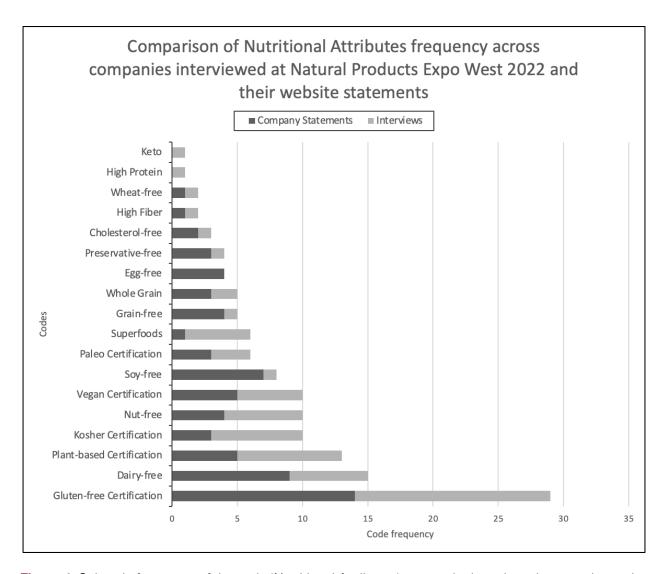


Figure 4: Subcode frequency of the code 'Nutritional Attributes' among the interviewed companies and their respective website mission statements

'Gluten-free Certification' is the most frequently sub-code found both in the interviews and statements data (14 mentions in company statements, 15 mentions in interviews). Other subcodes with high frequency are 'Dairy-free' (9 mentions in company statements, 6 mentions in interviews), and 'Plant-based Certification' (5 mentions in company statements, 8 mentions in interviews); While 'High-protein' and 'Keto' are found rarely in the interview data, and never found in company statements. Both in the interviews and statements, 'Nutritional attributes' are shown to have a considerable appeal as a "healthy product", or a specific appeal for a targeted group with some form

of food intolerance (gluten/wheat, dairy/milk, nut/peanut, meat, and so on). The following quotes are examples of the context within which 'Nutritional Attributes' are mentioned in the interview:

"So we're looking for vegan, Cholesterol-free, anything **healthy** for the body, so it's not just a regular snack, but it's also good for you. And it's also **healthy**, non-GMO, gluten-free, preservative-free, and wheat-free."

"If you take the two biggest **allergens**, it's nuts and dairy. And so this can go in a lunchbox to school without thinking about... Throwing the lunchbox, throw it in the hockey bag. Like it goes everywhere. It's super portable, and it's **better for you**."

Sustainability Attributes

The code 'Sustainability Attributes' received 44 mentions in company statements and 72 mentions in interviews, suggesting that sustainability is a crucial attribute of a product. The context within sustainability was mentioned in the transcriptions as companies' commitment to sustainability (social responsibility, environmental responsibility) and the certifications tighten to it (**Figure 5**).

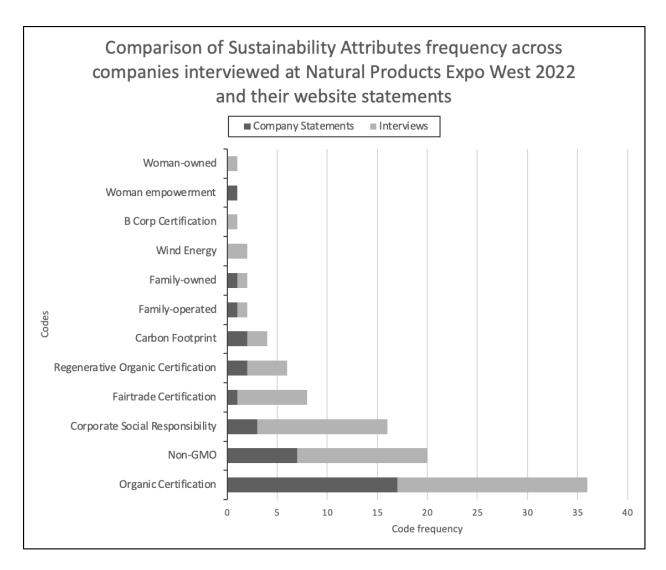


Figure 5: Subcode frequency of the code 'Sustainability Attributes' among the interviewed companies and their respective website mission statements

For both statements and interviewees, the data suggests that 'Organic Certification' is the most relevant certification for the consumers/business/partners according to companies, with received 17 mentions in company statements and 19 mentions in interviews. Other subcodes with high frequency are 'Non-GMO' (7 mentions in company statements, 13 mentions in interviews) and 'Corporate Social Responsibility' (3 mentions in company statements, 13 mentions in interviews); While 'B Corp

Certification', 'Woman empowerment' and 'Women-owned' are rarely frequent in the data.

Functional Attributes

'Functional Attributes' is also a frequent code that produced 25 mentiones in company statements and 40 mentions in interviews (**Figure 6**).

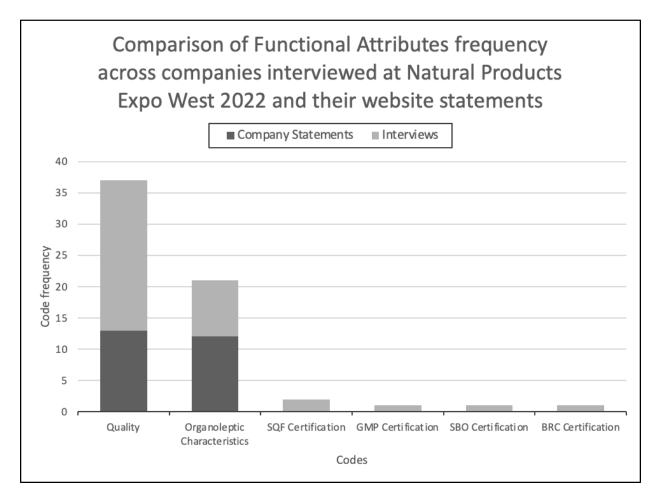


Figure 6: Subcode frequency of the code 'Functional Attributes' among the interviewed companies and their respective website mission statements

'Quality' is the most frequent sub-code among companies' statements and interviews (13 mentions in company statements, 24 mentions in interviews), and even the certifications mentioned in the transcriptions (SQF, GMP, SBO, BRC) are to guarantee the quality standards of the products. Another frequent attribute is 'Organoleptic Characteristics' (12 mentions in company statements, 9 mentions in interviews) are

often described as taste and texture and are reasonably frequent in companies' statements and interviews, as the participant describes:

"So we're looking for vegan, Cholesterol-free, anything **healthy** for the body, so it's not just a regular snack, but it's also good for you. And it's also **healthy**, non-GMO, gluten-free, preservative-free, and wheat-free."

Attributes by Non-Timber Forest Products

The following synthesis and interpretation of 'Attributes' are based on companies' product lines that align with the three NTFPs presented in **Table 1** (Allspice; Honey; Ramón seed).

Allspice

Of the 18 companies interviewed, four develop products with all spice (ingredient or raw material) or similar products. **Figure 7** shows the frequency of codes found in the data of the companies that work with all spice:

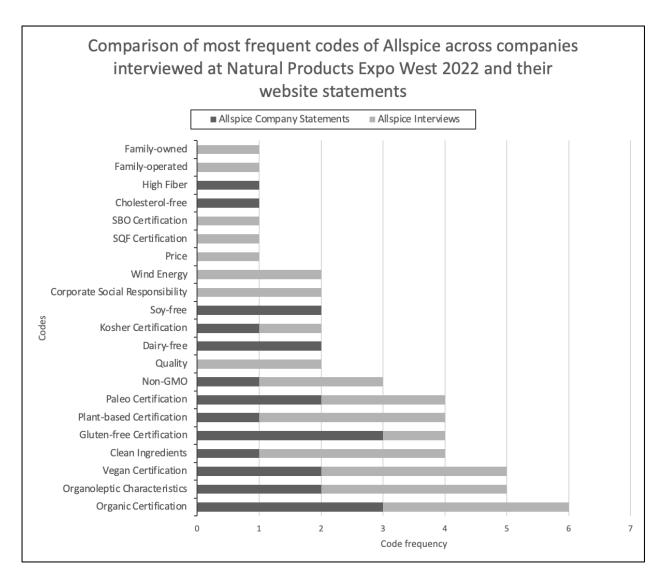


Figure 7: Subcode frequency of the companies working with allspice or similar products and their respective website mission statements

'Organic certification' is the central subcode found in both interviews and companies' statements related to allspice, mentioned six times in company statements, and 24 times in interviews; Followed by 'Organoleptic Characteristics', producing two mentions in company statements, and three mentions in interviews. Another frequent subcode was 'Vegan Certification' (2 mentions in company statements, 3mentions in interviews). From the codes found, the 'Corporate Social Responsibility' actions seem

to be more highlighted in the interviews than as a company statement. The participants mentioned 'Corporate Social Responsibility' actions as:

So we do care about fair trade. Our beekeepers are also getting paid for each product we sell as a final ingredient. We support them by means of acute ones. They need to improve their business.

And it's all about superfood, and our mission and our purpose are supporting people, farmers, and the planet. That is part of our foundation, part of everything we do.

For companies working with allspice or similar products, 'Nutritional Attributes' is the most frequent code, suggesting that this is a key attribute for participants, producing 26 mentions considering the sum of subcodes.

Ramón Seed

From the companies interviewed was developed the sub-code frequency of seven companies that have the potential to develop products with ramón seed as an ingredient or raw material (Figure 8).

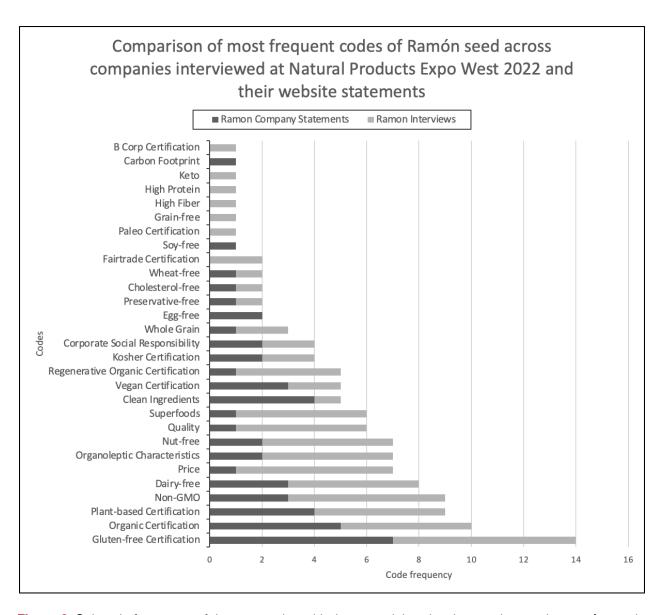


Figure 8: Subcode frequency of the companies with the potential to develop products using ramón seed and their respective website mission statements.

Overall, the results (shown in **Figure 8**) suggest that 'Gluten-free Certification' is the central subcode found in interviews and companies' statements with the potential to develop products with Ramón seed (7 mentions in company statements; 7 mentions in interviews).

'Organic certification' also has a high number of frequency in the data, producing five mentions in company statements and five mentions in interviews. Aside from those two sub-codes, the results also suggest that 'Plant-based Certification' is an essential Attribute for companies (4 mentions in company statements; 5 mentions in interviews) and 'Non-GMO,' producing 3 mentions in company statements and six mentions in interviews.

According to the data, 'Nutritional Attributes' is the central code for companies with the potential to develop products with ramón seed, with a total of 80 mentions if considering the sum of subcodes.

Honey

From the eight companies working with Honey has generated a frequency of sub-codes that emerged from the data, as illustrated in **Figure 9**:

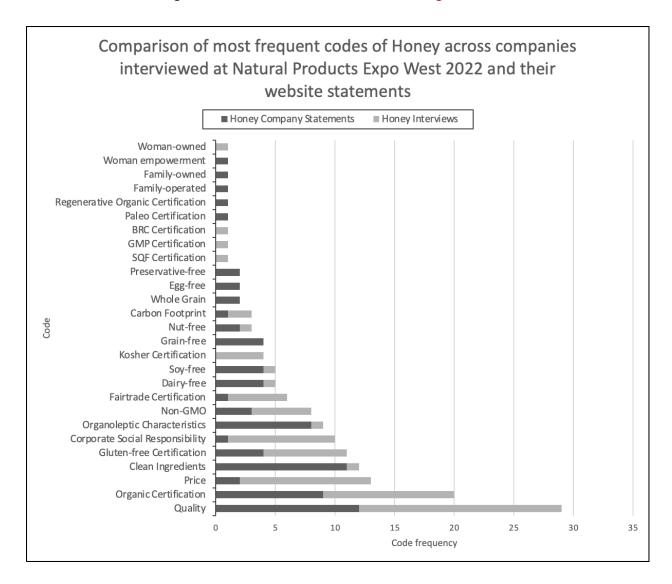


Figure 9: Subcode frequency of the companies working with honey and their respective website mission statements.

According to the analysis illustrated in **Figure 9**, 'Quality' is the most frequent attribute in the interviews and their statements (12 mentions in company statements; 17 mentions in interviews); Similarly to allspice and ramón seed, 'Organic Certification' is a high-frequency sub-code producing nine mentions in company statements and 11 mentions in interviews.

Unlike other NTFPs, Honey companies demonstrate to value 'Price' as a critical attribute (2 mentions in company statements; 11 mentions in interviews). It is relevant to pinpoint those honey companies highlighted in interviews certifications to support quality assurance; those are named 'BRC Certification', 'GMP Certification, and 'SQF Certification'.

Overall, 'Sustainability Attributes' is the most frequent code (considering the sum of subcodes) among honey companies totalizing 45 mentions to 'Sustainability Attributes'.

Marketing strategies

The general frequency of subcodes found in 'Marketing Strategies' (companies statements and interviews) are illustrated in **Figure 10**:

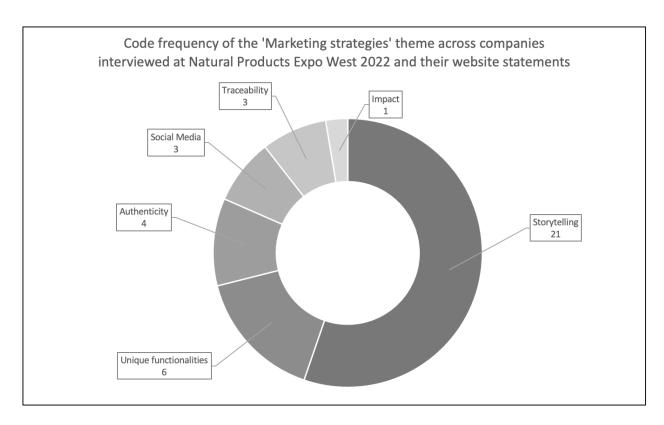


Figure 10: Code frequency of the theme 'Marketing Strategies' among the interviewed companies and their respective website mission statements

'Storytelling' is from far the most frequently used code among participants, producing 21 codes; It suggests that this code is a critical marketing strategy utilized by companies to advertise their products and services. One participant described storytelling as:

So when you sell a product like this, we want to talk about it in the context of how is it traditionally used. What is the culture that it comes from? What is this mean to those people? What does it mean? Versus like "Hey, we're this mega-corporation selling the one-seat commodity, blah, blah, blah". We presenting it in the way that seemed "Hey, we're working with those communities, they're critical part of the supply, we want to honor that, want to tell their story and make sure it's authentic" and like "how are they using it?" Versus just putting in the package.

'Storytelling' and 'Authenticity', as noticed in the quote above, are often interconnected. The same happens with 'Unique functionalities', 'Social Media', and 'Impact'. In many situations, these codes were evaluated together since the correlation was substantial.

Product Development

This specific section was developed to understand the process of a new product development in a company, and what are the decision-making processes related to it. One of the respondents described it as:

Looking at the market, see what products there are enough organic options. So originally we just started doing mustards, and then we started looking into the market for cocktail sauce. For example, there weren't many organic options for cocktail sauce. It gave us the inspiration to go out and make a cocktail sauce and we had the capabilities to do it. So we're like, "why not?". And so that's how we expanded our line from just mustards to pretty much every condiment you can think of.

Only two companies showed interest in developing products with 'new tastes', and 'new ingredients' regardless of market research. Most companies are driven by consumer preferences, market search, and price viability, and it heavily relies on data.

Decision-makers

The 'Decision-makers' theme was developed to analyze who makes decisions for the company about product development, and who is responsible for actually developing new products. The following is a list of potential decision-makers within the companies:

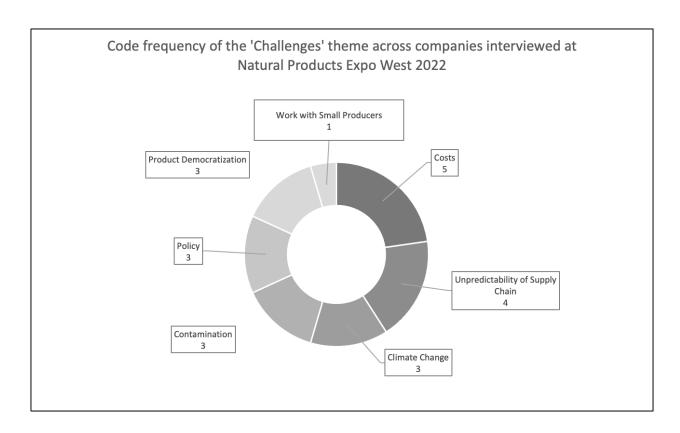
- CEO
- Director of Operations

- Food Scientist
- Founder
- Innovation Team
- Marketing Team
- Plant Operations Manager
- Quality Assurance Manager
- Quality Team
- Research and Development Team
- Senior Manager
- Supply Chain Team

Given their key role in the new product development process, and their knowledge of the details in the supply chain, these decision-makers can be a target for subsequent data collection to obtain more reliable results on product attributes and what the implications and challenges in bringing NTFPs to the U.S. market.

Challenges

The participants addressed the challenges of working with a sustainable supply chain just in the interviews. **Figure 11** illustrates the challenges companies are facing:



From the challenges coded, 'Costs' is the most frequently (5 mentions) when working with sustainable supply chains. On the other hand, the 'Unpredictability of Supply Chain' seems to be a concern among companies connected to 'Climate Change', 'Contamination', and 'Policy'. One participant related:

"Would say for some products it's obviously challenging to work with organic products. They depend on the **climate**. They depend on the **region** and depend on a lot of things."

The policy is usually tangled with 'Unpredictability of Supply Chain' because a policy change in a certain region can have an effect on the supply chain, such as described by one of the participants:

"For example, our red bee propolis comes from the mangroves. So, if a **policy in Brazil changes**, how you can get the protected areas of the mangroves? Then we'll not have red propolis."

'Product democratization' also emerged as a constraint in the sustainable supply chain. Because of the costs of certifications, high-quality products often command the market at a premium and are not pricey accessible to some social classes. This quote describes one of the participants describing this situation:

"Those aspects of our social mission support the fact that we're going to put out the best product that we can put out and we don't want to like skimp on our quality. So we're not going to be the least expensive brand out there. In fact, sometimes we end up being a more expensive brand that's out there at a premium, and we're addressing that from a democratization perspective, but that might not allow for everyone to have access to our product."

Findings

This analysis of in-depth interview data and statements of companies working with natural products found that product 'Nutritional Attributes' (emphasis on 'Gluten-free Certification', 'Dairy-free', and 'Plant-based Certification') and 'Sustainability Attributes' (especially 'Organic Certification', 'Non-GMO', and 'Corporate Social Responsibility') are critical to attracting business, consumers, and develop new markets for NTFPs.

Product-specific attributes demonstrate that 'Organic Certification', 'Organoleptic characteristics', and 'Vegan Certification' are prominent in the development of allspice products. Regarding ramon seed, 'Gluten-free', 'Organic Certification', and 'Plant-based Certification' are critical to developing new products. On the other hand, honey companies are interested in 'Quality', 'Organic Certification', and 'Price'. Overall, allspice and ramon potential products would rely heavily on 'Nutritonal Attributes', while honey focuses heavily on 'Environmental Attributes'.

Other themes, such as 'Marketing Strategies' suggest that 'Storytelling' is quite utilized by companies to attract consumers, and it is strongly connected with 'Authenticity'.

In the context of Product Development, most companies are driven by consumer preferences, market search, and price viability, and it is heavily relied on data and it can be a constraint to developing new products with NTFPs. The 'Decision-makers' might be a strategic target for the subsequent data collection on how to address these constraints.

'Cost' is a huge challenge when it comes to working with sustainable supply chains; However, the 'Unpredictability of Supply Chain' seems to be more concerning among respondents, since it also involves 'Climate Change, 'Contamination', and 'Policy'.

Overall, the data found in the interviews are very similar to the company's statements when it comes to 'Attributes'. However, certifications, company practices, and procedures were more detailed in the interviews.

References

Endamana, D., Angu, K. A., Akwah, G. N., Shepherd, G., & Ntumwel, B. C. (2016). Contribution of non-timber forest products to cash and non-cash income of remote forest communities in Central Africa. *International Forestry Review*, 18(3), 280–295. https://doi.org/10.1505/146554816819501682

Jensen, A. (2009). Valuation of non-timber forest products value chains. *Forest Policy and Economics*, 11(1), 34–41. https://doi.org/10.1016/j.forpol.2008.08.002

LeCompte, M. D., & Schensul, J. J. (2010). *Designing & conducting ethnographic research: An introduction* (2nd ed). AltaMira Press.

Ojea, E., Loureiro, M. L., Alló, M., & Barrio, M. (2016). Ecosystem services and redd: Estimating the benefits of non-carbon services in worldwide forests. *World Development*, 78, 246–261. https://doi.org/10.1016/j.worlddev.2015.10.002

Saldaña, J. (2013). The coding manual for qualitative researchers (2nd ed). SAGE.

Shackleton, C., & De Vos, A. (2022). How many people globally actually use non-timber forest products? *Forest Policy and Economics*, 135, 102659. https://doi.org/10.1016/j.forpol.2021.102659

Shackleton, S., Shackleton, C., & Shanley, P. (Eds.). (2011). *Non-timber forest products in the global context* (Vol. 7). Springer Berlin Heidelberg. https://doi.org/10.1007/978-3-642-17983-9

Attachments

Attachment A - Semi-structured Interview Protocol

SEMI-STRUCTURED INTERVIEW PROTOCOL

BRIEF OVERVIEW

My name is Luiza Lucena. I am a graduate student at the University of Minnesota, Twin Cities. I am doing my Master's research about assessing the attractiveness of Non-Timber Forest Product attributes to expand market opportunities in the United States for community forest enterprises from Guatemala.

I want to invite you to participate in my research study, which looks at promoting the integration of social, economic, and conservation objectives in forest communities within the Maya Biosphere Reserve in Guatemala. More specifically, I am developing a framework to understand the various attributes /preferences of consumers and businesses that impact the introduction of Non-Timber Forest Products in international companies.

Your participation in this conversation is crucial to help better understand companies' interests in new sustainable products and how it contributes to helping the forest communities and the environment.

RECORD CONSENT

Would you mind if I record this conversation since it's quite noisy here and English is not my mother language? It will be particularly valuable for my study because I will be able to refer back to it later to make sure I have comprehended everything correctly.

START RECORDING

BEGINNING

[As you may remember, I contacted you previously to talk about Non-Timber Forest Products at the Expo West.]* Right now, I have a handout of this Non-Timber Forest Product for you to view as we conduct this conversation.

PROVIDE HANDOUT OF NON-TIMBER FOREST PRODUCTS TO PARTICIPANTS

Go ahead and take a look at that handout for a minute if you want to.

OPENING

I want to introduce this conversation by talking about product attributes. Basically, product attributes are the characteristics of a product that describe its features and influence customers to buy it. There are different types of attributes in the market, but for this conversation, we will focus on social (e.g. Fair-trade, Ethical source, etc), environmental (e.g. Organic, Non-GMO, Sustainable supply chain, etc), and functional (Gluten-free, Dairy-free, etc).

So, [when first responding to my email or according to your company's statement mentioned on the website], you indicated that you have an interest in sustainable natural products.

- 1. Could you please provide attributes (characteristics) that your company values the most when choosing a new product for your product line?
 - a. What are you looking for when evaluating a potential product?
- 2. What type of products does your company buy? (e.g. ingredients, finished product, etc)
- 3. When your company advertises a certain product, which features are fundamental to attracting customers according to your experience?
- 4. How important social, environmental and sustainability issues are to your company? (E.g. sustainable supply chain, carbon footprint, social responsibility, etc.)
 - a. And who might address those issues?
- 5. Does your company or is your company interested in working with sustainable supply chains?

Now we are moving into a part of the interview where I would like to hear you describe which barriers you encountered in working with sustainable supply chains.

6. Did you encounter any issues when sourcing products from a sustainable supply chain?

CLOSING

Now, just one more question...before we wrap this up.

7. Who is responsible for developing new products and how are decisions made to take on a new product?

SNOWBALLING

Again, thank you for participating! I am still in the phase of data collection for this project, which includes finding other companies to interview. To that end...

8. Can you recommend another company that may have an interest in working with Non-Timber Forest Products with social and environmental attributes?

We value your participation and want to ensure we accurately represent your company's voice. We are not asking for a reply right now, but do want to know if you would like to participate any further so that we can send you a meeting request. So...

9. Would you be willing to participate in the next step in this project? This would involve attending a more extended interview.

Attachment B - Certifications & Labels

Food Label Name	Logo	Definition
B Corp Certification	Corporation	Is a designation that a business is meeting high standards of verified performance, accountability, and transparency on factors from employee benefits and charitable giving to supply chain practices and input materials. Demonstrate high social and environmental performance by achieving a B Impact Assessment score of 80 or above and passing our risk review. Make a legal commitment by changing their corporate governance structure to be accountable to all stakeholders, not just shareholders, and achieve benefit corporation status if available in their jurisdiction. Exhibit transparency by allowing information about their performance measured against B Lab's standards to be publicly available on their B Corp profile on B Lab's website.
BRC Certification	BRC FOOD CERTIFICATED	Formerly the British Retail Consortium, Brand Reputation through Compliance (BRC), is a globally recognized UK trade organization. Which established a series of standard to help companies comply with food safety legislation, and to provide guidelines for the manufacture of safe, quality food products, and demonstrates a food and beverage company's commitment to industry best practices.
Carbon Footprint	reducing with the Carbon Trust CO2 We have committed to reduce the carbon footprint of this product carbon-label.com	This is a validation of accurate footprints, providing customers with verified information about the carbon impacts of their purchasing decisions. A CO2 offset refers to the compensation of residual emissions by funding a project with an equivalent saving in carbon emissions.

Food Label Name	Logo	Definition
Paleo Certification	PALEO	The Certified Paleo Label identifies food products that meet the standards of the paleo diet. It applies to Grain-Free, Legume-Free, Dairy-Free, Artificial coloring, Artificial Preservatives, Artificial Sweeteners, and Artificial Flavor Enhancers-free products.
Cholesterol-free		
Dairy-free	DAIRY	
Egg-free	EGG FREE	
Fair Trade Certified	®	The FAIRTRADE Mark is the symbol of the international Fairtrade system – and the most globally recognized ethical label. When you buy products with any of the FAIRTRADE Marks, you support farmers and workers as they improve their lives and their communities.
Gluten-free Certification	GLUTEN BREE BREE BREE BREE BREE BREE BREE BR	The rule specifies, among other criteria, that any foods that carry the label "gluten-free," "no gluten," "free of gluten," or "without gluten" must contain less than 20 parts per million (ppm) of gluten. This level is the lowest that can be reliably detected in foods using scientifically validated analytical methods.
GMP Certification	GMP CERTIFIED CERTIFIED	The Good Manufacturing Practice (GMP) label ensures that products are consistently produced and controlled according to quality standards. It covers all aspects of production, from the starting materials, premises, and equipment to the training and personal hygiene of staff.

Food Label Name	Logo	Definition
Keto	KETO CERTIFIED	The Keto Certified label identifies food products that meet the standards of the Ketogenic Diet. It applies to 1) Meal and Meal Replacement Products that do not contain more than 10g net/effective carbohydrates per serving; 2) Snack Products that do not contain more than 6g net/effective carbohydrates per serving; and 3) Condiments that do not contain more than 6g net/effective carbohydrates per serving.
Kosher Certification		Kosher Certification is the stamp of kosher approval by a rabbinic Agency verifying they have checked the products' ingredients, production facility, and actual production to ensure all ingredients, derivatives, tools, and machinery have no trace of nonkosher substances. Nonkosher substances include certain animals, fowl and fish (such as pork and rabbit, eagle and owl, catfish and sturgeon), most insects, and any shellfish or reptile.
Non-GMO Project Verified	NON GMO Project VERIFIED	Non-GMO means a product was produced without genetic engineering and its ingredients are not derived from GMOs. Non-GMO Project Verified additionally means that a product is compliant with the Non-GMO Project Standard, which includes stringent provisions for testing, traceability, and segregation.
Nut-free	T FREE	The Nut-Free labeling means the product does not contain nuts.
Organic Certification	USDA ORGANIC CERTIFIED ORGANIC	The Organic Certification applies to products that have been produced using cultural, biological, and mechanical practices that support the cycling of on-farm resources, promote ecological balance, and conserve biodiversity.

Food Label Name	Logo	Definition
Plant-based Certification	CEATIFIE VEGERAL	The Certified Plant-Based certification and label indicate sustainable alternatives to meat, egg and dairy products by providing assurance that the food contains no animal-derived ingredients. Products eligible for certification include meat, egg, and dairy alternatives and similar foods that do not contain any animal-derived ingredients. Ingredients that are not of plant or animal origin are allowed as long as individually or combined they do not exceed 10% of the product formula.
Preservative-free	PRESERVATIVE FREE	The Preservative-free label means that no synthetic preservatives were added to the product.
Regenerative Organic Certification	Regenerative Organic Certified™	Regenerative Organic Certified™ is a revolutionary new certification for food, textiles, and personal care ingredients. ROC™ farms and products meet the highest standards in the world for soil health, animal welfare, and farmworker fairness.
SBO Certification		
Soy-free	SOY	
SQF Certification	SQF	

Food Label Name	Logo	Definition
Vegan Certification	Jegan.ord	The Vegan Certification applies to products that do not contain meat, fish, fowl, animal by-products, eggs or egg products, milk or milk products, honey or honey bee products, insects or products from insects such as silk or dyes, or sugar filtered with bone char or be processed with any animal products or by-products.
Wheat-free	GF Gluten-Free	
Whole-grain	Whole Grains Council or grant with the counc	The Whole Grain certification means that 100% of the food's grain ingredients are made with whole grains.
Woman-owned	W#MEN° OWNED	A Woman-Owned Business Enterprise (WBE) is defined as one that is at least 51% owned, operated and controlled on a daily basis by one or more female American citizens. WBEs are typically certified by a third-party, city, state or federal agency.

Attachment C - Codebook

Theme	Code	Subcode
Attributes	Clean Ingredients	
	Functional Attributes	GMP Certification
		Organoleptic Characteristics
		Quality
		SBO Certification

Theme	Code	Subcode
		SQF Certification
	Nutritional Attributes	BRC Certification
		Cholesterol-free
		Dairy-free
		Egg-free
		Gluten-free Certification
		Grain-free
		High Fiber
		High Protein
		Keto
		Kosher Certification
		Nut-free
		Paleo Certification
		Plant-based Certification
		Preservative-free
		Soy-free
		Superfoods
		Vegan Certification
		Wheat-free
		Whole Grain
		Price
	Sustainability Attributes	B Corp Certification
		Carbon Footprint
		Corporate Social Responsibility
		Fairtrade Certification
		Family-operated
		Family-owned
		Non-GMO

Theme	Code	Subcode
		Organic Certification
		Regenerative Organic Certification
		Wind Energy
		Woman empowerment
		Woman-owned
Challenges	Climate Change	
	Contamination	
	Costs	
	Policy	
	Product Democratization	
	Unpredictability of Supply Chain	
	Work with Small Producers	
Consumer Preferences		
Decision-makers		
Marketing Strategies	Authenticity	
	Impact	
	Package	
	Social Media	
	Storytelling	
	Traceability	
	Unique functionalities	
Product Development	Products Supplied	
Sustainable Supply Chain		