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THE ENHANCEMENT OF THE SPECIALIZED LOCAL FOOD SYSTEM IN LEBANON VIA RURAL/URBAN & RURAL/RURAL LINKAGES

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A thesis submitted in partial fulfillment of the requirements for the degree of Master of Science to the Department of Rural Community Development of the Faculty of Agricultural and Food Sciences at the American University of Beirut

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ABSTRACT

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The study was conducted in Lebanon during the first and second quarters of 2021, after almost two years of political and financial unrest, and within a year through a global pandemic, to understand the situation of the Lebanese Local Food System. The research analyzed the economic practices, existing legislations, trends, evolution and the impact of the financial meltdown in a local food system that is nesting rural small scale producers form different categories. It identified, furthermore, the challenges of the Lebanese small scale producers and exposed their willingness in changing their operations to properly adapt.

The rural/rural and rural/urban linkages have seen an evolution in the post-meltdown era, detecting shifts in Lebanese nested markets and a change in consumers' behavior that suggest the creation of a New Rurality. That shift in paradigm is still, however, greatly affected by the international-national-local equity of distribution in developmental aid.

The Lebanese local food system, maintained by the rural small scale producers is in dire need to a reform that allows it to move from a neglected informal status, to a constructed semi-informal framework. In order to succeed, this new framework needs to take into consideration the definition of agro-food smallholders, the logistical and intellectual needs/education that contribute to their business optimization and finally, the equity of subsidies distribution to make sure that even the ones not showing characteristics of entrepreneurship are benefiting.

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ABBREVIATIONS

AFN: Alternative Food Network

ATA: Admission Temporaire/Temporary Admission

B2B: Business to Business B2C: Business to Consumer BMC: Business Model Canvas BUM: Badaro Urban Market

CBP: Capacity Building Project(s)

CRM: Customer Relations Management CSA: Community Supported Agriculture

CTO: Chief Technical Officer

FAO: Food & Agriculture Organization (United Nations)

FHF: Food Heritage Foundation

FM: Farmers' Market FTL: Fair Trade Lebanon

GAS: Gruppo d'Acquisto Solidale GDP: Gross Domestic Product

HACCP: Hazard Analysis & Critical Control Point

ICARDA: International Center for Agricultural Research in the Dry Areas

IFPRI: International Food Policy Research Institute

ILO: International Labor Organization

IMC: Integrated Marketing Communication

INGO: International Non-Governmental Organization

INVV: Institut National de la Vigne et du Vin LARI: Lebanese Agricultural Research Institute

M&E: Monitoring & Evalutation

MICC: Movimento de Integração Campo-Cidade

MoA: Ministry of Agriculture

MoET: Ministry of Economy & Trade NAS: National Agriculture Strategy NGO: Non-Governmental Organization NSSF: National Social Security Fund

PO: Producers' Organizations

POS: Point of Sales

PPP: Public-Private Partnership

QA: Quality Assurance QC: Quality Control

R&R: Rules and Regulations

RD: Rural Delights SET: Souk El Tayeb SFB: Slow Food Beirut

SFSC: Short Food Supply Chain

SLF: Sustainable Livelihood Framework SPG: Solidarity Purchasing Group(s) TEQ: Transparency, Ethics & Quality TIR: Transports Internationaux Routiers

UNDP: United Nations Development Program

UNFAO: United Nations Food and Agriculture Organization UNWTO: United Nations World Trade Organization USAID: United States Agency for International Development UXUi: User Experience User Interface

WWII: World War II

CHAPTER 1

INTRODUCTION

Rural Development focuses, as described by Van der Ploeg, on the exchange between a set of designated stakeholders, societal components and government(s) to create a trilogy of harmony embedded by "encounters that take place at the decisive interfaces". It situates the people at the center to provide them with the adequate tools that help them in refining their craft, and make their ecosystem function in the efficient channels of horizontal and vertical outreaches.

Alternative Food Networks, for that matter, are a major component in sustaining value chains in food production, and subsequently affect rural livelihoods at their core. In the 21st century, and with the establishment of the industrial food production system as one of the results of the Green Revolution, AFNs became smoothly excluded and limited in their transformation, progress and unquestionably, their impact. Food grown in local set ups is a reflection of the hosting environment and responds directly to the needs of the surrounding community. It is a pillar in retaining value compared to its industrial counterpart, and answers to the dietary needs of the geographical area. As food production and processing affects the livelihoods of involved communities by offering them a mechanism to employ labor and develop their socio-economic status; this paper targets rural communities who are considered marginalized in comparison to urban ones, as it is the case in Lebanon. Food grown in a local system presents one of the greatest opportunities for their stakeholders to "add value and retain bigger slice of retail value" (Damian Maye 2006). Practically, it reflects on the notion that "AFNs are defined in many different ways by the people who establish them" (Moya Kneafsey 2006), and departing from Van der Ploeg's 2012 Journal of Peasant Studies; the

assumption suggests that "rural development is a (highly variable) set of responses to market failures" where innovative products and services are at the heart of the solutions. The Lebanese civil war ended in 1990 under the Taef pact between all involved parties to cease fire and the reconstruction of the country began to target selected aspects. The accord to this pact has been followed by a baseline development strategy and implementations that focused on enhancing the sector of services, which includes tourism and banking, and the sector of real estate in a bid to attract capitals and foreign investors. The strategy resulted in neglecting productive sectors like the industrial and the agricultural ones, that are generally situated in rural areas, and subsequently creating a pull factor of migration towards the capital, Beirut.

This rural bias has diminished the opportunities of sustaining livelihoods in Lebanon and deteriorated the country's rural fabric by emptying the areas that are considered at the heart of any circular economy strategy.

This study aims at uncovering the characteristics of the Lebanese local food system, that is hosted in its majority by rural small scale producers, and at presenting the challenges that were faced over the course of a history filled with traumas. It also seeks to showcase new forms of adaptive measures that could be the basis in the formation of a new rurality centered on rural/urban and rural/rural linkages. Moreover, the study highlights the pain-points of the sector and suggests solutions to fill the gaps in a macroscopic approach, involving the public, private and humanitarian sector.

Rural development may act on the margin of the mainstream market in a corrective approach, complementing a transition that would offer greater tangible and intangible incomes to stakeholders behind them – being farmers and rural populations in the case of this study – throughout revised rural/urban linkages. On that basis and in

order to answer the research questions, chapter two begins by discussing the literature review related to characterizing local food systems including the challenges and the relative components that Alternative Food Networks consist of. It explores, furthermore, the rural small scale producers, initiatives, coops and the related consumption patterns that have been associated to them throughout different debates and critics that argue the efficiency of the model.

Chapter three discusses the methodology used to answer the research questions and the limitations faced during data collection, particularly that the research has been conducted in the middle of a pandemic. Mixed methods (qualitative and quantitative) are used for a deeper understanding of the topic in order to validate the research.

Chapter four showcases the data with its analysis. It focuses on describing the Lebanese Local Food System as a baseline situation, how the status quo has been disrupted in the financial crisis and how the shaping of a new rurality is beginning to take place in the country.

Chapter five concludes by presenting recommendations to assist policy makers and relevant stakeholders in improving their part to eventually ameliorate the whole system; based on the perspectives of the local small scale producers who are the major actors in this system.

CHAPTER 2

LITERATURE REVIEW

2.1. Characteristics of Local Food Systems

2.1.1. From Global to Alternative Food Networks

The conventional global approach to food in the XXI Century, and notably to processed and ultra-processed food has been at the center of many debates around the world. Although "Food processing in any general sense is not a public health issue", ever since the introduction of heat, vapor and condiments; the evolution in food science has led to the creation of high "palatable products made from cheap ingredients and additives". (C.A. Monteiro 2013) Knowing that ultra-processed products are extracted from whole foods and promoted by multinational companies with high shelve lives, it is intriguing to find out from the study conducted by Monteiro et al. that results "show greatest consumption in high-income countries, but greater relative and sometimes absolute increases in lower-income countries" – after researches made in high-income Canada and upper-middle-income Brazil between 1938 and 2001 and between 1987 and 2003 respectively (C.A. Monteiro 2013). It may be all in the name of global food security but the major concern here is the fact that ultra-processed food is generously accessible to the poor. The genuine side of those intentions are somehow understandable when looking at the UN-FAO researches of 2015, suggesting that 795 million people are still chronically insecure when it comes to food. Among the first reactions to respond to food insecurity were to surge food production under a "productionist paradigms for delivering food security" (Julia Leventon 2017), nonetheless, the problem is that already 40% of Earth's terrestrial surface is being used for agriculture (J.A. Foley 2005). Several question marks were raised about how could

food sovereignty be a strategy to food security, given that "many cultivated areas are high-input, intensified landscapes to which pesticides, fertilizers and irrigation are being applied with severe impact on biodiversity and other aspects of the natural environment"? (Julia Leventon 2017)

The historical and global framework developed by Damayanti Banerjee in 2018 in "Understanding Food Disasters and Food Traumas in the Global Food System" highlights the evolution of the food systems throughout history based on setbacks or traumas. The first change in the global food regime started when agrarian communities were replaced by "rapid industrialization". The consequence back then was a modification of the economic pattern, accompanied by the introduction of a new class of workers. The second food regime has been initiated during the post-WWII era "in response to a rapid rise in transnational economic relations that transformed the agrofood complex into an 'intensive meat complex" (P. D. McMichael 1992). The initiation was led by the U.S. domestic agriculture programs, notably exportation of aids and industrialization of farming. This industrialization process has resulted in the creation of "durable foods" to boost the rapid exports of U.S. products to global markets and benefit from a leverage during the cold war days.

Developing countries became more dependent on imported goods, especially during the oil crisis and the food crisis of the 1970s, where both crises helped to further deteriorate their economies. That period included a decrease in revenues from their export-related activities, and which in turn "created havoc in the economic development of these countries" (Friedmann 1993). The establishment of the WTO, almost 20 years later in 1995, did not solve the problem. Although its mandate was to create "global governance, structured and standardized regulations, and transnational oversight";

Campbell believes that the national and regional regulatory interventions are still weak.

(Campbell 2009)

Hence, the "Food from Nowhere" notion was born, and was nominated by McMichael as the third regime to eliminate domestic crops and replace them with imported goods. "The result being a flooding of markets in the global south with subsided global north commodities and the production of specialty crops, as a condition of debt replacement, throughout the developing world (P. McMichael 2009) (Damayanti Banerjee 2018).

As a response to the above chronology, the world is witnessing nowadays "resistance movements demanding sustainable alternatives" to the "Food from Nowhere" principle. Banerjee implies for that matter that "the rise of this movement is evident in particular in the growing politicization of food, the increased mainstream popularity of food system critics, and the rise of rural and food-based movements that unmasked the landscape of invisible, processed, and cheap foodstuffs" (Damayanti Banerjee 2018). Banerjee's thoughts are complemented by Leventon and Laudan's proposition of local food sovereignty as a direction towards global food security. In their article, they emphasize on the assumptions that "the food sovereignty movement proposes a localist approach to meeting food security while delivering broader social, economic and environmental benefits". (Julia Leventon 2017)

2.1.2. Family Farming and Small Scale Producers

As per Ilbery and Maye's Regional Economies of Local Food Productions; producers involved in the local food sector are eager to "re-establish links with their customer base and to maintain traditional modes of production"; principally since these

local businesses produce "dedicated rather than generic commodity-based products". However, Renting et al. argues that conclusions emerging from Short Food Supply Chains (SFSC) may still be unable to project the level of sustainability on the economic, social and environmental level, "as well as to examine the extent to which they are truly embedded within regional economies". (Damian Maye 2006)

Redford (1991) debates that indigenous knowledge is extremely important as it reflects the accumulated wisdom of unique cultures, but in order to meet the needs of a given situation and the demands of development, a "mosaic of methods" should be adopted in which we learn from indigenous people and twist their methods through selecting, refining and innovating" (Karam 2019). The analysis is led towards ameliorating the income levels of those indigenous people and small scale producers as key in the revitalization of rural areas (Rami Zurayk 2009), and opens the door for this study to explore the major characteristics of local food systems by putting family farming and small-scale food producers at the centre of the debate.

The researches overlap about describing farmers, smallholders and or small scale producers. In a way, "farmers are in fact a sub-set of food producers, as they constitute the first part of a production chain that may include traders, processors, retailers and other agents depending of the specific product and context". In fact, as per Heidhues and Brüntrup, "smallholder" may mean "small-scale agriculture", family farm", "subsistence farm", "resource-poor farm", "low income farm", "low input farm" or "low technology farm". To that end, Dixon et al.(2004), Brooks et al. (2009), and Murphy (2009) agree on the proposition that this particular fabric of society is denoted based on their lack of capacity in resources, assets, technology, market access, and

capital to perform activities that would allow them to actually be levelled with other actors of the economy.

In addition, the World Bank's Rural Development Strategy of 2003 has limited the definition of small scale producers that have "a low asset base and operating in less than 2 hectares of cropland" (Clara Aida Khalil 2017). The definition is validated by FAOSTAT, suggesting after reviewing 81 countries, that 85% of their farms' sizes are less than 2 ha. In the "Family Farming and the Worlds to Come" book however, Bosc et al. presented a discourse to help "Defining, Characterizing and Measuring Family Farming Models" via a set of modalities versus criteria. Bosc tried to approach it through the angles of academics, researchers, public actors, private stakeholders, civil society, citizens, and actors of production separately, since each is able to define the matter from their angle. La Via Campesina, on the other hand, believe that the connotation "peasant" contradicts the notion of "entrepreneurial farming"; but generally "these representations are not fixed, they are constantly changing under the reciprocal influence of exchanges between these strongly interconnected domains".

As much the size of the land is deemed important, "farm rationalities or strategies" illustrate the aim of either being commercial or specialized, or even in an "in-between' state of food production for the family and for marketing".

Subsequently, the literature displays the "identities of those who work on farms" and whom are pictured by many appellations like "peasants, farmers or producers" since the notion of identity is usually linked to the size of the farm. Historically, the term 'peasant' did not refer to any degrading social status. In Asia for instance "the peasant has a stable identity" mainly due to the monotony of production, like in China. The context differs in Europe, however, where "the farmer has taken over from the

peasant" but both meet on the principle of not being associated to any form of capitalism or "terminologies of conventional modernization" (Pierre-Marie Bosc* 2015). Remy argues that the way countries define farming shows how "professional and social identities are constructed and deconstructed" (Remy 2008). The United Nations Food & Agriculture Organization (FAO) simplified it by talking about an 'agricultural holding', which is "an economic unit of agricultural production under single management comprising all livestock kept and all land used wholly or partly for agricultural production purposes, without regard to title, legal form or size. Single management may be exercised by an individual or household, jointly by two or more individuals or households, by a clan or tribe, or by a juridical person such as a corporation, cooperative or government agency" (FAO, 2015c) (Clara Aida Khalil 2017).

Criteria suggested by Khalil et al. range from the endowment of factors of production (land, labor, technology), the connection of the farm/workshop with the market, the economic size like the value of production and lastly the type of management which measures "the degree of involvement of the family". This family involvement versus entrepreneurial perspective has been the focus of Bosc. Table 1 here-below clarifies Bosc's findings:

Table 1: Bosc's Entrepreneurial versus Family Forms of Management

	Entrepreneurial forms – family forms		
	Types of enterprises	Types of family	Types of family farms
		business farms	
Labour	Exclusively salaried	Mixed, presence of	Family dominance, no
	employees	permanently salaried	permanently salaried
		employees	employees
Capital	Shareholders	From family of family	From family
		association	
Management	Technical	Family/technical	Familial
Home Consumption	Not relevant	Residual	Ranging from partial
			to full
Legal Status	Limited liability or	Farmer status,	Informal or farmer
	other company form	associative forms	status
Land-rights status Property or formal rental – property, or formal or informal rental			

Source: (Pierre-Marie Bosc* 2015)

2.1.3. Impact of Alternative Food Systems on Rural Communities

"Rural development is not located at the margins of farming. It is not primarily about non-agricultural actors, nor about collateral effects ('externalities'). Nor it is about elderly farmers who are looking to retire from agriculture; or small farmers trying to escape from being swallowed by the logic of modernization. Instead, it is about young and often well-educated farmers (wherever they may be located), about farms of all sizes and about new networks that link the rural and the urban" (Jan Douwe Van Der Ploeg 2012).

i- Economic Impact

Gava et al. implies that fighting rural poverty starts by enhancing the "productivity, profitability and sustainability of smallholder farming system" in order to bridge the gap between rural and urban communities (Oriana Gava 2021). This empowerment comes as an antidote to the 'capital intensive' food system where small scale producers are marginalized with no bargaining power and low remuneration. Subsequently, grassroots initiatives and nested markets have an objective that goes beyond delivering good quality food to consumers. They are meant to also create "a materialization of political and economic support to the peasant's movement" (Potira Preiss, Fostering Sustainable Urban-Rural Linkages through Local Food Supply: A Transnational Analysis of Collaborative Food Alliances 2017). Cooperatives, namely, are key actors to counter and resist the disadvantages raised by Gava. They operate on a horizontal level, meaning that they turn stakeholders into shareholders to smoothen the operation of their value chain while "creating benefits to all its members and environment" (Aglaia Fischer, Marvin Nusseck 2020). Some businesses like IntelligentFood are trying to adopt this approach in their structure to create and maintain value, and to create a culture where "all members receive a share of the profit and can vote on the future of the organization".

Nested markets on the other hand, contribute to the development of rural communities from an economic point view through "the redistribution of resources in order to achieve specific objectives" (Jan Douwe Van Der Ploeg 2012) that is otherwise unachievable through mainstream markets (Potira Preiss, Fostering Sustainable Urban-Rural Linkages through Local Food Supply: A Transnational Analysis of Collaborative Food Alliances 2017). It is achievable through the alternative channels since the level of

participation is higher than other systems; and it is believed that this participation is indispensable to small scale producers to help them "understand impacts on their livelihoods and for intermediaries to support the product when developing market access" (Courtois 2011). In Ecuador for instance, the Canasta Comunitaria Utopia or Community Food Basket Utopia is an association feeding 60 family units and buying directly from indigenous farmers in order to improve their living conditions. They are fulfilling that "by setting up a stable market and with more solidary relations, as well as to value locally produced products". Their model has triggered many in the country and has shifted the region's attention to agro-ecology as a way of growing food. The Gruppo d'Acquisto Solidale (GAS) in Italy has a typical example that fits the economic, social and psychological impact: Barikama is a cooperative of 5 young sub-Saharan immigrants who upon arriving to Italy started working in subhuman conditions until they got racially attacked by getting shot. They fled to Rome and lived in a train station where they started producing yogurt. Their yogurt reached the hands of some GAS members who ended up putting their products in the weekly baskets, helped them organizing themselves to increase their production capacity and eventually reach 150L of yogurt per week. They organically certified by a partnership with a local cheese factory called Casale di Martignano, and "they welcome other immigrants struggling to find employment". (Potira Preiss, Fostering Sustainable Urban-Rural Linkages through Local Food Supply: A Transnational Analysis of Collaborative Food Alliances 2017).

Lastly, many research centers, academics and UNWTO recommend that tourism can play a major part in the economic development of rural communities. Among other benefits and social opportunities, tourism helps in providing jobs and income for small-restaurants, local food and agro-producers. It also gives these communities additional

ways to diversify their income, "improving the micro economy and supporting local small and micro enterprises at large". Hence, establishing linkages serves the widest range of rural stakeholders so that "the benefit is multiplied to reach many people in the village and rural area". (Ministry of Tourism 2015)

ii- Socio-cultural Impact

Social impact begins by acknowledging the notion of Social Protection to measure any related effect. The role of social security as described by Slater et al. is to give "an income security and asset protection that enable people to escape this insecurity trap and lift them out of poverty" (Rachel Slater 2009). Many studies have put in relevance how economic relations are rooted in social relations of trust (Damian Maye 2006). Slater continues to imply that the loyalty and trust that is built as a result of food exchange between customers and producers in a given chain requires special kinds of social 'agreements' that "articulate different arrangements, organizational dynamics and even, innovative processes in the production and consumption" (Rachel Slater 2009). Solidarity Purchase Groups, for instance, are a form of an alternative way to purchase food where a group of consumers connect directly with a group of farmers. They "are based on a system of social relationship among actors, with aims to use daily food consumption practices to contribute to environmental and social issues" (Migliore, et al. 2014) (Maestripieri, Toa and Antonello 2018) (Mariarosaria Saverese 2020).

Franklin et al. wrote about community resilience, which "highlights the importance of building capacity from within". Food systems in this case are a driving force "to engage communities in promoting resilience" (Alex Franklin 2011), and in rural development, it starts with 'production' as a culture economy since it assembles

"the territory, its cultural system and the network of actors that construct a set of resources to be employed" (Ray, Culture, Intellectual Property and Territorial Rural Development 1998). Moreover, interrelations happening at market places give producers new ideas and perspectives to accommodate their offerings based on their customers' satisfaction. While in the opposite direction and through these same linkages, consumers "gain an insight on what is happening on the farm and in rural areas", which allow them to perhaps pay a premium for the purchased goods, where this premium is usually accompanied by "interest in supporting the ecological, social, cultural, and economic sustainability of farms" (Low, et al. 2015) (Jablonski, et al. 2019).

Food symbolizes, as per Bessiere, virtues like bread, wine and cereals. It is a 'sign of communion' especially when it is shared by families and communities as it brings "information and meaning". Food is also a 'class marker' that helps its stakeholders identify themselves and their counterparts based on the level of its luxury or its everyday consumption. Finally, it is an 'emblem' as "is the case with culinary heritage of a given geographical area or community; a kind of a banner beneath which the inhabitants of a given area recognize themselves". People value this aspect of their experiential touristic journey because "the transmission of culinary know-how is, furthermore, not what it used to be. There is a frittering away of skills. The daughter or granddaughter no longer inherits secret family recipes". The result is usually a sense of nostalgia that rural communities capitalize on to "extend their networks, widening their social space and economic scope" (Bessiere 1998).

One constraint observed by Chedid et al. in a study on small ruminant in the Bequa valley that affects the community is the fact that "harsh working conditions" is related to the absence of farmers' successors to manage their herds. Those successors are usually their children and this constraint is causing the shrinking of the herd size "particularly when the farmer was advanced in age or suffered from health problems", a trend that has also been observed in several Mediterranean countries like Morocco and Greece (Mabelle Chedid 2018). Rural to urban migration can be a replacement to this trend for people to seek urban employment and send money to their rural relatives, which is also considered "a crucial factor in the development of rural areas" (Jablonski, et al. 2019).

iii- Political Impact

According to Rashid Adisa, political participation is a "major non-income need for rural people". Political participation, also known as "inclusive rural development", starts by the empowerment of productive sectors like agriculture, tourism, natural resources and others. It is also the linkages "of governance at the local, district and provincial levels, including linkages with the private sector" (Adisa 2012). As per FAO (1991) many question marks have been raised about sustainability which drove donors to reconsider their development aid strategies. The identified downstream by the international community was the lack of local communities' participation in development work. So international agencies like "UNDP, World Bank, ADB, Winrock International, Mercy Corps, ACTED and others" were and still are adopting the participation of communities in the decision making process. "However, the participatory approach, tested and proved as successful in other countries, and even within the country sometimes does not yield the expected results" (Dedabaev 2013).

Norman Uphoff stated that avoiding "disorder, disinvestment and decline" will heavily depend on the communication between "the state, the market, and civil institutions". Additionally, focusing on assessing those latter on a regular basis since they are "the closest to rural people". One of the assessments discussed by Uphoff is the understanding of "levels at which decision making and activity affecting development take place". He studied in 1986 the 'Levels for decision making and activity for development' and came up with a territo-administrative 10-tier roadmap on how the decision travels in development: it starts at the international level, national level, regional level, district level, subdistrict level, locality level (set of communities), community level ("an established socioeconomic residential unit, often referred to as the village level"), group level (like the neighborhood), household level and finally the individual level (Uphoff 1993).

Born & Purcell have a different opinion about the localization utopia, or the local trap. The local trap "refers to the tendency of food activists and researchers to assume something inherent about the local scale". They argue that a local-scale food system may not be as socially just when compared to global-scale food systems, and are backed by Winter's (2003) who questioned the claim of whether by shifting from a global to local food systems, the world may obtain "a more ecologically sound agricultural sector". Feenstra (1997) argued on the other hand that "the development of a local sustainable food system provides not only economic gains for a community but also fosters civic involvement, cooperation, and healthy social relations" (Feenstra 1997) (Branden Born 2006).

Goodman found a middle ground between the above two poles and reflected on the idea of food politics around the world "as relational and process-based rather than

perfectionist". Goodman admits that food systems around the world are never perfect, but are always prone to improvement if treated with delicate communication among parties. The relationship between alternative and conventional food networks can be defined by the "politics of quality", triggering questions like 'who' and 'how' determines how food is being produced, and how is the standardization of commodities being decided. Even big supermarkets like TESCO, Carrefour and others have created spaces for alternative food supply and managed to put them under their own brands. It raises the question about whether they can contribute in the decision-making of the sector. (David Goodman 2012)

In such cases, not all governments are at the centre in standardization and quality control, as per Le Courtois' report for FAO regarding the enhancement of farmers' market access for certified products. "National GAP programs in developing countries have been developed by different value-chain stakeholders: The national GAP program in Malaysia was developed by the Government; by the private sector in Kenya and through a public-private partnership in Chile" (Courtois 2011).

iv- Psychological Impact

Farmers are subject to pressure from many facades; whether from the unpredictable weather conditions that could affect water shortages, desertification of rural areas from urban migration, diseases, globalization, mainstream economic channels, etc. Not to mention physical demands due to long hours of work, social and geographical isolation, low to non-availability in their schedule to take vacations and most alarming, "are less likely to retire than people in other occupations". All these factors put farmers on the front-lines of vulnerability and threaten their wellbeing and

livelihoods. (Thelin A 2010) (Fragar L 2008) (Alston 2004) (Peck DF 2002) (Alston M 2008) (Polain JD 2011) (Berry HL 2011) (Brew, et al. 2016).

According to Asonganyi and based on their study done with 21 rural women in a "shea butter producing collective in northern Ghana"; psychological wellbeing is perceived via 4 main themes: ": social support, gender roles, autonomy, and self-efficacy". Deci et al. (2001), Samman (2007) and Sheldon & Bettencourt (2002) imply that "humans have a basic psychological need for relatedness, autonomy and competence"; where relatedness is the sense of belonging to a group of people, autonomy is the sense of driving one's own initiatives and competence is the set of learned and auto-developed skills that creates "a sense of confidence and self-efficacy in performing and achieving a goal" (Asonganyi 2017).

The psychological effect affects the other end of the chain as well. Alternative Food Networks and notably in Community Supported Agriculture (CSA) and Solidarity Purchasing Groups (SPG) overwhelm consumers with a sense of satisfaction for belonging to a certain group of people who share the same tastes, ideologies and social aims. Literatures and researches did not cover the interconnection of the psychological aspect on the consumers and farmers level simultaneously. Henceforth, it is imminent to attempt a "more integrative and comprehensive look at this consumption model with the aim to consider both consumers' and producers' perspectives in parallel" (Mariarosaria Saverese 2020).

2.2. Challenges in the Alternative Food Network

2.2.1. Generic Challenges

Compared to conventional food systems, AFNs are prone to "exhibit high levels of trust and commitment, and democratic value chains, which are embedded in the local communities" to provide a certain equilibrium among actors who base their relationships on trust rather than on economic and financial benefits. The challenges faced by the sector are common to family farms, small scale producers and cooperatives alike. The struggle begins by launching and sustaining the initiative or entity, and succeeding in surviving over a period of time that is abundant with barriers and downfalls. Among those barriers are the reliance on voluntary work and mediocre infrastructures, as well as the absence of functional organizational and legal structures. (Barbara Kump 2021)

Moreover, Bruce et al. emphasizes on how working within an AFN approach is deemed labour intensive for farmers and producers compared to industrial practices. Actors in the field "are relying on management-intensive farming systems rather than petroleum-based inputs", which leads them to considerably engage in keeping their soils healthy by applying crop rotation, producing their own organic matter, and "create closed nutrient cycles and enhance pest control". The attention in that area shifts on optimizing production with efficient mechanisms, using less lands and more "human labour instead of non-renewable resources". The process requires increased amounts of intensive production or farming management. (Analena B. Bruce 2016)

Societal changes over time may also be considered as a contributing factor to the evolution or to the regress of alternative food systems. In Japan for instance, the Teikei model aiming at promoting organic agriculture and creating a bridge between farmers

and consumers has seen its method shifting by the end of the XXth century with the involvement of "retailers, including food co-ops, independent stores, and chain stores". This change has also sales from direct face-to-face where clients meet the farmer and inter-exchange experience, culture and information; to indirect sales by wholesalers neglecting the doctrine of Teikei and "paid almost no attention to the sociocultural and environmental values of organic food". (Kondoh 2015)

Within the same scope, Kump believes that among the challenges faced by grassroots initiatives in the alternative network is that they "seem to have an 'optimal size'"; meaning that they need a specific amount of producers and consumers to reach an equilibrium that is profitable to the former and valuable to the latter. In that case, a lack of "personalization due to standardization and a lack of personal interaction can decrease the overall user experience". Entities and producers alike begin to lose the 'community characters' when they shift to more formalized and commercialized tenures in their way of approaching the market and dive into business development or sales.

2.2.2. Women

The journal of gender studies has published in 2015 an article by Chrysanthi Charatsari and Afroditi Papadaki-Klavdianou entitled "First be a woman? Rural Development, social change and women farmers' lives in Thessaly-Greece"; presenting strong claims that the issue of gender equity is as much present in developed and developing countries as it is in other countries: "Although the transition from developing to advanced economy status is supposed to prepare the ground for gender democracy, several indications confirm that in rural praxis the distribution of benefits from rural development is gender based" (Arku 2009) (J. Berhman 2012). Women in

Mediterranean countries do not have equal opportunities when it comes to development as "projects sometimes undervalue the needs of local farming societies (Arun 2012) and/or work 'for' rather than 'with' women, often excluding the more disadvantaged of them" (Cronwall 2003). (Chrysanthi Charatsari 2015)

As per a background report published by OXFAM in 2014, Kidder et al. emphasizes on the fact that "enhancing women's empowerment in agriculture specifically is also critical, given that women comprise on average 43 percent of the agricultural labour force in developing countries" (THALIA KIDDER 2014). Many countries have in fact provided opportunities to women's programs however when "women do not enjoy equal rights to inheritance, land or the benefits of technology, and where social norms limit their mobility or right to control income and finance, they cannot take advantage of the economic opportunities provided". Other series of studies by the International Food Policy Research Institute (IFPRI) in a series of researches called "Strengthening Food Policy through intra-household Analysis"; IFPRI focused on the decision-making in the family and how households execute the division of resources to emphasize on the roles women play as "food producers, as providers of food to the household and as contributors to household nutrition security". (Agnes R. Quisumbing 1995)

In Africa for example, data in the IFPRI report from 1995 show that "about 90 percent of the work of processing food crops and providing household water and fuelwood, 80 percent of the work of food storage and transport from farm to village, 90 percent of the work of hoeing and weeding, and 60 percent of the work of harvesting and marketing" are being performed by women. It is slightly different in Asia whereas labour is usually undertaken by men, yet "women work as hired agricultural labourers

or unpaid family workers" and still contribute to the post-harvesting work for between 10 to 50 percent.

In terms of remuneration, women face many governing and religious laws that forbid them from landownership. Rights to the land they are working in usually comes "with the consent of a male relative". Small farms exorbitantly show those unequal rights, in addition to the limited access to credit and the lower levels of education among women which would mean (directly or indirectly) that few women become agricultural scientists, and hence their exclusion from agricultural and environmental decision making contexts. (Agnes R. Quisumbing 1995)

2.2.3. The Perception of Quality

industry" via cooperatives that started to take over the market of specialized varieties with no clear quality control mechanism, and "consumers are left in the dark as to the origin, ingredients and quality of what they decide to purchase and consume". The main issue in Lebanon is the lack of trust among consumers, which restricts the evolution and the widespread of products coming from AFNs (Rami Zurayk 2009).

Internationally, Emmanuelle Le Courtois engineered a report for the United Nations' Food & Agriculture Organization to emphasize on creating market accesses to small scale producers and farmers using a business model approach. This BM approach relies heavily on quality control, certification and on qualified stakeholders to issue, manage and benefit from those programs. The bodies who give certification differ from around the world. Public institutions in some countries, NGOs supported by international

Homemade products are being "produced in mass by the local agro-food

donors in others, universities were also present in the discussion "in the aim of protecting a local product and fostering the development of a rural area in decline". The agents who are responsible of driving the processes are seldom the farmers since it is a costly investment. Practically, private owned companies act as bulk buyers from a group of growers, initiate the process, pay the related fees while creating "an internal control and management system" and "retains ownership of the certification" forbidding the producer to use it while selling elsewhere. This is one major challenge faced by farmers and producers to acquire certifications. The types of certifications listed by Courtois are several and can assist in the orientation of producers. Among those types, Courtois described the "Participatory Certification Scheme" which started in Brazil with the ECOVIDA Network, and consists of integrating a number of farmers, support organizations, consumer's cooperative, market enterprises, agro-industries, etc. and creating a nucleus out of this mix to do the auditing. "Within the nucleus, an ethical council provides inspection, monitoring and evaluation and advice to farmers", this way the relation between producers and consumers would get enhanced based on something concrete. (Courtois 2011)

Henk Renting believes that "instead of meeting basic, minimum quality standards, future food will be increasingly 'designed' and 'socially constructed' in response to specific demands". These are hybrid demands framed to meet notions of "health food, regional quality food, organic food, slow food, etc." (Henk Renting 2003). And even though "food quality assurance and authentication has become one of the most concerned issues worldwide owing to the development of global food market and the demand of the consumers for high quality food with certain properties (Wu 2021), Pradhan showed that Hazard Analysis and Critical Control Point systems (HACCP) can

be actually implemented in rural India with small scale food processors and producers at low cost in order to satisfy demands and stay competitive in a "changing world" (Pradhan 2014).

2.3 Producers' Organizations, Grassroots' Initiatives and Cooperatives

The Short Food Supply Chain (SFSC) described by Damian Maye has 2 different channels to market access, where both channels rely on traceability and on the nature of the chain as marketing key components: "first, the production and retail of food products within a county/region through forms of direct marketing or the sale of products to local retailers; and second, the sale of 'locality foods' (usually specialty/ traditional food products) as value added commodities for export outside the locale" (Damian Maye 2006). Both axes put the producer at the centre of the work by creating value to empower local food SMEs, and strengthen the linkages within the given community; and/or with the community itself and relevant external stakeholders. This occurs while improving "associational capacity, clustering and localized learning; and benefit wider local businesses linked to the food enterprise". However, this SFSC system is suggested to be troublesome on some levels. AFNs are usually labelled to be the tool for rural communities, yet many urban ones notably in sub-urban areas resort to them (Moya Kneafsey 2006). Kneafsey et al. for that matter maintain the fact that AFNs seldom take the 'upstream' context of the value chain, assuming that the chain starts with the producers and neglects historical attributes and values of food systems and chains evolutions. In fact, Maye looks at it as one big system where "local specialist producers are in fact developing their own 'niche spaces' within the one overall system". Those 'niche space' either become tools to poor communities in cases where

people consume their own production, or a market for high-end people who can afford paying more for an artisanal commodity instead of buying its cheaper industrial counterpart.

Both cases highlight the situation and the positioning of nested markets. "Nested markets are socially constructed markets that are organized around social interactions between concrete actors who occupy concrete spaces" (Sergio Schneider 2016). The existence of these markets is to create new dynamics that are far-away from the conventional system developed by capitalism. They are among the core tools to "alternative agri-food networks, short food supply chains, or value-based food supply chains". As per Soyeun Kim, "the adjective 'nested' explicitly highlights the embeddedness of markets in non-market, social and ecological relationships" (Kim 2015). Nested markets are the product of traumas and of troublesome events in society, referred by Van der Ploeg as 'structural holes'. So nested markets exist to bridge the gaps by using 3 dimensions: "the quality attributed to food, the definition of local, and their relationship with nature" (Sergio Schneider 2016). Even if they fall under the 'alternative' connotation, Schneider suggests that these "spaces are built in relation to broader markets", meaning alternative markets and conventional markets are here to coexist and to cope with one another. Interestingly, this relationship is based on "the creation of mechanism and strategies" by small scale producers to show off their products and grab the attention of clients frequenting the conventional channels. In other words, they are "specific segments of wider markets, but at the same time distinctive markets in terms of dynamics, interrelations, governance forms, price differentials, distributional mechanisms, and overall impact on rural communities and societies". (Kim 2015)

The establishment of those markets by communities is based on a set of intrinsic norms and rules that would take into consideration the "quality of landscape, protection of biodiversity and animal welfare, improvement of food quality and rural livelihood" like in the European model, or built in line with a certain social justice to less privileged communities and countries like China and Brazil. Potira Preiss showcased a set of grassroots initiatives and community-based groups that identify as resistant to the dominating global food regime: Located in Sao Paulo, Brazil; Movimento de Integração Campo-Cidade or MICC call the method of growing their foods as "Without Poison". It is social movement originated in 1980, delivering food baskets to 800 families on specific delivery days. Their governance is voluntary based, dispatching a number of individual on multiple distribution points connecting with churches, health public centres, workers and small farmers' movement as well as other more formal networks. Putting MICC into context; "São Paulo is a highly urbanized megalopolis, the food that urban population accessed was mostly offered by the expanding supermarket chains in the city"; while less costly alternatives needed long hours driving. MICC emerged as a solution to the accessibility of fresh food, even though its activities in the early days were more politically oriented, regardless of their means. Similarly, the *Gruppo* d'Acquisto Solidale Testaccio Meticcio, in Italy – defined as a "Solidarity Purchase Group" in English – started "in the 1990s as part of a food re-localization movement that aims to establish different economic and social relations between producers and consumers" by one person who mobilized his neighbours. The offering is not a basket of goods like the Brazilian and the Ecuadorian model, rather an open order delivery, sourcing the products from multiple suppliers of "organic, artisanal and small scale" producers. The network reaches 35 families and "follows a very horizontal structure of

self-management, with rotation of key task among members: coordination, accounting, liaison with suppliers, promotion of events, communications". A variety of products ranging from fruits and vegetables, jams, yogurt, cereal, pasta, biscuits, meat and cheese; gets delivered every Thursday night via orders made on an online software. In Spain, the *Grupo de Consumo Vera*, initiative started in 2012 by a group of people from the Polytechnic University of Valencia "interested in buying food straight from producers"; so the model is now sourcing from family farmers and 2 local small businesses to feed 50 families in the surrounding of the university. The (now) cooperative "aim to supply the urban population with clean, fresh, local and affordable food, while also creating the possibility for local farmers to generate income. Finally, *De Groene Schuur at Zeist*, in the Netherlands was initiated in 2013 by 1 consumer in Zeist, 50km away from Amsterdam and attends to 108 families via open orders on an internet application.

All those initiatives, share the fact that the "first step is given by consumers, other than that, the origin of each case seems to be contingent, although affected by the location and the socio-political and economic circumstances surrounding the actors involved". They share a set of characteristics like "localization", "Origin", "Supply Chain", "Food Production Methods", "Ordering Form", "Delivery Form" however a very diverse set of "Consumers" since "it is generally assumed that actors involved in the direct purchasing of environmentally sound products are limited to more affluent classes" (Potira Preiss, Fostering Sustainable Urban-Rural Linkages through Local Food Supply: A Transnational Analysis of Collaborative Food Alliances 2017). This issue would correlate with an ultra-processed food notion discussed by Monteiro earlier in

this review, stating that relative increases of consumption in ultra-processed food are higher in lower-income countries (C.A. Monteiro 2013).

The world has also witnessed the emergence of organization with wider scopes and resources to try and implement sustainable means to procure food and to advocate for small-scale producers:

La Via Campesina is worldwide a institution that supports food sovereignty and "emphasizes the positive synergies between agriculture, social justice, dignity and the conservation of nature" (Julia Leventon 2017) (La Via Campesina 2007). They believe that small scale producers have the capacity to feed the world population so they defend them alongside "sustainable agriculture while opposing corporate-driven agriculture" (Julia Leventon 2017). Another well spread movement across the globe is the Slow Food movement. Born in Bra by Carlo Petrini in 1986, Slow Food is a grassroot organization whom goal is to "prevent the disappearance of local food cultures and traditions, counteract the rise of fast life and combat people's dwindling interest in the food they eat, where it comes from and how our food choices affect the world around us". (slow Food n.d.). The Slow Food movement's "way of thinking" goes along with the notion that the International Food Policy Research Institute (IFPRI) roots for in fighting hunger and ending malnutrition via emphasizing on the rural/urban linkages: " Strong rural-urban linkages help propel economic development and improvements in food security and nutrition. When linkages are strengthened, farmers sell increasing shares of their produce in urban markets" (Jose Graziano Da Silva 2017).

The slow food message may have been consistent throughout the years, regrettably, the implementation notion was not solid enough to be adopted by countries, yet. "Slow Food, along with other similar organizations, have not to date been able to

develop a full-fledged citizen-based political mobilization nor address the issue of marginality in the food system (Kimura & Nishiyama, 2008; Van Der Meulen, 2008)" (Hall n.d.). And so it is still unclear whether the image of good taste in relation to hyper consumption is something that countries would want to prioritize on the expense of securing food to masses. Justin Myers sheds the light on how incapable this system is to challenge the urbanization and industrialization culture of fast food. A project research on the Basque Presidium suggests that practices of Slow Food in saving traditional breeds are not very far from conventional ways used elsewhere. The critique is extended to Slow Food USA "and its top-down approach, inability to base build, develop marketing strategies or economic models, and overreliance on volunteer labor" (Myers 2012).

2.4. Ethical Consumerism

AFNs look at the relations between people, however it looks also at their relations with the environment, as per the postulations of Moya Kneafsy et al. Kneafsy argued that the relation of "care" that connects consumers to suppliers as well as to places can go even further to include consumer behavior and practices. "AFNs support relations of care between people, and between people and their environments: consumers 'connect' to people and places through AFNs". Kneafsey proceed to deepen the relation mechanism of "from cooking for families and friends, to considering the environmental impacts of food consumption. Similarly, consumers establish 'connection' in different ways; from engaging growers in conversation to literally helping in the field" (Moya Kneafsey 2006). An approach that would directly link to the general knowledge of Consumer-Supported Agriculture (CSA) – nevertheless, the

threshold of such a direction in "ethical consumerism" is relatively weak, as Thompson and Coskuner-Balli imply in "Enchanting Ethical Consumerism" that this social phenomenon is "likely to remain a marginal social movement until an ecological crisis tipping point is reached or, perhaps and far more optimistically, until its underlying ideals and values can be enacted through marketplace alternatives that are more emotionally engaging and experientially captivating" (Craig J. Thompson 2007). "It reflects the anxieties associated with food consumption in contemporary society" and there are implications of good practices further triggered by consuming food ethically, like recycling and the intentions of households to consume almost everything in more ethical ways (Moya Kneafsey 2006). This "new food economy" described by Maye has led to the "introduction of environmental quality and animal welfare standards, new forms of consumerism and food activism, and the reconstruction of food chains around notions of quality, territory and social embeddedness, including a growth in food sales from 'alternative' retail points rather than supermarket outlets (Ilbery and Maye, 2005a; 2005b; 2006). (Damian Maye 2006) Thompson's, Kneafsey and Maye's literature suggest a linkage with a certain definition of food sovereignty presented in 2007 by La Va Campesina: "Food sovereignty is the right of peoples to healthy and culturally appropriate food produced through ecological sound and sustainable methods, and their right to define their own food and agriculture system" (T.D. Beuchelt 2012) (Campesina 2007) And in order to fulfil this mandate, food sovereignty has to find its way to fit into the existing food system and be flexible enough to change and accommodate to the recipient ecosystem.

Changes are not straight forward, there are many intriguing questions "about the political geographies of such localist movements" (Wills 2015) and if stakeholders are

effectively prone to "make the necessary changes to culture and relationships". Leventon raised the question of whether this should be controlled in order to find a common ground to avoid any conflict between what the food sovereignty's objectives are, and the choices that small scale producers or farmers make; and their impact on their community as well as on their neighboring ones. "Potentially the food sovereignty of a group of smallholders will not include creating surplus, thus influencing the ability of an urban population to be food sovereign". Since individuals have the right to choose between "how and what to grow or value", Leventon suggests that on the horizontal level "farmers and consumers might not want to act in conformity with what is promoted by the food sovereignty concept" (Agarwal 2014) (Steckley 2016) (Julia Leventon 2017).

2.5. Lebanon as a Case Study

Alternative Food Networks have attracted many interests and debates from around the world over the past decade, and continue to do so amid the dominance of the industrialization in food value chains. The literature helped in identifying the major characteristics of the system, notably the profiles of its stakeholders from different parts of the world, and the evolution within different epochs. It has, furthermore, highlighted the common challenges of family farms, small scale producers and cooperatives in their go-to-market approaches, as well as the controversial role of women as an underappreciated labour force. The challenges continue to emphasize on the quality control issue that is quasi-absent in AFNs compared to its omnipresence in the conventional system. The discourses have also shown that AFNs are home to cooperatives and grassroots initiatives; focusing on their influence and role in affecting the livelihoods of

their members and providing the equilibrium between artisanal supply from producers/farmers and a required high-value demand from clients.

The knowledge and the available information for the Lebanese context is very limited when it comes to the above mentioned topics. This study is among the first of its kind in Lebanon, and it aims at shedding the light on many aspects described in the above literature, but which are still considered ambiguous in the Lebanese context. The country still lacks a handful amount of data regarding its Alternative Food System, in particular nested markets and their evolution prior and during the meltdown. It is still in the dark about many local economic practices, and about the existing legislations' ability to sustain the livelihoods of the Lebanese Small Scale Producers, especially between the end of the civil war and the economic crisis of 2019. Hence, the researcher finds the urgency to reflect on the challenges of the sector throughout history and seeks to underline major challenges faced on the local scene. Socio-political traumas over the years are also a subject of investigation, notably the effect of those traumas on the willingness of small scale producers to change, modify or adapt their operations accordingly. The significant gaps and lack of data pushes the research even further to explore how rural/rural and rural/urban linkages are being affected and how the significance of Producers' Organizations/Cooperatives is being situated in the mix. As Lebanon is unfolding a new chapter post-October 2019, the study addresses as well the shaping of a "New Rurality" in re-organizing the network and see if new approaches are being fair for the local actors. The below sub-sections summarize the present situation.

2.5.1. National Level

A report on Lebanese cooperatives by the ILO, states that "the Lebanese agricultural sector faces many challenges, such as land fragmentation, high cost of production for small and medium scale farmers, lack of adequate and accessible postharvest facilities and services" (International Labour Organization 2018). Agriculture consists of almost 7% of the country's GDP, a rate that has been declining from around 12% before the civil war (1975-1990). The sector is considered the primary source of income to approximately 30 to 40% of the Lebanese population and represents 80% of the GDP in areas like the Begaa Valley and the south of Lebanon. (Ragy Darwish 2009) Lately, conservation agriculture is taking its toll on communities, especially with the increasing food insecurity and climate change. The research found that the adoption is still quite low, with prospects of amelioration driven by households' awareness of responsible consumption, policy makers' curiosity, and agribusiness firms' perception of a potentially viable market. Investing in cooperatives plays a significant role for that matter, the number in the South of Lebanon peaked for example between 2000 and 2009 after the Liberation of May 2000 as per the ILO. (International Labour Organization 2018)

During the 2000s, the country has witnessed the emergence of several initiatives that respond to the same objectives of sustainable production and consumption of food; Fair Trade Lebanon, Souk El Tayeb and Rural Delights which will be further explored in the remaining of the study, are examples of initiatives that work in the supply chain management of AFNs. The rise of social media around 2010-2012 assisted those initiatives greatly, however not enough to have them impact the sector as a whole. Come the crisis in 2019, the Lebanese government under the Ministry of Agriculture

has issued the National Agricultural Strategy (NAS) of 2020-2025, and has allocated a section on "Lessons learned from previous strategy" in which topics like unclear governance and un-interest from stakeholders due to a non-participatory communication emerged. That, in turn, affects the level of coordination between the MoA and concerned "donors, NGOs, universities, research centers, etc.". The report summarizes also other difficulties that the sector is facing like lack of modernization in transmitting information, out of date staff capacity, absence of M&E, insufficient public budget due to poor organization of resources and most importantly gender and youth exclusion (Ministry of Agriculture 2020).

2.5.2. Small Scale Producers' Level

Many researchers has been intrigued about "how smallholders are being able to reproduce themselves while being marginalized economically, politically and socially"? (Mosleh 2017) From a practical perspective, small scale producers in Lebanon suffer from elevated costs of production, "low productivity in key products" (IFPRI 2019), "poor farmers' organization and limited participation to value chains" (Mckinsey 2018). Moreover, incapacitated post-harvesting groundwork, "High import and export dependencies" notably on raw material and by-products (International Trade Center 2020), heavy business and registration procedures (Lebanon ranks 143rd on the Ease Of Doing Business Index) (World Bank 2020), mismanagement of land and soil, and finally water stress and jumble water allocations (Ministry of Agriculture 2020).

On the business level, "Smallholders are either on contract with big investors and companies or sell individually with very low prices because they produce small quantities to traders and/or wholesale market which makes them unable to achieve

economies of scale". The vicious circle lies in their struggle to sell their products in conventional markets and the scarcity of nested markets mediums in the country. From another hand, there are no clear policies on their inclusions into Producers' Organizations other than Cooperatives, and even they do not fail in raising some question marks. "Even if smallholders have the know-how in planning, managing and marketing their products and have access to the raw materials easily, they will still not be able to afford the risks and costs associated with it (Wolfenson, 2013)". (Mosleh 2017)

2.5.3. Lebanese Rural Bias

Until now, small scale producers have coped and been intelligently resilient to the manmade factors of social oppression and inequality; by design due to ignorance or by choice due to a certain agenda. The rural bias that is diminishing the opportunities of livelihoods is driving people to hibernate into urban areas in the hopes of finding a better quality of life (Tuomala 2020). This is deteriorating the Lebanese rural fabric and emptying the areas that are considered at the heart of any circular economy. "Post-war agricultural policy has consisted predominantly of sporadic and fragmented projects funded by external donors", while the rehabilitation of Greater Beirut on the expense of a rural neglect and the extensive external debt to finance this reconstruction have increased the belief that rural areas in Lebanon are neglected (Kanj Hamade 2014). One interesting example is the state of the Bedouin community that has been present in Lebanon since the Ottoman period, and their marginalization translates into the fact that they are still considered "stateless" and are often excluded from the government's services. (Chatty 2010)

This new version of the country in the post-civil war era has endorsed the "Supermarketization" notion, explained by Dr. Bahn and Dr. Abebe as "the expansion of modern food retailers—chains of large-format, self-service stores, selling a variety of food and household goods—in competition with traditional food retailers such as specialized retailers" (Rachel A. Bahn 2020). The supermarketization that grew in the 1990s has coincided with the rise of the intermediary cities in Lebanon. The number of Beirut dwellers has fallen from 60% in the 1980s to 34% in 2016, while the rural population has also declined in the same period to eventually have 54% of the Lebanese households settle in intermediary cities by 2016. That 54% is a quadrupled number from an 11% in 1980s (Rachel A. Bahn 2020). It all suggest that the desertification signs of the rural fabric are becoming more adamant, increasingly tangible and undoubtedly alarming.

2.5.4. Entrepreneurship and Equity of Distribution

Small-scale producers are a key part in the Lebanese Alternative Food System, and belong to a pool of Micro Small and Medium Enterprises (MSMEs) which the Ministry of Economy and Trade (MoET) has based its analysis on to issue a draft bill and define them within the Lebanese context. Albeit for a heavily subsidized sector, the interventions may not be influencing the macroeconomic setting, and even though NGOs and INGOs can open the way to fill certain voids by trying to intervene, their capacity might be limited. So how the national subsidized capacity be enhanced to affect the sector's infrastructure, and on what basis could this infrastructure be of service to not only the "entrepreneurs' wannabe", but rather to whoever belongs to this pool of informal and unconventional local food system? A diagnosis of the macro setting is expected to point out value chains components

that aids money cannot cover (or their agenda does not cover), and in which only skilled producers can benefit rather than the entirety of the group. Finally, why is this entrepreneurship discourse becoming a main driver to development – when development should be tackling wider constituencies rather than a minority of entrepreneurs?

In recent years, the country has been hosting a number of entrepreneurship incubators in order to help strengthening designated value chains and offer opportunities of growth to local talents in business development. In fact, Croci (2016) argues that "entrepreneurship is a distinct, being a discipline by its own right" and has the ability to operate independently as well as interdisciplinary" (Diandra 2020). A report by the Global Entrepreneurship Monitor (GEM) on Entrepreneurial Behavior and Attitudes in 2018 shows that Lebanese entrepreneurs are distinguished by lower "Fear of Failure Rate compared to their counterparts in the region, yet lower Motivational rate" (Global Entrepreneurship Monitor 2018).

2.5.5. The Good News

The result of the research paper aims at creating informative values to right a certain wrong, and the process is based on many positive notes. The sector has multiple anchors to rely on in its quest to influence the local scene. "Several Lebanese initiatives have capitalized on the typical and local products to provide support to farmers and Agriproducers in rural Lebanon". Rural Delights, Souk El Tayeb & Fair Trade Lebanon to name a few; are entities that aim to also convert similar Lebanese linkages. Each has its own approach coming from a specified background or doctrine, which suggests that their agendas may be forbidding them from influencing the national scale. Rural Delights for example are already selling in supermarkets, whereas Souk El Tayeb and Fair Trade

Lebanon have their own niche markets with business models that allow them to export for EU countries. They are, in fact, the result of a growing "Alternative Food" market in Lebanon since the early 2000s, "with the support of International donors as well as through local endogenous initiatives. The market demand that first focused on organic agriculture is now shifting gradually towards tradition and authenticity". (Hamadeh, ESDU Network Strategy 2014)

The Environment and Sustainable Development Unit (ESDU) has been working on empowering rural stakeholders, and particularly women, for the past 20 years now. Trainings, capacity buildings, community kitchens, cooperatives and many land reforms under the agro-ecology practices took and still are taking place. A portion of the sampled population for this research is anonymously retrieved from ESDU's network. Doctor Kanj Hamadeh has worked on summarizing the link between ESDU's initiatives to reach potential markets. The centre's development goals have been met in 2013 by the creation of the Food Heritage Foundation (FHF). The FHF's aim is to create markets to small scale rural producers via multiple initiatives like: Souk Aal Souk – a mobile farmers market, Akleh Community Kitchen – a centralized kitchen bringing raw material from several rural community kitchens and so on.

On the level of quality, Wajdi Khater has developed with the help of the ESDU network the Eco Label Standard that aims at fixating "certification requirements for the organizations producing & distributing food and beverage under Lebanese territories, by enhancing primary products and ingredients supply, that are climate smart, ethical and environmentally friendly". The scheme covers 6 smart indicators and can be developed to be adopted by companies and used as a credibility stamp for export purposes: "a) Efficiency of raw material supply, b) Management of production

managing, Labelling process and Usage of additives & processing aids, c) Water consumption and reuse, d) Energy efficiency, e) waste management and f) Chemical usage (Khater 2021).

CHAPTER 3

DESIGN AND METHODOLOGY

3.1. Overall Approach

Qualitative, quantitative and triangulation methods are employed in this research to assist in understanding the depth of the researched topic. Survey questionnaires with different actors contributing in the sector; starting from rural small scale producers (6 categories), the Ministry of Agriculture, Ministry of Economy & Trade, and moving to pioneers in the sector, consumers' perspectives and eventually archived data. It is fundamental to showcase, not only how food is produced and processed, but its impact in empowering local communities while preserving the environment and offering a sustainable diet, especially in the dimension of ethical consumerism. "As largely emphasized by the literature on this topic, rural development results from the combination of endogenous and exogenous forces (Ray, 1998; Gatto et al., 2016). This combination eventually consists in the interaction between local initiatives and extra-local ones" (Ray, Culture Economies: a perspective on local rural development in Europe 2001). The surveyed sample includes producers from different areas of Lebanon, covering 7 governorates (all except Beirut) and gathering households from different socioeconomic status, different genders and a diversified age range.

This research follows all confidentiality considerations and participant's protection. It also respects participants' privacies and refrains from revealing their identities, neither explicitly nor inductively.

3.2. Population

While speaking about locality we often refer to traditions, and ultimately with traditions come specialty. The diversification of the Lebanese resources has put the specialty products at the centre of our diets, however to ease the progression of this study, the 6 studied categories are:

- 1- Fresh Fruits & Vegetables
- 2- Livestock & Dairy
- 3- Provisions & Agro-Processed
- 4- Bread & Bakery
- 5- Alcohol
- 6- Honey

The aim is to identify, furthermore, the practices and discourses of resilience that are either born from individualistic initiatives or from movements. The objective is to situate the small scale producer – farmer may he/she be, or agro-food processor – visà-vis [existent or non-existent] rules and regulations; governmental legislations, subsidies that set the rules towards quality and market access, and finally towards the private and humanitarian sector. Not to forget their situation among intermediaries, monopoles, competition, imports, subsidized cooperatives and committed institutions who set the rules.

3.3. Data Gathering Methods

Government & Public Data (i), Consumers (ii), and Rural Small Scale Producers (iii), provide to an advanced extent data about the supply that is being injected into the market. The research has also kept an eye on existing and potential exporters, as well as

veterans in the field (iv) like representatives from Souk El Tayeb, alongside any other archived data whether from public sources or from previous professional work experience.

i- Government & Public data:

Under the administration of the Consumer Protection in the Ministry of Economy & Trade, we understood how does the process of quality control take place and what are the standards that are being put in hand regarding inbound goods and local ones. It was interesting to see as well how adaptable these standards are to small and inconsistent producers. The Ministry of Agriculture throughout its administration of the organic certificates has enlightened us about the rules and regulation of organic farming and how could small producers benefit from it. Furthermore, it shed light on comparisons between the Lebanese practices and international standards in organic farming, emphasizing on modern practices like aqua/hydroponic as well as a revision on permaculture.

ii- Consumers:

An online survey was circulated to consumers in order to understand more about their consumption trends and demands. The sample of 125 households answered questions related to purchasing mechanisms, relation with conventional food networks, their views regarding alternative options and their perception to quality versus price. They also gave an insight about their willingness to look for sustainably grown food, environmental friendly practices, and socially justice sources when conducting their shopping. And finally, their adaptation to the situation in Lebanon amid the COVID-19 widespread and the financial crisis.

From this questionnaire and from questions asked in the producers' interviews, we could understand the consumers' behaviors vis-à-vis the sector and how they react, considering that they are a pillar component in the equation.

iii- Rural Small Scale Producers

The parallel network of food production resides in the local communities mentioned here-above in the Population section. Looking at the data from a Food Security perspective is one thing, however looking at it from a Rural Development angle is another. The former makes sure that accessibility, availability, utilization and stability are met, while the latter looks beyond that, notably on the signs of economic, psychological, social, cultural and political empowerment dimensions. By using an adapted questionnaire, 43 rural small scale producers – belonging to the 6 abovementioned categories – offered information about their status prior the financial crisis on the operational and livelihood level, and their same status during the crisis. Questions about how their relations with the government, NGOs, markets, intermediaries, clients and other stakeholders were covered, as well as their practices to stay maintained during years of financial stability (early 90s until 2019) and now. The objective was to create a baseline analysis describing the economic practices, existing legislations, trends, evolutions, impact of financial meltdown and opportunities for small scale producers. Additionally, to also identify their willingness to change their operations to adapt, while detecting shifts in nested markets and their impact on rural/urban and rural/rural linkages.

Interviews were all personally approached and selected randomly from previous work experiences and from the network of the Environment & Sustainable

Development Unit at the American University of Beirut. The stratification was

categorically-based and not geographically, meaning that it did not matter from which rural area the producer was, as long as he/she belonged to the needed category.

Nevertheless, we managed to cover all Lebanese territories: North, South, Mount Lebanon, Nabatieh, Chouf, West and North Bekaa. The 43 producers' interviews were semi-standardized personal and professional ones. They were divided as follows: 7 producers belonging to the Livestock & Dairy sector including shepherds of sheep and goats, chicken growers, milk processors and a cooperative model; 9 producers belonging to the Provisions & Agro-Processed sector including people who entirely or partially grow their own raw materials, and a cooperative model; 9 producers belonging to the Fresh Fruits & Vegetables sectors including 2 certified organically and a cooperative model; 10 producers belonging to the Bread & Bakery category including gluten free bakers, Saj¹, traditional bread, crackers and a cooperative model; 5 producers belonging to the Alcohol sector including 4 micro-wineries and 1 small scale Arak² producer; 3 beekeepers belonging to the Honey category.

Each participant was interviewed only once, and each interview lasted between 35 and 45 minutes.

iv- Pioneers of the sector – Souk El Tayeb

Representatives from Souk El Tayeb gave a macro and pragmatic analysis based on their experience along the years in dealing with small scale producers and promoting the slow food movement. Furthermore, the gathered information includes a practical view on the evolution of the sector via unpublished data that is retrieved from a personal experience at Souk El Tayeb.

¹ "Traditionally, the Lebanese use a saj, a kind of convex metal disc for flat breads" - **Invalid source specified.**

² Alcoholic liquor of the Middle East, distilled from grapes, raisins, or dates and flavored with anise.

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3.4. Methodology Framework

The suitable framework that is expected to give a clear outcome on the findings of this study is a trilogy of a) the Sustainable Livelihood Framework developed by Chambers and Scoones (Scoones 1998) (Karam 2019), b) the empowerment framework advanced by Scheyvens – although its initiation in 1999 was directed to Ecotourism, the overall logic answers to many gaps in rural development as a whole (Scheyvens 1999) – and c) the Business Model approach adopted by Le Courtois the enhance the induction of small producers into markets, in her study for the FAO (Courtois 2011).

According to Chamber and Conway (1992), "A livelihood is sustainable when it can cope with and recover from stresses and shocks, maintain or enhance its capabilities and assets, while not undermining the natural resource base" (Chambers. R. and Conway 1992). Based on that, we will use the interpretation of the SLF developed by Carney in 1998 as an adaptation to Scoones', as shown

in Figure 1 here-below (Carney 1998) (Julie Newton 2011).

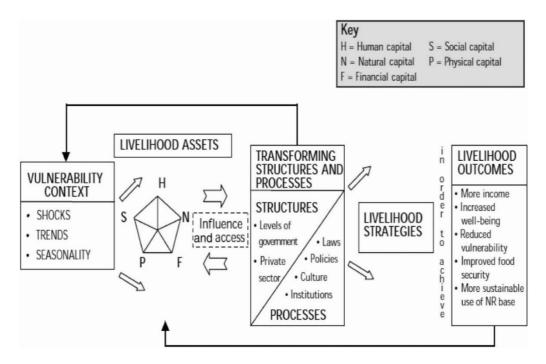


Figure 1: Sustainable Livelihood Framework

By assessing the local food system and identifying rural/urban and rural/rural linkages, the objective is to find ways enhancing the livelihoods of the parties involved. The social impact is the most relevant component of our study, and discussions that will follow the field observation will put into action the signs of empowerment/disempowerment within the rural development dimensions.

Empowerment and its increase degree of autonomy "refers generally to the capacity of disenfranchised persons to understand and to become active participants in matters that affect their lives" (Brian Bolton 1996). We can summarize the signs of empowerment introduced by Scheyvens and adapted to our study via the below Table 2:

Table 2: Framework determining the impact of Alternative Food Networks on Rural Small Scale Producers and other stakeholders involved in the chain, inspired by the work of Regina Scheyvens (1999).

	Sign of Empowerment/Disempowerment
Economic	- Are there any signs of economic empowerment in terms of access to
Empowerment	resources, access to technology, infrastructure?
p v	- What is the reason for farming/producing? Is it exclusively for home
	consumption with rare surplus to the market, mostly for home
	consumption and intention to sell in the market, partly for home
	consumption and partly for the market or exclusively for the
	market?
	- Are sales channels lucrative enough to sustain the livelihood of the
	family and how do they compare to pre-crisis era?
	- How is revenue being divided between retained earnings and
	household allocation?
	- Is the producer the sole responsible of the household income or is
	he/she jointly responsible with the partner?
	- Is the land/premises owned? What about access to credit?
	- What is the percentage of raw materials/by-products that are being
	bought from neighbouring communities/villages?
	- How did producers change their operations to adapt to the financial
Socio-Cultural	crisis and the devaluation of the Lebanese Lira?
	- To what degree is the family involved in the daily operation and in
Empowerment	the overall decision making?
	- What are the available producers' organizations and to what extent
	are producers engaged in them?
	- Is the village or surrounding community encouraging or showing
	signs of jealousy?
	- What is the percentage of women involved in the value chain of
	each producer, excluding the producer herself if she was a female?
	- Could the trigger to be innovative be the exclusion of the
	conventional system and willingness to prove oneself; lack of
	resources; allowance to create freely without restrictions/rules
	- Can rural tourism be considered as an additional income generating
	activity?
	- How are consumers reacting to the new and sudden supply of local
	alternative products?
	- Are communities losing respect to traditions and culture?
Political	- Is this study a place for respondent to raise their concerns?
Empowerment	- Are producers being engaged in the decision making on the level of
	their village, municipality, cooperative, producers' organization,
	- Are there any local, regional or governmental bodies in which
	communities can raise their concerns?
	- What is the degree of reliance on NGOs' subsidies and how are their
	interventions affecting the general directory of the sector?
	- Are subsidies being distributed equally or only to elites and/or
	individuals who show entrepreneurship characteristics?
Psychological	- In which area do producers think themselves distinctive? Price,
Empowerment	quality, social organization of time and space, availability of
	produce?
	- How is the self-esteem of the community being enhanced?
	- Are consumers showing recognition to the quality and to the value
	that are put into the chain to reach the final product?
	- Are producers seeking trainings and capacity building to improve or
	are they passive on that front?

- Are producers apt to ask for help from fellow producers or do egos create a barrier?
- Are producers being offered services like health insurance, vaccination to herds, awareness to potential diseases or any other in order to raise their confidence in the face of other risks?
- Based on the Rosenberg self-esteem scale, what is the average level of self-esteem on small scale producers in Lebanon, what are the causes that made up these numbers and what do those numbers tell us?

Another analytical approach that will alternate during our analysis is the "Definition of Business Model adapted to small farmers entering market for certified products" developed by Emmanuelle Le Courtois et al. for the Food and Agriculture Organization of the United Nations (FAO). This approach is summarized by the below components and reflected in the questionnaire used with rural small producers' respondents given that their craft is heavily composed of commercialization, trade and market access on both the alternative and conventional food selling channels:

- Strategic Choices of producers represented by "target market/positioning, choice of certification schemes, Quality Management System and participation and involvement in producer organization".
- Value Network established by producers and reflected by "solid relation with
 consumers, strategic partners for implementation, governance of the value chain,
 technical assistance providers, importance of social networks, development of
 agencies intervention and business enabling environments".
- Value Creation enabled by producers and their surroundings like "Attributes adding value, resources used, technical skills, planning and management skills".
- Value Capture and ability of producers to create retention in the market amid several disrupting challenges, "price premium, revenue streams, cost of

compliance to standards, cost of participation in producer organization, cost of certification and transaction cost". (Courtois 2011)

The need of this approach is to analyze the business behavior of producers as this aspect is at the center of their daily mandate and is directly affecting their livelihood. What are the capacities of producers to commit to the abovementioned criteria? And could this framework help us in differentiating between producers who show entrepreneurship characteristics and producers who are strictly oriented towards producing, without having to follow up on the post-production phase in the details that an entrepreneur is expected to follow up on?

Could this methodology assist us, furthermore, in identifying potential local agents that are able to provide operational services that would be considered a burden by producers?

3.5. Data Analysis

Data analysis begins by providing a clear characterization of a Lebanese small scale producer, based on national and international literature, and in compliance with the characteristics shown in the researched sample. The data is classified into 1) the status of Lebanese small scale producers prior to and during the financial crisis, covering their economic, social, cultural, political and psychological situations and 2) their situation vis-à-vis the government, non-governmental organizations, suppliers, consumers and intermediaries. The data is analyzed through a "constant comparison" method whereby each datum is compared with the rest of the data to form analytical categories (Karam 2019). Expansion of the data and creation of recommendations are

then based on observations and description of the retrieved information from either interviews or archived content.

3.6. Limitations

The work on this research has taken place in Lebanon during the COIVD-19 pandemic outbreak and in the middle of a financial crisis that has hit the country and devaluated its currency. Major limitations due to this turmoil were expressed by lockdowns and/or roads closures for demonstration purposes, which prevented us from reaching interviewees and conducting surveys face to face. And although the online alternative is considered a valid one in these exceptional times, it was not always a very popular medium among rural producers. Some tended to postpone, some others had their villages entirely infected and most of them had low morale and used the interviews to vent.

The study, nonetheless, is qualitatively oriented, which may be a setback for researchers who prefer quantitative analysis instead of qualitative.

We assume that the answers of the respondents are objective and that any opinion of theirs, that is subjective by definition, does not reflect any diagnostic of the researched questions.

3.7. Ethics

Throughout the data collection, the researcher proceeded after the research has been approved by the Institutional Review Board (IRB) at the American University of Beirut, and consent was being proven by the respondents. The researcher elaborated the

subject of the study and respected the will of any respondent to skip any question, and/or to stop if they were uncomfortable.

The research respects also the confidentiality considerations and participant's protection. No description nor documents revealing the real identities of participants has or will ever be disclosed.

CHAPTER 4

RESULTS AND DISCUSSION

4.1. The Lebanese Local Food System as We Know It

This research has surveyed 2 sets of respondents: the first set is comprised of 43 rural small scale producers from the South, North, Mount Lebanon, Chouf, Nabatieh, West Beqaa and Northern Beqaa areas; under semi-structured interviews to analyze their socioeconomic status vis-a-vis their inclusion in the Alternative Food Networks. Questions about their gender, age, marital status, number of children, and educational level asked, as well as direct questions about their business's monthly income and its division between retained earnings and family allocations in percentages. The second set of respondents comprised of 146 households living in urban, peri-urban or rural areas, and were asked about their purchasing trends of groceries, alongside the factors that affect their behaviour for that matter. The targeted respondents were random and not classified based on area, zone, age range and/or other demographic indicator.

The producers' age distribution showed the biggest portion of respondents was above 50 years old and a majority of males. The majority have a bachelor degree, and a significant number did obtain a master's degree (19%).

Table 3: Demographic Characteristics of the Samples

Rural Small Scale Producers			
Age Group	Frequency	<u>Percentage</u>	
18-30	6	13.9%	
31-40	14	32.5%	

41-50	4	9.3%
50+	19	44.1%
<u>Gender</u>		
Male	28	65.1%
Female	15	34.9%
Marital Status		
Married	35	81.4%
Single	8	18.6%
Educational Level		
Primary	5	11.9%
High School	8	19%
Bachelor	20	47.6%
Master	8	19%
PhD	1	2.4%

The main reason for the producers to adopt a farming or a producing craft is to sell 'Exclusively for the market' as claimed 56.4%. A noteworthy number produces partly for the market and partly for home consumption, while only 12.8% produce for home consumption as a first objective but with intention of selling surplus in the market.

This variety of ratios explains the fact that 81.4% of producer are full timers in running their businesses and basing their livelihoods on it. In terms of land ownership, the majority (65,1%) own the land or the workshop in which the production activity takes place; while additional land is usually rented or under-guarantee in the case of Fruits & Vegetables farmers and shepherds for grazing purposes. Most producers started with their

craft more than 6 years ago and their stages of evolution in between establishment and maturity will be explored in further analysis. As for consumers, the interviewed majority via the structured online survey were females (63.2%) with an age dominance of 25-34 and 45-60 respectively.

4.1.1. Characterization of a Lebanese Small Scale Producer

The historical characterization of small scale producers around the world has taken many shapes and is often bound by several factors or approaches. While the depth of producers within their regional economies and their relation to the Short Food Value Chain may well be of interest in some parts of the world (Damian Maye 2006), the global approach of the agricultural holding described by FAO in 2015 has summarized the multiple definitions and terminologies into one clear expression. (Clara Aida Khalil 2017) Characterizing the Lebanese small scale producer can be based on theoretical data as well as on pragmatic findings from the field. The adopted approach is to portray the SMEs sector in Lebanon as a pillar in the local economy, and attempt to retrieve flagrant traits that describe local small scale producers rather than limiting their polyvalent nature by a definition. SMEs in Lebanon constitute 95% of companies and create 50% of jobs as per Johnny Matta's report for the Ministry of Economy & Trade in January 2018. They are considered as "main economic drivers" where 73% out of them have a an FTE³below 10 (Matta 2018). Kamal Hamdan on the other hand states that Lebanon is home to 195,000 SMEs, where 88% of them employing less than 5 people. The agricultural sector comes

³ The calculation of **full-time equivalent** (**FTE**) is an employee's scheduled hours divided by the employer's hours for a full-time workweek. When an employer has a 40-hour workweek, employees who are scheduled to work 40 hours per week are 1.0 **FTEs**. Employees scheduled to work 20 hours per week are 0.5 **FTEs**. Source: www.shrm.org

second after the services sector in representing "the highest share of enterprises employing less than five individuals" with 92.5%.

Many strengths are paralleled with that section of the national economy like the Lebanese liberal economic system that empowers the work of the private sector; and the once powerful banking sector and knowledgeable human capital that helped in developing the sector to a certain degree, even if sometimes in subjective directions. Yet, the ill-protection of the Lebanese products in facing imports; the limited access to financials, the dire situation of infrastructure and of available technology; the expensive costs of inputs and most importantly the absence of "a regulatory framework that organizes the work of MSEs which currently operate under obsolete laws"; have generated unprecedented difficulties in driving the sector to flourish (Hamdan 2004).

It is understood from the interview with the Ministry of Economy & Trade that the ministry has issued a draft bill to define the Lebanese MSMEs based on who they are, how their sizes differ, and how themselves differ from one sector to another. The bill is yet to reach the Lebanese parliament to get the required votes and proceed for implementation. It is understood, however, that the approach adopted by the MoET on that front would distinguish commercial MSMEs from industrial and agricultural ones from one end; and distinguishes the micro from the small and the small from the medium based on the number of employees and on the turn over. To clarify, a commercial enterprise would need to have 1 to 10 employees to be considered small, while an agricultural one would need 10 to 25 and still be given the same reference.

Small scale producers involved in the Alternative Food Sector are part of the MSME connotation. Many literatures defined small scale producers based on specialized products instead of adopting a generic entitlement (Damian Maye 2006). Some have based their

identification on the level of sustainability in economic, social and environmental components (Henk Renting 2003), others based on their resources scarcity (Dixon 2004, Brooks et al. 2009, Murphy 2009) (Clara Aida Khalil 2017) and finally on a land size of less than 2 ha until the introduction of the 'Agricultural Holding' as a universal nomination by FAO.

However, the multiplicity of approaches in the literature regarding the definition of small scale producers from around the world, proves the level of complexity in defining them in a 'one-definition-fits-all' viewpoint. This study is adopting a different direction which is rather to characterizing them based on the flagrant traits and following Bose's methodology that was extensively described in the literature review in Chapter II – section 2 (page???). Pointing out characteristics in relation to a macro social and geographical context would offer a more malleable reasoning, and would leave wider sceneries to situate SSPs.

The characterization process will follow 2 axes; the first axe is in common with all SSP and describes the status quo of their existence based on indicators stirred by the literature. The second axe is further thorough into providing intimate indicators for each category that we have researched, and which allow us to envision the intimacy of each craft while moving forward, as presented in Table 4.

Table 4: Common Indicators Based on Bosc's Method and on Justifications from the Field.

Bosc's	Adaptive Fusion of Bosc &	Pragmatic Justification
Indicator	Lebanese SSP	
Labour	 Family dominance 	- 81.3% of SSPs have at least 1 member of
	yet presence of	their family helping them
	employees	- 28% of SSPs have full time employees and
	 High dependency 	their number is less than 50
	on seasonal	- 21% of SSPs hire strictly seasonal workers
	employees	

	T	
		- 25% of SSPs have a base of full time
		employees (<50) AND a number of seasonal
		workers that would range from 1 to 20.
Capital	- From nuclear	 Upon asking SSPs if they have access to
	family OR from	credits given their 'Free Profession' status,
	extended family	78.9% answered yes.
	- From access to	•
	credits	
Management	- Family decision	- 85% of SSPs do not have someone outside
wanagement	making OR	their family circle who participates in the
	- Solo decision	
		decision making
	making of producer	- 45% of SSPs share the decision making with
	OR	their wife/spouse
	- Mutual decision	- 42% of SSPs take their decisions solely
	making with	
	wife/spouse	
Home	Existent, yet could range	- 69% of SSPs consume less than 20% of their
Consumption	from negligible to partial	produce at home, among them 51% consume
_		less than 5%
Legal Status	- Formal status with	- 58% of SSPs have registered a legal entity
	registration of	and their brand name
	entity and brand	- 9% of SSPs have registered a legal entity
	name	without registering a brand name
	- Formal status with	- 37% of SSPs do not have any formal status.
	registration of	3770 of SSI 5 do not have any formar states.
	entity only	
	- Informal status	
	with no registration	
	whatsoever	
Land	- Property owned in	- 65% of SSPs own their premises
Ownership	full	- 11% of SSPs partially own their premises
	- Property partially	- 23.3% of SSPs are renting the premises to
	owned	conduct their production/farming activities
	- Property rented	
	Addition in	dicators via field visits
Market	Selling in:	
Orientation	-Farmers Markets	- 58% sell in Farmers' Markets
	- Specialized Shops ⁴	- Around 50% sell in specialized shops
	- Households in the same	- Around 42% sell to households in the
	village	same village and to neighboring villages
	- Households in	- Selling online has witnessed a growth
	neighboring villages	from 17% to 53% on the level of SSPs
W7:11:	- Digital	from 2019 to 2020
Willingness to	Hesitation and/or no	- 56% of SSPs do not wish to have their
exist in	intention is selling in	products featuring in the supermarket.
conventional	conventional spaces	

⁴ Shops that sell organic, bio and specialists products directly sourced from producers and are usually situated in high end areas in order to substitute weekly farmers' markets.

stores (supermarket, Hesbeh ⁵ Marke or others)		
Supply of big orders	Ability to supply big order in short time frames	- Lebanese SSP needs an average of 5 days to supply a big order
Governance of the value chain	High governance of the value chain	-76.7% of SSP take care of absolutely all the components of their value chains, not only producing.
Exposure	High reliance on the 'Word of Mouth'	 -81% of respondents have indicated that 'Word of Mouth' was and still is the primary and the most impactful tool of widening their clients' circle and acquiring new ones.
Certification	Deemed unneeded or too expensive	-67% of respondents do not have certifications, out of which 86% do not believe they need it at this level, or think it is too expensive or do not trust the system that grants it

Moreover, 56.4% of respondents are in the early growth stage, however this indicator is heavily related to the amount of years they have been operational in. Lastly, the mode of production plays a big role showing that SSPs always have the traditional aspect of production, while modernity seldom dominates.

The second axe of characterization focuses on what each category of producers has to offer *beyond* the common indicators of the above table 4 to generate a more wholesome scheme. That scheme is relative to the geographical size of the country, to the size of its GDP, to the availability (or unavailability) of market-access infrastructure and to the perception of the Lebanese social fabric.

Fruits & Vegetables:

⁵ The conventional fruits and vegetables market in Lebanon

Table 5: Characterizing a Lebanese Small Scale Producer in the Fruits & Vegetables Category

Sub-indicator	Sub-indicator adaptation:	Sub-indicator justification:
name:		
Size of the land	Less than 1 ha	"72% of the total number of farm operators operate a useful agricultural surface less than 1 ha". (Tala Darwish 2012)
Yearly Income	Does not exceed \$26,859/year	Gross Cash Farm Income (GCFI) used by USDA suggests that "a small farm is one
meome	The average yearly income retrieved	that produces and sells less than \$250,000
	from our 10 Small scale farmers is \$34,800 where \$1=3900 (BDL) rate	per year" (Clara Aida Khalil 2017).
	and which is almost half the actual	If we take the GDP per capita in the US and
	market value of the dollar at the time	we compare it to the Lebanese GDP per
	of writing this dissertation	capita, we can create a parallelism as per the below formula. Consider 'x' the
		needed revenue of the Lebanese SSP and: - \$250,000 the needed revenue of a US
		SSP - \$53,240 ⁶ the US GDP/Capita (2020)
		- \$55,720° the OS GDP/Capita (2020) - \$5,720° the Lebanese GDP/capita
		(2020)
		Then $53,240/250,000 = 5,720x$
		x = \$26,859
		Indeed, the average is \$34,800 (on the BDL
Adomtod	Farmers Market, Households and	rate of 3900LBP) Data showed that the most recurrent sales
Adopted sales	Specialized Shops	channels for F&V producers are:
	Specianzed Snops	1- Farmers Markets with 60%
channels		2- Households and/or Specialized shops with 30% each
Use of	Total absence of synthetic pesticides	100% of interviewees in the F&V category
synthetic	and herbicides	do not use synthetic pesticides and/or
pesticides and		herbicides, which means that their practice
herbicides		is not industrialized enough to need them.

Livestock & Dairy:

As for the Livestock & Dairy sector, the sample included chicken growers'/egg producers, sheep/goat shepherds and milk processors.

 6 Source: www.tradingeconomics.com

Table 6: Characterizing the Livestock & Dairy Producers

Sub-indicator	Sub-indicator	Sub-indicator justification:
name:	adaptation:	
Sales Segmentatio	Selling to a nice	4 out 6 Livestock/Dairy producers consider themselves selling
	segmentation	to a niche segmentation, and consider that their product has
		the same or higher price than its conventional counterpart.
Months of high	March to September	The concentration of highest production with all
production		Livestock/Dairy respondents fell in the bracket between
		March and September where grass is available for grazing and
		chicken are able to eat on a free-range basis.
Production Mode	Traditional	5 out of 6 Livestock/Dairy producers use traditional
		techniques for production

Agri-Processing Producers:

Table 7: Characterizing the Agri-Processing Producers

Sub-indicator nam	Sub-indicator adaptation:	Sub-indicator justification:
Use of Credits	Credits are mainly used to purcha	6 out of 9 respondents from this category used
	bi-products and raw materials	their credits to buy either raw material and/or
		bi-products
Help in the	The main help needed to	8 out of 9 respondents from this category need
optimization of	optimize the business is in	help in 'Production' and/or 'Machinery' to
the business	Production and in acquisition	optimize their business efficiency
	of Machinery	
Adopted sales	Low reliance on	Only 2 out of 9 respondents from this category
channels	Supermarkets and other	have 'supermarket' as one of their sales
	conventional stores to sell	channels while the others linger between
	their long shelve lives	Farmers' Markets, Specialized Shops and
	products	nearby Households

Bread & Bakery:

Table 8: Characterizing the Bread & Bakery Producers

Sub-indicator name:	Sub-indicator	Sub-indicator justification:
	adaptation:	
Monthly Income	Does not exceed	77.7% of B&B respondents' monthly income does
	5,000,000LBP	not exceed the 5,000,000LBP
Mode of Production	Traditional or Mix	5 out of 9 bakers use traditional ways to produce,
		while the other 4 use mixed modes (Fusion of
		traditional and Modern)
Components that create	Skills & Competencie	5 out 9 bakers think that their Skills and
value in the value chain		competencies are the reason behind the value
		adding attribute.

Alcohol:

Grapes are among the indigenous crops of the region, and Lebanon has capitalized on it throughout history to create a wine and an Arak industry that is heavily exportable, and hence viable.

Table 9: *Characterizing the Alcohol Producers*

Sub-indicator name:	Sub-indicator adaptation:	Sub-indicator justification:
Number of Bottles	Less than 30,000 per year	All respondents base their livelihoods on less than
		30,000 bottles per year.
Price in comparison	Price higher than industrial	80% of respondents have their prices higher than the
to industrial	counterparts	market price
Price Premium	SSPs willing to create a price	80% or respondents are willingly creating a price
willingness	premium	premium to differentiate themselves

Honey:

Table 10: Characterizing Beekeepers

Sub-indicator name:	Sub-indicator adaptation:	Sub-indicator justification:
Number of Beehives	Less than 500 beehives	All interviewed beekeepers own less than
		500 hives
Production capacity	Low capacity to expand on markets	All interviewed beekeepers were not able to
		increase their capacity to supply new
		markets
Reason for starting	Family business	All interviewed beekeepers had the craft
		already running in the family before taking
		over

4.1.2. Description of the Lebanese Alternative Food Value Chains

After characterizing the Lebanese Small Scale Producers based on observations, this section maps the supply chains and the relative traits that particularize each category. "Specialist food chains are, it is argued, 'hybrid' in form in the sense that businesses are dependent on national and international supply links, including links with 'mainstream' suppliers" (Damian Maye 2006). The figures below offer detailed flows of work from the

acquisition/farming level until reaching the consumer level; and it highlights the different roles of point of sales, local and foreign suppliers, surrounding communities, conventional markets and the perspectives of producers on each level.

The fight against rural poverty begins by bridging the gap between rural and urban communities while enhancing the productivity and profitability of local small producers (Oriana Gava 2021). Alternative channels are able to provide such an achievement, notably due to the fact that they create a higher level of participation for stakeholders compared to other systems, and englobes a vital participation for intermediaries who are required to understand the impact on producers' livelihoods (Courtois 2011). Hence, and as Slater iterated in 2009, the exchange of food between customers and producers must follow a notion of social agreements situated at the base of a social security that enables rural communities to capitalize on their assets and secure their income (Rachel Slater 2009). Building community resilience, in this case, begins with production since it gathers the components of territorial, economic and cultural resources that are to be used in sustaining the chain (Ray, Culture, Intellectual Property and Territorial Rural Development 1998). *Fruits & Vegetables and Livestock & Dairy:*

The 2 chains are similar in on many levels as presented in the below Figures 2 & 3. The flow of the Fruits & Vegetables category starts by producers acquiring seeds, seedlings and compost from local suppliers, and organic seeds, packaging, agricultural equipment, new variety of seeds, and peat from outside the country via conventional import suppliers. Some farmers exercise open-pollination practices for some varieties and the manufacturing of bio-medicine. However, success is limited in the latter which is one of the problems since they are scarce and expensive. Lebanese small farmers sell most of their products in farmers' markets and directly to households, while the emergence of specialized shops has

also provided them with access to markets but with a percentage on the sale. Products can reach the shelves if sold to supermarkets or via the Hesbeh market as per an interviewed farmer, however the purchasing price would not be fair due to severe competition by big farmers and due to the cuts of intermediaries. This process would turn the farmer into a merchant, which is not the desired outcome. The direct sales channels are deemed enough to sustain Fruits & Vegetables producers, however not much via specialized shops.

Specialized shops may be better than Hesbeh's intermediaries but that does not make them offer fair margins. For this category, the acquisition of imported bi-products may be the closest point of relationship between farmers and the conventional world. The majority of the needed packaging is plastic bags or paper bags, both having imported raw material and being manufactured in Lebanon – so the devaluation of the currency is automatically affecting the cost and the eventual final price.

A silver lining may occur in the future about bio pesticides since Arc En Ciel, a well-established local organization, developed during recent years "Le Biop". Le Biop is a collaboration between AeC agricultural program and the science faculty at the Saint Joseph University to mount a bio-pesticides factory, and provide farmers with affordable yet environmentally-responsible products. Bio Pesticides are usually expensive, not to mention the fact that they are imported, which is a huge constraint nowadays. This product is expected to tackle and fight the "Lepidoptera, a pest family that is currently threatening Lebanese pine forests and may cause damage to many crops: vine, olives, tomatoes, apples"

... (Arc en Ciel n.d.).

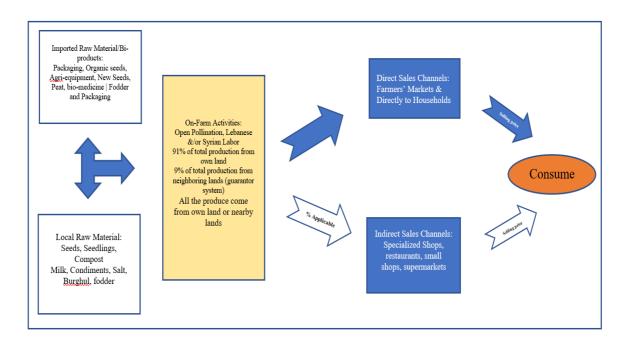


Figure 2: Agriculture & Livestock Value Chain

Finally, although direct sales offer better margins to producers, they do oblige them to travel an average of 3 days per week to conduct a sales or a delivery activity, a time that the producer can better use to take care of the land since 91% of this category respondents' produce comes from it. Among the 10 interviewees of this category, only 1 producer outsources the delivery services.

The Livestock & Dairy flow has a similar chain. Mainly, packaging and fodder is imported, while the local scene offers the milk for diary manufacturers, condiments, salt and some fodder for local growers who make their own. Even fodder is not bought in big quantities because of the free range and grazing approach. The direct sales channels are mainly focused on direct orders from households and farmers' markets come in second place. While the indirect channels prioritize the Business-to-Business (BtoB), notably

restaurants with small conventional shops and specialized shops coming in second place, and this is the only detected relationship between this category and the conventional world. One cheese processor in the North says that supermarkets are becoming smoother in the crisis while dealing with local producers. Conventional Point of Sales (POS) are not always fair in general with their allocated margins, but that does not forbid producers in admitting that they usually give a good service in exposing and selling the products. Selling in conventional outlets does not mean that the operation is industrialized in this case, this cheese factory employs 35 people to maintain the handmade tradition in production. The problem relies in barcoding as it is considered a hassle at this level on the operational level and on the financial one.

Longer Shelve-life products (Provision & Agri-processed, Bakery, Alcohol and Honey)

Producers of Provisions & Agri-processed foods do not usually bring raw material from their fellow producers, as the case of molasses shows. Some producers for example use molasses in their recipes as a substitute for sugar, or as a flavour to their crackers; so they get them from a local winepress in a nearby village that presses on a seasonal basis the suitable quality for processing. The quality is not considered industrial nor bad, and the source of the grapes, pomegranates and other fruits is known and can be tracked. These types of chains exist since the producer who aims at manufacturing pure quality molasses tends to sell them directly to households, and they differ in quality to the one aimed at being processed.

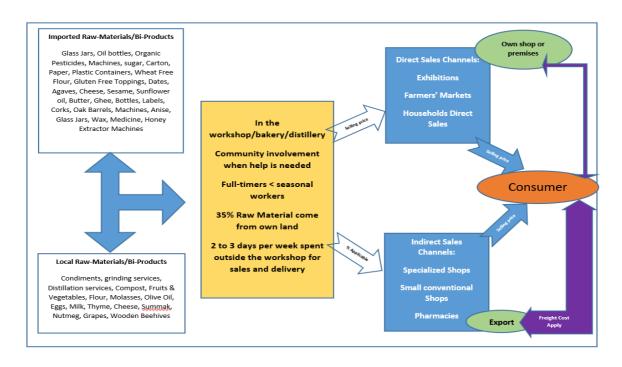


Figure 3: Value Chain of Longer Shelve-life products (Provision & Agri-processed, Bakery, Alcohol and Honey)

Other services required by local producers may be grinding services and/or distillation services since not everyone has these facilities. The outsource is usually from the same village or region, and also includes labor from the surrounding community in case the producer needs it. The number of full time employees in this category is lower (Average 4.4/producer) than the number of seasonal workers (Average 6.2/producer), compared to the previous category of Livestock & Dairy, where full timers are much more needed than seasonal workers. The interviewed sample averaged only 35% of raw material coming from their lands, whereas 47% coming from the nearby ones, which shows high engagement in community linkages.

On the sales channels side, producers affirmed that retail is more important than wholesale as the small nature of retailers treat the products gently, contrary to what

wholesalers do. Some producers have their own shop in the village and a minority succeeded to export on a regular basis several years ago - contrary to the majority who started their exporting attempts during the financial crisis.

The emergence of alternative channels like specialized shops, farmers' markets, online and digital sales channels and the considerable amounts spent on logistics and delivery by those channels have created a breakthrough in society and changed the behavior of some consumers. As per a producer, people are not buying provisions on designated times of the year to keep them for later use anymore, because the availability of these products is making the purchasing much accessible. In matter of fact, only 46.5% of the interviewed respondents for this study consider that the availability/unavailability of their products is a distinctive allure of their value chain.

This applies to the gluten free producer that were interviewed in the Bread & Bakery category. A young woman in Tripoli who opened her shop to cater for people who have gluten intolerance, is struggling to find local raw materials like wheat free flour, soja flour or maize flour. Since only a small portion of the population suffer from gluten intolerance, gluten free products do not feature everywhere in the market, but instead in key places like specialized shop. The same problem applies to sourdough baking: one baker mentioned that they were selling to a niche segmentation initially but they soon discovered that it is not that niche but rather unconventional, meaning that "it is not widespread and it is not very much offered, so you need to ask for it". An interesting pattern have been noticed for that matter; which is the fact that bakers are either producing to sell in specialized shops or are baking to sell in small conventional shops. Their strongest channel to sell however was via exhibitions; mainly the ones organized by religious entities and which promote traditional

baked goods based on distinctive holidays. The Easter Maamoul⁸ is one example out of many, notwithstanding many others that occur almost during each month of the year.

Bakers were making a good living out of their craft prior the financial crisis, some had their income greatly threatened once hit by the crisis and by COVID-19. Many shifted to online and to specialized or conventional shops where fair margins on the selling price is applied contrary to other categories.

Micro-wineries and small distilleries rely on their locations to create traffic for their brands and increase their sales. Most of the interviewed alcohol-makers use the visits to their premises as significant sales channels, accompanied by their existence in specialized shops (mainly alcohol boutiques in this case), and on export. Many tend to feature their bottles in restaurants likewise, small ones mainly – however they are faced by the big companies who have huge marketing budgets and can offer better prices for restaurants, unless those latter want to distinguish themselves and serve alcohol from micro-wineries or micro distilleries. One interviewed micro-winery differentiates itself by adopting the biodynamic practices in cultivating and producing their alcohol, for example. Although information and references on the depth of the biodynamic wine is still somehow limited, the general conception frames it as being "produced with grapes obtained without industrial chemicals but activating the nutritive elements present in soil; the vine is cultivated according to the cosmic and lunar cycles and vinification takes place only with yeasts naturally present in the grapes" (S. Troiano 2020). Troiano et al. believe that many variables play a role in wine preferences among consumers, notably the situational determinants, product involvement and demographic variables. The willingness to pay in that case is bound to specific information, followed by proper experience (tasting in that

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⁸ Baked sweetened dough filled with dates, walnuts or almonds – traditionally made during Easter time.

case); which are the components of the local micro-winery's strategy. The story and the process upon which the wine has been finalized are the main techniques used by the Batrounian winemaker to promote the brand.

In brief, the existing channels are well sustaining actors of the alcohol category as international exposure is being provided by the Ministry of Agriculture, and hence exports play a big role in liquidating their stocks, even on the smallest level.

All 3 honey producers do not have a production capacity that allows them to add more sales channels. Small size beekeepers are not interested in selling in small conventional shops, they seldom have enough honey production to cover their whole calendar year.

Interestingly enough, one producer is so confident of the quality the bees produce that he is targeting pharmacies to sell his jars. They all rely on direct sales to a group of consumers that has been historically acquired by the family business. It is not very common for beekeepers to need seasonal workers, and their hives are usually on their own lands or on lands of their acquaintances, depending on the needed altitude vis-à-vis the season.

Environment sustainability plays a big role in defining the quantity and quality of the honey, for example synthetic interventions of pesticides on greenery will automatically affect the bees in a negative way.

Finally, 56% of producers from all categories do not wish their products to feature in supermarkets and/or other conventional stores of the like. Other intermediaries like the specialized shops that exist to either sell organic, rural or small scale producers' goods in Lebanon do take margins from the overall market price set by the producer; and percentages on sales in this case is a negotiation between the store and the producer. The average percentages range from 25% on selling price for Fruits & Vegetables, 12% for livestock & Dairy, up to 30% on Agro-Processed goods depending

on the product, 15% to 20% for both the Bread & Bakery and Alcohol and finally 20% for the Honey.

4.1.3. Market Access and Existing Legislations

The Ministry of Agriculture and the Chamber of Commerce are the two most referred-to agencies by respondents. It is worthy to note that Non-Governmental Organizations come in third, which suggest further investigation on how much the sector is being subsidized. The vigorous communication between "the state, the market, and civil institutions" avoids any rupture within the system and boosts the clarity of the decision-making processes on each layer regarding topics related to development (Uphoff 1993). In brief, the well communication between that trilogy sits at the helm of an effective political participation, which is critical for rural development to strengthening the linkages on the national-local level, while responding to participation in sustainability and without jeopardizing the aid that the international community's injections. (Adisa 2012) (Dedabaev 2013)

The MoA in Lebanon opens the door for alcohol producers, especially winemakers to exhibit their products in international fairs on a yearly basis to encourage the export of such commodities. Moreover, the Industrial Research Institute (IRI), which is a non-governmental organization, offers winemakers quality control tests on the imported bottles; while the Lebanese Agricultural Research Institute (LARI), a lab that operates under the MoA, offers chemical analysis on the quality of wine. LARI has also recently launched a department for wine that helps in conducting research on the soils of the vineyards.

Before budget cuts, the MoA used to provide beekeepers with medicines to protect honey bees from the Varroa Mite or Varroa Destructor that disrupts the behavior of bees and

affects their flying mechanisms as well as their reproductive systems (Amélie Noël 2020). Nowadays, producers seldom receive vaccination, feed or awareness about diseases and problems, only one third of respondents received such services from the government at one point, while the rest receive the bulk of services from NGOs and INGOs, and are usually revolving around training and workshops about generic topics.

The Chamber of Commerce serves the private sector in terms of legislations and policies on the macroeconomic level, while on the microeconomic one, the Chamber "provides a broad array of services to enterprises: consular services, [...] training, economic reports & publications, economic delegations, business development projects with EU, matchmaking events, exhibitions, arbitration and mediation, and so on". Other vital services provided by the Chamber of Commerce like the issuance of the GS1 system for barcodes, as well as agricultural services in terms of lobbying, negotiating and collaborating with regional chambers for the ultimate good of the Lebanese economy. The Chamber also provides the ATA and the TIR Carnets that "allows speeding up border crossing for goods transiting by roads" (Chamber of Commerce Industry and Agriculture of Beirut and Mount Lebanon n.d.).

The Ministry of Public Health has also emerged as a candidate mentioned by one of the Livestock & Dairy producer since the Ministry's Food Safety department does work on food inspections, develops checklists and investigates food samples.

In terms of certifications, organic ones are given to farmers under the CCPB body of the MoA. The CCPB is a certification agency that "certifies organic and eco-friendly sustainable products all over the world" (CCPB n.d.). Its representatives in Lebanon visits the farmer twice per year on average, and take specimen to check on the quality. ICARDA is also involved yet on a less formal level to give tips and information to farmers.

It is noticeable that the most common offerings provided by the above-mentioned entities are administrative and institutional, and their abundancy in such a small country suggests the existence of a widespread targeting. Regrettably, some producers claim that they are isolated vis-à-vis those services, while others are making sure not to be on the ministry's radar in fear of being harassed by costly registration processes and which are usually imposed in the absence of political party protection. This implies that the general behaviour in the country contradicts the understanding of what a local sustainable food system can provide; which is beyond financial gains as argued by Feenstra, and more of a home to strong public relations that lead into divers cooperation and engage stakeholders in a deeper civic life. (Feenstra 1997)

Agri-processed food producers lean on private entities like Boeker, ISO and the Ministry of Industry for export clearances. Boeker provides food safety trainings on hygiene and food safety (Beocker n.d.) while the International Organization for Standardization (ISO) develops "International Standards" but are not in the business of granting certifications as this task is given by external private certification bodies administered by the ISO's Committee on Conformity Assessment (ISO n.d.). The Lebanese technical norms on the food and beverages production level require a bouquet of interministerial procedures that need peculiar follow up by producers. As this situation might not be the most practical one, it validates the notion of food politics described by Goodman "as relational and process-based rather than perfectionist" (David Goodman 2012). For example, the needed clearances from the Ministry of Health and the Ministry of Economy and Trade to eventually be able to acquire a license from the Ministry of Industry are procedures that are indispensable for producers who are aiming at exporting their products. They would also need on top of the previously mentioned documents, a quittance document

from the Ministry of Finance. The system is not flawless, and is always subject to improvement when conducted via a suitable communication mechanism among parties as indicated by Goodman. The organic certifications of honey, for example, are based on tests conducted by the LARI, an attaché to the MoA; whereas the standardizations at the Lebanese Standards Institution (LIBNOR) - a public institution attached to the Ministry of Industry – only identifies the conventional production of honey, and might create bottlenecks for beekeepers who want to sell in the organic niche. This diluted system does not suggest that public-private partnerships on the level of certifications for farmers cannot take place, it proved to be successful in Chile with the National GAP Program as iterated by Courtois. (Courtois 2011)

With regards to financial services, Al Qard El Hasan is considered a reliable source of support for designated societies within the Lebanese community. It emerged after the Israeli invasion of 1982 to help resisting communities and was later in 1987 licensed by the Lebanese Ministry of Interior. The association specializes in giving small loans over a short period of time in return of a financial and/or in-kind guarantee helping it sustaining itself. The support is social and productive at the same time, meaning that even MSMEs can benefit under certain conditions like investing in infrastructure with the borrowed money as reflected by one respondent from Nabatieh (Al Qard Al Hasan Association n.d.). The Kafalat system on the other hand is also a tool for SMEs on the industrial, agricultural, touristic, traditional crafts and high technology level, serving as a guarantor for commercial banks to ease the process for SMEs to acquire funds. These funds are based on "business plans and feasibility studies that show the viability of the proposed business activity (KAFALAT S.A.L. n.d.). The low interest on those loans were beneficial to small scale producers who used them to invest in their infrastructure and in buying raw material,

however acquiring a Kafalat loan is not as smooth as the producer wishes it to be, not to mention the modality of payments that are often accompanied with endless conditions. Among the 43 rural respondents, only one producer mentioned the Green Plan of the Ministry of Agriculture. It is a subsidized program that aims at helping land owners to rehabilitate their lands, plant trees, install irrigation systems, set up fences and reconstruct terraces. In the case of this project, the farmer is asked to pay a contribution of the total fee to the Ministry of Finance after meeting the eligibility criteria. As per the MoA 2020-2025 strategy, the Green Plan's operations are undermined by 3 major problems: ": the sharp reduction in its budget, which is almost exclusively depending on external funds, the lack of staff, and updating legal framework" (Lebanese Ministry of Agriculture 2020). Obviously, from one end, the government is failing to project trust via its services to create consistency in its offerings, and the public skepticism on the equity of access. From another end, some Lebanese producers are keen on taking the easy road in their practices on the expense of the final product. For example, the MoA used to bring an organic medicine for beekeeping called BeeVital. It got a wide rejection from whoever uses Amitraz as a repellent since the latter comes for cheap from Syria and does not require extensive follow ups. With time, this resulted in creating residues that are captured by tests conducted on honey by importing foreign countries, and to eventually threatens the Lebanese honey sector in getting blacklisted.

Dr. Kanj Hamadeh explained that the governmental neglect that is exponentially growing and the absence of regulations would allow people who are financially capable to take over the sector of agriculture, and their experience may disrupt the system. Parameters in Lebanon are still unclear, and solutions reside in local development of technologies and in youth to protect the social fabric from the opportunistic trap. Labor is becoming cheap

and refugees can even work for cheaper, which indicates that some barriers are easing. Another form of protection could be the "reform of the agri-financial system and mutual support since the Lebanese constitution has already the legal frameworks for equity investment funds". Subsidies in that case can be a short term solution given the existence of a solid national policy that promotes circular economy and protects the sector (Hamadeh, The Crop Production & Access to Finance in the Agri-food Sector - Agrytech Learning Session 2 2021).

Finally, the trust that the government is not establishing is not the only macro disadvantage; a representative from the Ministry of Economy & Trade claims that many NGOs and funders work with the ministry to help local producers on many levels, but only with registered ones. Establishing a constructive communication mechanism as suggested by Uphoff invites producers to be on the government's radar, which is essential to facilitate their adherence into the economy, and grants them access to international subsidies for development project.

4.1.4. Livelihood Assessment and Income Repatriation

i- Economic Impact

The Economic Impact, in the case of this study, is the display cabinet of the overall empowerment or disempowerment of rural communities engaged in growing, producing and/or extracting edibles in the aim of self-sufficiency and what is beyond; commercial activity. Solid rural/urban linkages (Oriana Gava 2021), grassroots initiatives as support movements (Potira Preiss, Fostering Sustainable Urban-Rural Linkages through Local Food Supply: A Transnational Analysis of Collaborative Food Alliances 2017), cooperatives with their horizontal governance system (Aglaia Fischer, Marvin Nusseck 2020), socially

responsible intermediaries (Courtois 2011), tourism in rural areas and with rural communities (Arrage 2019), and the macroscopic approach of nested markets that work on the redistribution of resources (Jan Douwe Van Der Ploeg 2012); are channels that lead to decent economic impact when implemented properly. The impact in that case can be measured by how are these channels affecting producers, their families, their surroundings and their business in general. Moreover, investigating the impact suggests exploring the resources (human, financial, technical...) that are used and if those resources are optimizing the economic situation of rural subjects.

To contextualize the above, and based on Courtois's adapted Business Model approach for farmers (Courtois 2011), it is fair to describe based on the data retrieved from the field the situation and impact of 3 main components: revenue streams pre and post meltdown, revenue division and allocation of resources.

Up until the economic crisis of 2019, 80% of respondents were financially well sustained by the channels they use to expose and sell their products. Farmers' Markets came as the highest impactful medium in which approximatively 59% of producers used them to reach out to their customers. Specialized shops and Restaurants(B2B) came in as second most reliable mediums with 49% each, whereas direct sales to households in the same and/or surrounding villages proved to be also effective with 44%. These trends shifted in numbers by the beginning of the crisis at the end of 2019 and by the spread of the COVID-19 virus during the first quarter of 2020. The two major setbacks have affected the reliance on Farmers' Markets and on Restaurants which decreased by 12% and 16% respectively. They triggered in the market a noticeable growth of Online Sales (e-commerce) and on Specialized Shops. The reliance of producers on e-commerce increased by 26.5% and on Specialized Shops by 3%. Sale channels that were used during the pre-

crisis era managed to financially sustain 80% of respondents, the switch to the new channels during the post-crisis era/COVID-19 pandemic accommodated the financial sustainability of 63.4% of the sample.

On the level of revenues division, allocations differ between individual/family small scale producers and cooperatives. While cooperatives prioritize paying for the farmers on a pre-payment basis since "it is the right thing to do" as per one interviewee; individuals retain on average 67% of their earnings to be reinvested in the business and spend the remaining 33% on home allocations. The re-injection in the business is in many cases spent on raw material and bi-products as well as reimbursing debts. A number of producers are reusing all of their revenues to increase the value of their brand, while others are hesitating to expand.

The access to resources and infrastructure play a significant role in the economic empowerment of rural communities (Jan Douwe Van Der Ploeg 2012) (Ray, Culture, Intellectual Property and Territorial Rural Development 1998). A decent access to resources provides a safety net in acquiring direct and indirect raw materials to perform the craft, and a decent infrastructural web would also boost linkages to actually make those crafts viable. 60% of respondents have a decent access to resources which explains the big variety of offerings provided by rural communities on the food level in Lebanon. Further observation revealed that 78% of interviewees rate their access to infrastructure as neutral or bad, which explains the dire needs in machinery (65%), logistics (56%), marketing & advertising (62%), sales (60%) and production (49%) for producers to optimize their business. There is, nevertheless, an obvious equilibrium that might explain the reliance on online/e-commerce shopping channels as they were heavily embraced by producers as of the first quarter of 2019; and this peak is backed up by the fact that only 7% of respondents rate their access to

technology as bad. The E-commerce channels that surged during COVID-19 were, and still are among the many adaptive techniques taken as measures by producers to sustain their livelihoods. It is one indicators that shows the likeliness of rural small scale producers to change their practices in order to fit or to sustain, considering that the majority (44%) of respondents are older than 50 years old.

Other methods of adaptation during the crisis include measures like cutting employees off, decreasing production varieties, increasing sales channels (aiming to export), increasing production capacity to fulfil potential new orders, and finally the reorganizations of the work/lifestyle spending helped 29.7% of producers conserving their income level.

ii- Socio-cultural Impact & Role of Women

A significant number of social relations are based on economic relations of trust, and many studies have shown that over the course of history. (Damian Maye 2006) Sharing food in social relations contexts projects a 'sign of communion' as described by Bessiere, notably when it brings the exchange of information to the table were families and communities can indulge. (Bessiere 1998) The context in which food is being appreciated as a product and as a process, which is the AFNs, touches communities at their core and allows them to build their capacities from within. Alex Franklin, for that matter, situates this kind of food systems as the main driver to community resilience and even more so, community engagement. (Alex Franklin 2011) Based on this chronology, the section showcases the facets of social impact via the level of engagement, the level of support, the role of POs and the effect of tourism in capitalizing on the cultural aspect.

Decision making and the involvement of the family plays a major role in studying the socio-cultural aspect of rural communities that are producing and processing food, and even if on a small scale, it is still considered a form of engagement. Although the majority of producers decide alone on the quantities produced and on the final prices, major (or strategic) decisions are taken with the consultation of the partner in 45% of the cases (partners can be wives, spouses, daughters or sons), while seldom with the whole nuclear family or with a non-family member. Intriguingly, 34 out of the 43 respondents have between 1 and 6 family members assisting them in conducting the work on a regular basis, which shows a strong appeal of a family business from the outside but is not equitably reflected in practice on the inside.

The inclusion of women in components of the value chains is highest among the Livestock & Dairy producers (58% of engaged family members are women) and lowest in the Alcohol category (21% of engaged family members). Curiously enough, 2 out of the 4 interviewed micro-wineries are run by young women on the management level yet by males on the oenology level, which poses a certain limitation on the final decision-making level of quantity produced and on pricing, even if this component is considered as the back office of the alcoholic value chain. A Bread & Bakery producer in the Rachaya village of West Bekaa, for example, has triggered a social implicit reaction from her neighborhood once she took her Saj out on the street. She stated that "it is not very common for a woman in our area to have a traditional craft and work on expanding it. My friends were kind of embarrassed but we honestly need to stay humble as the work that I am conducting is helping us in paying for my husband's medicine".

That social abandon of Rachaya is not the norm in rural areas and is not the only issue. The absence of farmers' successors is another kind social abandon that is affecting

several Mediterranean farmers and as a result, decreasing their herd sizes (Mabelle Chedid 2018). As this constraint is becoming more and more recurrent with the small ruminants' farmers in the Beqaa as per Chedid et al., the retrieved data shows that 67.4% of respondents feel that they are well supported in their villages or among their communities in general while the remaining identify some senses of jealousy. The support is usually well translated into action since the majority of producers seek their local communities when help is needed, instead of bringing an outsider and/or random outsiders.

Social inclusion does not only bring sales and income, but it helps in building the confidence and establishes relations on the level of rural actors (Potira Preiss, Fostering Sustainable Urban-Rural Linkages through Local Food Supply: A Transnational Analysis of Collaborative Food Alliances 2017). Producers' Organizations (POs) are a real example of that; the proof is that the majority of respondents are, or were once, part of a weekly farmers' market. However, POs are sometimes involuntarily restricting social inclusion, even if they put the producer in a set up full of colleagues and people to associate with. Numbers showed that only 30% of respondents who belong to POs are involved in their decision making.

On the cultural level, the majority of respondents consider that rural tourism can, not only be an extra generating activity, but could also bring the clients closer and involve them in the process. They believe that closer involvement will eventually contribute in making them ambassadors to the cause, and not only benefit the producer out of loyalty, but out of publicity and goodwill. On the clients' side, however, only 53% of households believe that visiting the producers will contribute to improving the connection. This is a validation to Slater's affirmation about the social agreement that is born between consumers and

producers on the level of food exchange, and which in the case of the organizational dynamics of AFNs, may not be able to include the critical mass yet.

iii- Political Impact

Marginalization is not only on the level of the market, nor on the level of the overall exclusion from the conventional food system; but can also happen on the political level. As discussed by (Adisa 2012) and (Uphoff 1993), political participation begins on the macro level with the empowerment of productive sectors, and creates a coordination mechanism between the different layers of governance and decision-making actors.

Many producers established friendly relations with their respective municipalities, which is the closest official point of reference to the government, to be able to be involved in decision making processes that would affect their progress in their respective villages.

While for the majority who has not, it resulted in their exclusion from the decision making process even in issues that are in direct relation with their work. Those variables that are directly and indirectly affecting the governance of the supply chain are also among the external factors affecting the overall situation of small producers; "most chains governance studies focus mainly on the transactional aspects of the relationships between farmers on

In Lebanon, and based on the SFSC tables of the first section in that chapter, all categories of producers rely heavily on imported raw material and/or bi-products to produce, which makes this component of the value chain controlled by merchants who are rarely working for the well-being of producers. It is similarly noticed however, that at the other end of the value chain, exists another big reliance on direct sales and specialized shops as selling channels. The reason for that is because on the level of direct sales, producers can control how and to whom they are going to sell, and can hence control the

the one hand and modern agri-business on the other hand" (Xiaoyong Zhang 2009).

price. Additionally, the fact that the points of sales of the indirect selling channels are giving fair margins to producers (as per more than 50% of respondents) and taking good care of the products in general in terms of display and merchandizing (as per more than 60% of respondents); shows that at some point the producer has a fair room for negotiations with this particular set of channels. Which is not always the case with other channels, supermarkets for instance may not give that same flexibility that retailers do. Working with supermarkets and/or big retailers generates difficulties in keeping the same price segmentations. Often producers seeking to entering conventional markets stumble upon the fact that prices are decided and controlled by big industrial competitors and entities that are able to produce in masses and apply economies of scale; which is usually the first major entry barrier.

All of the above show the desperate need for regulations in the. Producers believe that installing proper regulations in the sector can help them achieving more targets than a 'Laissez-faire' policy; 86% prefer to grow in a regulated system even if they have greatly accomplished in the 'Laissez-Faire' one along the years.

iv- Psychological Impact and Rosenberg's Self-Esteem Scale

Farmers and rural producers are often front-liners to threats and challenges that affect their livelihoods like weather unpredictability, environmental degradation, economic crises, political decisions and many more. (Thelin A 2010) (Fragar L 2008) Their well-being and mental health is often at risk but can simply be taken care of increased by simply situating them in a work-place that triggers positive wellbeing and improve their mental health. Their craft is that work place to build self-efficacy and raise confidence, and allows them to properly use their competence to drive their own initiatives and belong to a group of people that can relate to the achievement that were made. (Asonganyi 2017) As the

psychological effect in Alternative Food Networks affect the other end of the spectrum as well, the relatedness that consumers feel especially via Community Supported Agriculture and Solidarity Purchasing Groups attempts to be paralleled with the psychological satisfaction that the producer feel upon attempting to be part of such a relation.

(Mariarosaria Saverese, 2020)

The interviews were a safe space for the producers to voice their frustration about the difficulties that they are facing, and the toll of the bad infrastructure they are obliged to operate in. As already mentioned, many believe that the country does not have the proper infrastructure to nest small-scale producers, which pushes MSMEs in general to be consumed by the 'survivor' mode. That psychological consumption is not reflected in their self-esteem though, on the contrary, the average level of a Lebanese small-holder is 22 over 30 as per the Rosenberg's scale. The Rosenberg Scale of Self-Esteem is a 10 questions scale to measure the self-esteem of a person "using a 4-point Likert scale format ranging from strongly disagree to strongly agree" (Rosenberg 1965). The normal range is between 15 and 25, whereas anything below 15 is considered low self-esteem.

It is reasonable to affiliate this high score to consumers' appreciation in general, and it is also reasonable to notice that the sector is built, managed, and sustained on paragovernmental or unofficial pillars. Meaning that the diagnosis could not identify any vigorous pillar that the sector could rely on e. g.: 68% of producers have health insurance, but only 22% have it under the official NSSF whereas the rest do pay high premium policies for private companies to get insured. Moreover, the most used technique to advertise products and reach new clients is the 'word of mouth', which is usually a steady way to achieve results given the power of referrals; but even that power is not enough to

sustain market access as 65% refrain from increasing their production capacity due to the scarcity of channels.

At the other end of the spectrum, consumers' appreciation and social interactions are indeed nourishing the self-esteem of the sector and driving its stakeholders to be creative, innovative and perseverant. Product quality and the production mode are what distinguishes small scale producers to attract attention and interest from households and businesses. Furthermore, although producers have proved their willingness to change their practices in order to adapt, there is high doubt on how successful they will be by trying new directions, especially that the majority of producers are not interested in seeking focused trainings to ameliorate their skills' gaps.

4.2. Disrupting the Status Quo

After putting the baseline in the previous section, this section offers insights from within to understand the difficulties and main challenges faced by the respondents, whether from external factors or from their personal experiences. As this research is being written in the middle of a crisis, it will furthermore present adaptive measures.

4.2.1. Challenges & Limitations

To summarize and simplify the common challenges faced by actors of the AFN (family farms, producer and cooperatives), Barbara Kump believes that even though the hardship starts with the launching, sustaining the entity and succeeding in developing its foundation after validating the optimal size requires an elite endurance mindset. (Barbara Kump 2021) That mindset faces issues related to labor intensive practices (Analena B.

Bruce 2016), societal changes (Kondoh 2015), gender equity and equality in opportunities and distribution (Arku 2009) (J. Berhman 2012) (Arun 2012).

Before discussing the obvious challenges that became quite abundant in the Lebanese context, a stand out aspect surfaced upon asking producers about how do they measure their time, efforts and energy, three pillars at the basis of the pricing component. Pricing can be a tricky business for some people, as it could be a simple one for others. Many producers did not have a clear and straight answer upon asking them about what steps they follow while pricing, while some others have bluntly claimed that they do not follow any clear strategy. Among the adopted approaches is the cost-based pricing strategy. A cost-based pricing "is the practice of setting prices based on the cost of the goods or services being sold. A profit percentage or fixed profit figure is added to the cost of an item, which results in the price at which it will be sold" (Bragg 2020). Considering that the cost represents the raw material, the additional percentage is usually added to either match the market price, to fix a personal profit margin (regardless of the market price), or to include a more in-depth the cost of other components. As much as the pricing method described here-above seems generic, minor differences were observed in each category, and are summarized in the below Table 11:

Table 11: Pricing Methods of Each Category

Category	Dominant Pricing Approaches
Fruits & Vegetables	- Cost + Percentage - In-between: Less than other slow food farmers' prices but more than conventional farmers' prices - Market Price - Cost Some of Health's prices profit some wie the change of intermedianies
Livestock & Dairy	 - Same as 'Hesbeh' prices, profit comes via the absence of intermediaries - Cost x 2 OR Cost + Time + Transportation OR Cost + Percentage - Same prices as per big conventional producers – cost (as they control the market price) - Market Price + Percentage (when it is organic and requires more hands and brings less yields)
Provisions & Agri-food	- No standard formula - Cost + Percentage

Bread & Bakery	- Cost + Overhead + fixed profit margin - Direct cost + Indirect costs + potential returns + packaging + 20 to 30% profit - 30% Cost of Raw material + 30% Cost of labor + 30% Profit + 10% Breakage (Like the
	restaurants' formula)
Alcohol	 In function of time, some take 4 months some take more. We rank the wine and we base the price on supply, demand and how scarce it is. Market Price – Cost Cost + Subjective Positioning Cost (marketing, premium pricing, benchmark, scarcity) + profit
Honey	- Supply/demand, when supply increases prices decrease - Cost of \$16 put by the committee of syndicates + a \$10 profit margin

In addition, processing the waste is a hidden cost that some producers take it into consideration, while most others do not. More interestingly, a Jezzine small private business that operates a cooperative model allocates a budget for maintenance of the lands, and embeds the cost in the final price as well. The above observations provide the following analysis:

- a- There is an absence of standardized pricing mechanisms even within the same category,
- b- The considerable number of producers who see themselves as lacking concerning the matter of pricing, shows that the extensive amounts of subsidized trainings that were delivered to the sector were not focused on practical market needs,
- c- Producers consider their time and labour/effort as embedded in the profit margin, which may not cause a problem at this stage and size. Problems may start to appear under this policy when producers start to scale-up, especially that the bigger portion of producers regard their skills and competencies as component that create value in their work. It is unclear how this component will be fitting the chain, especially on pricing, in the future;

d- The conventional sector of industrial products is where the market price actually set, and is deemed a benchmark for many small scale producers. Hence, the challenge in this case is for whoever is selling at a premium price, while failing to reflecting the value adding attributes of their work, components that justify the premium.

Even with those constraints, 64% of producers are still able to sell at the same or at a lower price than their industrial counterparts. A new market dynamic has emerged in the crisis; since imported products are entirely subject to dollarization and other custom costs, the prices of small scale producers are able, to some extent, to compete. As noticed in the previous section while studying the SFSC simulations, the most common challenging component is the acquisition of packaging. Moreover, even the packaging component that reaches up to 30% of the unit cost in some cases; did not stop 58% of respondents to increase their sales post October 2019, in times where the country's capacity to import is at a significant low. One producer stated that "we can afford to drop our profit margin from 40% to 20% for whatsoever reason... we are producers not traders, so we consider it a drop in profit instead of a loss". From a financial point of view, the crisis may have paved the way to negate a claim taking into account that the niche segmentation is a sole market for specialty products due to their high prices compared to their industrial counterparts. "The poor like to eat healthy too"! assured a producer from Nabatieh.

Another challenge that targets the bigger size of small-holders' producers has also been detected. Small scale producers have various platforms like farmers' markets, direct sales, specialty shops (trending in some cases) and so on, to trade. Slightly bigger ones are too big to feature in farmers' markets, but aren't big enough to feature in a supermarket or other conventional setup. The situation, as described by one baker, is that producers are

afraid to produce big quantities in case they do not sell out, while at the other end, supermarkets and other conventional stores require constant production, otherwise costumers will forget about the brand and affect the traction of the store. In some cases, the reliance on small conventional shops of urban residential areas can be a substitute, however this reliance was not very much adopted by producers pre-2019 as only 24% sell in small conventional shops, and this rate decreased in the crisis to settle at 14%.

Big last minute orders can also create a challenge for some very small producers since they do not have the ability to stock big amounts of raw material and stay ready for a sudden big demand. Relatedly, 30% need help in optimizing their material acquisition activity, while 49% are in dire need of extra labor to help them in the production process. Moreover, and as mentioned in previous section, the Lebanese small holder needs to spend an average of 2.8 days per week to conduct their selling or delivery activities. In fact, 56% need help in logistics and transportation to optimize their business, which comes as a third priority after the need for machinery (65%) and the improvement of their go-to-market strategies (62%).

Many challenges and difficulties have been constant in Lebanon and are the result of the centralized development strategy of the post-civil war era. Some others are born in the latest crisis that came as a sudden consequence of the bad management and the lack of institutional depth of organization in managing the country. The crisis pushed most producers to commonly play tug of wars with buying a good portion of their raw material in USD, in the middle of several COVID-19 lock downs, skyrocketing packaging prices, a disproportional value for money, unlimited confusions of their own prices that affected relations with Point of Sales, a drastic decrease of B2B sales due to a partial bankruptcy of the Food & Beverages sector, and many more. Ironically, challenges of pre-crisis are not

cancelled. Fruits & Vegetables producers alongside Livestock & Dairy ones are still facing scarcity of organic pesticides, still competing with the illegal imports from Syria, are limited by in the organic market, are lacking orientation and awareness about any decease or problem (61%), and still feel largely isolated. Moreover, beside the fact that no governmental agency has provided any of this study's respondents with feed or bi-products and only 11% got herd vaccination, a critical issue raised by a farmer about the availability of workers in the agricultural sector: The Lebanese agricultural sector has an astonishing dependency on Syrian workers and that dependency threatens the sector in case those workers decide to suddenly stop working, or worse, if they start charging high labor fees that Lebanese farmers could not afford. Any turbulence on that front will leave the Lebanese agricultural sector in desperate need for labor, a need that the Lebanese community may not be able to supply due to inexperience and scarcity of Lebanese workers. Alternatively, the increase in the rate of unemployment during the crisis may serve as an antidote to that issue.

Provisions & Agri-processed Food producers still face the lack of proper infrastructure, quality control mechanisms, and the inability to increase production or outreaching for new markets.

Bread & Bakery category has a big turn over in labor, with subsidies not answering specific market needs, the absence of import policies to protect them and a with competing cheaper Syrian labor. Alcohol producers on the other hand, are not able to sell all their production locally anymore, and since by definition their production is niche segmented, their work to export is much more necessary comparing to other categories whom are more prone to liquidate locally. Moreover, alcohol producers are competing with big companies and are still in deficiency when it comes to the marketing and sales powers that allows

bigger counterparts to penetrate new markets. Finally, beekeepers are receiving bad quality queens and are struggling with local security forces in rural areas as their beehives are getting stolen more frequently in the crisis.

On the financial level, and although producers in general do have access to credits, some producers face difficulties in opening bank accounts, especially when they are unregistered and unemployed. Other collateral obstacles come along the way upon requesting loans, like the bank opting to owning the land, setting the mortgage at a much lower value than the real value of the premises, infinite Statements of Account, high interest rates, or lastly imposing limitations on how to spend the money.

4.2.2. Adaptation in Post-Meltdown

The above challenges have triggered measures that have changed the practices of small scale producers. Farmers are facing the crisis by starting drip irrigation, decreasing varieties and quantities to cut the costs and to focus on essential crops that maximize the income on one hand, and/or launching online marketing and introducing home deliveries to expand their reach on the other. Livestock & Dairy farmers focused on increasing the production (mainly in livestock) as a response to the distrust of people towards the expired frozen quantities stored in unequipped warehouses. This matter made it to the news on a regular basis and the concern of households played to the advantage of the locally grown meat. The overall matter went above and beyond, whereas this increase in production got accompanied by a new distribution strategy for new Point of Sales, and by investing in proper pricing schemes to help in controlling the growth.

The Provisions and Agro-processed category had to decrease the quantities produced as well as halting the varieties that require expensive raw material. Adding to that

many discounted prices in order to encourage consumers coming their way. Moreover, the stakeholders of this category have worked on duplicating their selling channels and on reflecting the quality protocol measures taken to limit the spread of COVID-19. On the other hand, since foreign markets happened to also be on lockdown, the alcohol and honey categories, that are regularly prone to exporting, had to settle for the local market. This change had led them to also decrease their costs by changing suppliers and increase their quantities to supply the unforeseen local demand. Additionally, a winemaker has opened a guesthouse in the winery to accommodate the low sales that usually hit during spring and summer.

Rural Tourism

A study by the UN Atlas of the Oceans revealed that leakages are among the considerable negative impacts on tourism: "On average, of each US\$ 100 spent on a vacation tour by a tourist from a developed country, only around US\$ 5 actually stays in a developing-country destination's economy" (UN Atlas of the Oceans n.d.). As per Dr Ghadban et al., "Scholars consider tourism as an important tool of revenue generation for communities living in rural areas", and although there is no scientific data on how the sector is shifting in Lebanon, "the last decade witnessed an increase of the rural tourism share within the tourism industry" (Socrat Ghadban 2017). To put things more into context, Lebanon is struggling to compete with neighbor countries in the attraction of tourists due to frequent instabilities, but yet, "from the tourism market perspective, the Lebanese domestic and international tourism market is witnessing a change in the demand side. More people are looking for authentic experiences and unspoiled landscapes to visit; and rural areas are their first destination". This sub-section analyzes the willingness of rural communities to

host external enthusiasts, clarify the impact of tourism on rural areas and how does it flair as a companion to the AFNs in being an additional income generating activity while promoting and sustaining heritage and culture.

Impact on business

Rural tourism in practical terms encompasses nature-based tourism, adventure tourism, eco-tourism, cultural tourism, agri-tourism and community-based tourism all marching in parallel with the notion of geo-tourism (Arrage 2019). Tourism on the level of small scale producers ticks all the above mentioned sub-categories at the exception of ecotourism, since the latter is technically only restricted in protected area like the Jabal Moussa Biosphere Reserve. In fact, 86% of respondents believe that rural tourism is an additional way to create revenue. And indeed many of them introduced it to either create awareness about their brands or to launch ambassadors in the market as part of their informal 'word of mouth' strategy. Others have established programs in their farms to educated people and pupils on sustainable agriculture. The impact is deemed concrete; one producer was very clear upon stating that "the word of mouth increased, income followed, but most importantly our motivation and self-confidence to continue skyrocketed". Visitors create a connection with the mode of production and their reactions affect positively and directly the self-esteem of the host. Another respondent thinks that tourism on that level brings people to a new world and subsequently enhances the responsibility towards the environment, and this particular discourse has been raised by several respondents.

4.2.3. Producers' Organizations (PO) and Cooperatives

Nested markets exist to act as tools for AFN and are constructed around social interactions between concrete actors or components (Sergio Schneider 2016), they are embedded in non-markets set-ups (Kim 2015), and are the consequence of troublesome events in a certain society as per Van der Ploeg. For so, building these markets follows different agendas depending on where are they situated in the world. In Europe for example, societies have a minimum social safety net to project agendas related to the protection of biodiversity and/or animal welfare, while in less privileged countries like China and Brazil, nested markets are mounted to satisfy a certain social justice. In both case, those two axes meet to resist the global food regime of the twenty first century by providing consumers with healthy grown food and to offer producers a channel to improve their livelihoods. (Potira Preiss, Fostering Sustainable Urban-Rural Linkages through Local Food Supply: A Transnational Analysis of Collaborative Food Alliances 2017) For producers, participating in Producers' Organizations (PO) is a strategic choice as well as a medium to capture value by rural producers as discussed by Courtois. It is worthy to observe that Lebanese producers consider some farmers' markets like Souk El Tayeb, Badaro's Urban Market or Via Apia as their PO since a big portion of their existence is influenced by their belonging to a weekly exchange mechanism. Other POs take the forms of associations like the Institut National de la Vigne et du Vin (INVV), Slow Food Beirut (SFB), Fair Trade Lebanon (FTL), or even syndicates that are usually effective for beekeepers for instance; grass-root Facebook pages like Izraa' which serves as an information and networking hub for amateurs in agriculture and which has grown fast and exponentially during the pandemic, and finally cooperatives.

Regardless of their forms, the advantages of those POs are many as described by Courtois et al.: the involvement opens several doors and offers options for producers who are now able to widen their scope for strategic thinking. Strategic choices revolve around choosing the target markets and market opportunities, and whether to go into a certification process that will create value or not. Producers can enrol themselves in already established POs, organize their own PO or join a private company initiative that functions as a PO while holding the legal status of a private sector. (Courtois 2011)

58% of the interviewed sample who belong to local POs, help came to them in many shapes and forms, notably via exposure, networking, learning new dimensions in food production, enhancing know-how, and skills in direct sales, credibility, handling people, building sustainable relationships, quality control (in some cases), good alternative to 'Hesbeh' or the conventional Fruits & Vegetables market, fairer profit margins like the case of FTL and

Beekeepers of the South, for example, have a WhatsApp group among each other to share information, and this group is linked to representatives from the Ministry of Agriculture' Southern Committee. Decision making at that level is participatory and dynamically regular since changes in bees are happening very quickly due to global warming.

more.

That is not the case with all POs, as some have their drawbacks: only 31% of respondents are involved in the decision making of their POs. In other occurrences, POs have too many eligibility criteria and requests to adhere to, while in some other cases POs do not exist at all in certain areas. INVV winemakers meet every month to share knowledge and information and to open up about common problems in an attempt to find solutions. Lamentably, it often exposes the strategies of small wineries to big ones who are more

equipped operationally and financially to implement whatever they see fit on a faster pace, and eventually compete with small ones, notably in export.

A honey producer, on the other end, insists that POs or cooperatives do not usually reach their objectives because the country does not have comprehensive and qualitative rules to allowing them to properly take control, nor the culture. For instance, the inclusion of big producers in cooperatives hinders the equity of aids for smaller ones, when and if aid arrives.

When speaking about cooperatives, it is imminent to put them into the agricultural contexts that they are linked to. "Cooperatives in Lebanon existed since 1964 with the introduction of the Cooperative Association Law which defined cooperatives under Decree No. 17199 as "... each association consisting of persons with unlimited capital and not aiming for profit ... and whose aim is to improve the economic and social status of its members by concerting their efforts in accordance with the principles of public cooperation". As a result, Lebanon is now home to 1,238 agricultural and agro-processing cooperatives where only 1 in 3 are active. Agro-processing cooperatives mostly employ women "in the processing of traditional pantry foods such as dry products, distillates, jams, pickles and preserves" in centralized workshops with the needed equipment, infrastructure, technology and quality control to perform appropriately (Rita Jalkh 2020).

Within the sample of this study, interviews were conducted with several official cooperatives; two in the southern villages of Qana and Qawzah, one from Jezzine, one from Barqa in the Baalbeck district and additional two entities that work under the cooperative model but are legally considered as private sector. Each belong to the 6 categories under investigation and have differentiated characteristics. For example, the Livestock & Dairy Coop in Jezzine started by a USAID subsidy to help victims of mines injuries and widows

of the post-war era with Israel. The association has all the needed certifications and manuals to operate under defined standards, and the production is driven by the members who are mostly chicken growers. The coop takes the produce, packages it, transports it to point of sales, pays the fees for the farmers and keep 2% for its sustainability. The Qana cooperative on the other hand, which basically work in Bread & Bakery, uses another way to sustain itself: the revenue is divided into the number of women who worked on the given project +1. That +1 is the share of the cooperative and is usually equivalent to 20% of the total revenue. In Barqa near Deir El Ahmar, a group of farmers gather their sellable share of production with the president of the cooperative, who drives all the way to Beirut and sell it in a weekly farmers' markets. The downside in that process is the ill-secured roads from Barqa to urban areas.

Cooperatives in general, share challenges that are similar to the ones faced by individual producers, and those challenges are mainly due to external factors on the preproduction level. Nonetheless, on the advantageous side and when executed properly, cooperatives in Lebanon are a driving mechanism to withhold micro-small producers who live in faraway villages, and which are found lacking the minimal infrastructure that helps them acquiring good linkages and upper hand in negotiations with suppliers. That aspect makes the cooperatives' presence a paramount importance in remote areas since they provide communities with exposure via exhibitions, and which in turn provide well needed feedback from dwellers – thing that is not abundant in their rural area.

On a closing note about cooperatives, they boost the sense of belonging and upgrade the confidence of their members as iterated by Asonganyi et la., based on their study with 21 rural women in northern Ghana. (Asonganyi 2017) A scenario from West Bekaa, as a cheese processor who buys big quantities of milk from a group of farmers is working on

establishing a cooperative for them. This drift is gaining force and is nesting small scale producers under a private sector company that operates to procure benefits for all stakeholders, like the example of IntelligentFood raised by Fischer (Aglaia Fischer, Marvin Nusseck 2020).

Another scenario about the Public-Private Partnership (PPP) in Jezzine and Bkessine that is working with the blessing of the local municipalities, since its objective is to engage the biggest number of people and teach them to produce high quality products. The organization in that region is also adamant on providing women and farmers with prepayments, especially before the season begins, to keep them sustainable and willing to stay and work their lands/workshops. This de-risking measure may explain the weak participatory approach that has been observed during previous investigations, whereas some operational rules are relatively rigid in order to keep the entity solvent and able to deliver on the financial level.

4.3. The Shaping of a New Rurality

4.3.1. Standardization and Local Food Distributors

Firstly, and foremost, the notion of "New Rurality" signifies the societal change from the agrarian model that sustains the community via primary activities, and moves it towards a social behavior that is more environmental friendly and closer in linkages to urban settlements. The growing number of intermediate cities in Lebanon, accompanied by the repercussions of the crisis that obliges stakeholders to adopt new practices in order to be

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⁹ When the industry buys the risk of the farmer

resilient. This section describes some of those practices and situations that may be at the core of an expected new approach to local food economy.

The global discourse embodies several certification models. Models that are infiltrated in public institutions, universities' research centers, NGOs and international donors, to maintain the subject of quality in food growing and food production (Courtois 2011). The quality in food has become a major concern for consumers worldwide, and is mainly spearheaded by the conventional system of global food market (Wu 2021), however examples from rural India showed that HACCO systems can be implemented to small producers (Pradhan 2014) and are being 'socially constructed' to meet the demands of ethical consumerism in healthy, organic, regional and slow food production (Henk Renting 2003).

In Lebanon, the notion of quality is still vastly debatable, as per Dr. Zurayk's remarks, and is delaying the evolution of the AFNs' products. On the consumer level, more than 62.3% of Lebanese households cannot trace their food and are not aware who grew it. Governmental agencies like the Ministry of Agriculture and the Ministry of Economy & Trade, as well as the Ministry of Public Health have developed standards for food producers and suppliers to abide by, when it comes to quality control and standardization. As per a respondent from the Ministry of Agriculture, the ministry is in the business of promoting Good Agricultural Practices in order to reduce the use of chemical pesticides and fertilizers to eventually increase the quality of products. The work is regulated by expert technicians and extension agents that closely follow up with the small scale farmers' beneficiaries under various programs. The MoET on the other hand, applies inspections on all kinds of food products, notably via the Consumer Protection Department that investigates local, imported and even un-registered products: "The fact that the product is

featuring in the market, any market and on any shelve, is prone to inspection.

Unfortunately, the available human resources are not always enough to cover everything and everyone", stated an interviewee from the ministry. The Ministry of Public Health issued an inspection manual on food safety as well, that covers the premises where food is being prepared (land, premises, machines, aeration, lighting, etc.), the people involved in preparing the food (personal hygiene, medical inspection, training and information), inbound and outbound logistics (storage, refrigeration, haphazard & miscellaneous pollution), and finally the nesting infrastructure (cross-contamination prevention, nearby toilets, water installations, waste-water systems, solid waste and pest control).

Furthermore, other protocols like CCBP and Libnor are also present within the Lebanese system to reflect the quality of food consumption, and from that point on, a question mark arises: what is preventing Lebanon from systemizing and centralizing the quality component of the value chain within one agency (may it be public or private) to avoid those duplications and repetitions? Doing so will ease the process on producers in their follow ups from one end, and make the issue of quality more absorbable to consumers from another, since the majority of surveyed households do not know the origin of the food they consume.

On the producers' side, the majority (67.4%) does not have, or is not willing to acquire any certification, whatsoever. This low appetite towards certifications and quality control is due to several factors: the gluten free in the Bread & Bakery sector does not have a local certification of recognition, being certified in some other categories like Fruits & Vegetables is deemed too expensive, which makes the incremental revenue of small producers or farmers not worth of the cost, or an attempt to acquire an ISO for example. The idea of reliability has been also surfacing, a number of producers did secure

certifications, however believe that the certifying party is not well trusted to practically justifying it. This issue has been basically focused on the organic sector and on the work conducted by the MoA with its organic subordinate, CCBP.

4.3.2. Evolution of the Sector Through the Lens of Souk El Tayeb

The rise of the commercialization in food supply has triggered a dire need to empower Farmers' Markets (FM) around the world, as one of the channels to enhance a direct sale and a farm-to-fork cycle. "An authentic FM is defined as a regular market at a fixed location in which the farmers sell their products" (Aintzira Oñederra-Aramendi 2018). Small-scale producers in FMs are mostly farmers, while the 'farmers' connotation does not necessarily imply that all participants engage in agricultural activities, but also craftsmen and women who engage in the categories previously explored in the study. They identify as artisan producers belonging to an entity that strives to offer authenticity and aspires to overcome a set of challenges and "other limiting factors such as scale, scope, physical infrastructures, accessibility and convenience as well as the organizational capacity needed to generate opportunities". The Souk El Tayeb Model ticks all those boxes. Founded in 2004 as a "social enterprise" working on national and international projects to promote and preserve culinary traditions, rural heritage and the natural environment" (Souk El Tayeb 2021), the Souk started as a farmers' market to expose producers and farmers and offer them a regular channel to improve their livelihoods "while using it as a unique opportunity to bring together communities that had been fractured by 15 years of civil war".

The organization has developed since then to assemble several income generating activities under the same umbrella, notably a socially responsible kitchen

turned restaurant, "Tawlet", and a number of guesthouses in remote areas aiming at offering an adequate rural experience to clients.

Questions arise, for that matter, about the real depth of such organizations: The business model under which the FM functions and sustains is based on mantling a weekly market in a fixed location and renting defined spaces to rural small scale producers in return of a fee. This fee covers the management, logistics, quality control, advertising and other miscellaneous expenses that could be generated during an operation hosting more than 120 producers.

To be eligible in being part of Souk El Tayeb "vendors may be individuals, families, groups, entrepreneurs, cooperatives, associations, local traditional businesses and/or innovative chefs" (Souk El Tayeb 2017). They must grow the produce themselves, sell them directly (since intermediaries are not permitted), being a small-scale producer and trade high-quality produce. Accepted applicants will have to read, acknowledge and sign a 17 pages' document of Rules & Regulations. This mandatory process under the Quality Control Department is one step among many to regulate the authenticity of the offer by the management; while other steps like on-premises inspections and weekly markets' inspections are also meant to keep a decent offering by the organization. The management does not control prices; the market regulates itself in that aspect. The absence of price regulation has allowed producers to neglect market prices and differentiate themselves by overly adopting the Premium Pricing method, which triggered many complaints among visiting dwellers.

Producers that have been part of Souk el Tayeb for several years now have based their direct sale strategy on recurrent customers. In fact, the market is a weekly festival-like destination in Beirut on Saturday mornings, gathering youth, families and

often tourists. Retained customers are abundant, and they are one of the factors that have contributed to the longevity of many producers from the inception of the FM up until nowadays. On a more macro level, producers have learned the patterns related to consumer behavior: the low season starts by the beginning of June when the heat of summer takes over the Lebanese coast, including Beirut, while the high season restarts in September when children are back to school, up until the end of May. The footfall peaks twice in high season, the first time in December and the second during Spring. As per a personal observation, the average monthly revenue of a producer at Souk El Tayeb is around 1,700,000LBP back when the LBP was still pegged to the USD at 1515, which equals to an average of \$1,122. The average is a result of 12 months of observations, where the Fruits & Vegetables category showed that it attracts the majority of clients, spending on a regular basis an average of 2,455,000 LBP (\$1,620) per month for each farmer in that category.

Being part of the organization means that the producer is guaranteeing a constant Point of Sale on a weekly basis. One of the Market's strongest points is its focus on being able to mantle the Souk on a weekly basis, whatever the circumstances were (political, security, weather, low footfall, etc.) in order to keep this momentum. This policy has allowed producers to plan long term and plan solidly. Many have based their livelihoods and the ones of their families on the income that is being regularly generated in their weekly encounters at the center of Beirut. Some even were able to pay for their children's education over the years, so the economic impact that was initially the aim of that market's creation has been upgraded with time to include social and psychological empowerment aspects as well. "The most important aspect in the evolution of the Souk over the years is the perception of people to such a project",

iterated a representative from management. "It was a very weird thing at the beginning as very small amount of people actually came. It is becoming much more accepted, however not yet mainstream, and part of people's minds. It is not about the brand, the brand is not important, but more about the idea of having a farmer coming to directly sell his/her produce in an urban area became more widespread with time. What actually evolved even more is the valorization of the product as they became identified by their origins and their quality and hence more stoned in people's heads". Producers belong to a community and function under a set of rules and regulations and situating them in a weekly safety net has enabled them to go beyond their expectations.

Lastly, the managerial model of Souk El Tayeb is a nuance between top down and participation: the operating team that is comprised of a manager, a quality assurance officer and a logistics service provider, looks at macro matters like events, locations, adherence, quality assurance, and challenges. "We believe that our job as an organization is to support and develop the producer, not developing agriculture per se, not the product". Producers at the other hand have a committee that is elected every 2 years and which is consisted of 5 members. These members' mandate is to create a liaison between producers and management, and assist the latter in chores like logistical organization, quality control inspection, events organization, look & feel assistance and/or filling any related gaps.

The Souk El Tayeb model differs, for example, from the Badaro's Urban Market (BUM) one. BUM is a FM that takes place every Sunday morning in the area of Badaro, on Beirut's periphery and is fully organized by the local community and the producers on a volunteering basis. The BUM model is regarded as a successful one considering its

small amount of producers, opening the door for the entity to be fully autonomous, and having their decisions fully participatory.

4.3.3. Change in trends of Customers' Behaviors

Kneafsey postulated that AFNs are a place that connect consumers either with other people who share their same values, producers and even the environment, and that relation is based on 'care'. (Moya Kneafsey 2006) The fact that this notion is not socially strong yet to englobe wider audiences around the world has pushed Thompson to believe that it is likely to stay limited until a global crisis threatening the planet occurs. (Craig J. Thompson 2007) The world has witnessed many discourses about ethical consumerism, and several bodies work on balancing the ethical consumption of food with the right to food sovereignty. (T.D. Beuchelt 2012) (Campesina 2007) The challenge that the twenty first century is facing is the actual linkages that this study is investigating, and which are ways that help infiltrate ethically produced food into the existing global food system, enhance its presence via appealing models that can engage consumers emotionally, even if AFN may provide a lower range of choices to consumers. The topic formulates question marks about whether the shift is going to be straight forward (Wills 2015) and if it has to be controlled to properly reach the objectives of food sovereignty (Julia Leventon 2017)

Results from the consumers' survey show that the shift in grocery purchasing habits were highlighted by the decrease of supermarket shopping from 76.6% in pre-2019 to 46% in post-2019. This decrease has been notably replaced by buying from small local shops who, in turn, witnessed an increase from 55.2% to 71.7%; or directly from producers and online shopping specialty stores, who showed an increase rate of 48% and 73% respectively. Farmers' market showed a shy increase from 10% to 17% even in the midst of strict and long COVID-19 lockdowns.

Consumers who buy from small producers, whether directly, online from specialty shops and/or from farmers' markets, prioritize Fruits & Vegetables products. Other categories like Livestock, Agro-processed, Bakery and Honey each attract on average 45% of the population. Alcohol makers on the other end are yet to make a breakthrough in the wider market from their niche segmentation since only 9.8% of respondents buy their alcohol from local artisanal producers.

It is safe to say that almost 75% of the Lebanese society has increased their purchasing activities to local producers as a response to the scarcity of imports. It is intriguing, nevertheless, to observe that even in such a sudden increase, 62.3% of them are still unaware about who grew their food and from where it came from. Moreover, as quality is highly perceived among Lebanese households, 86% rate the overall quality of local products coming from small scale producers above 7 over 10, but ironically only 22.4% of those same dwellers know about the food safety measures adopted by their respective small scale suppliers. In more particular cases, several producers noted that the devaluation of the currency boosted their sales: consumers who are getting paid in American dollars or other foreign currencies started to double or even triple the quantity they used to buy on each purchase.

Restaurants on the other hand, and as per a survey conducted by the Environment & Sustainable Development Unit during the first quarter of 2021 with 15 restaurant owners and chefs in urban areas, are very concerned about consistency. Most of them buy their raw materials from conventional big suppliers, mainly livestock products, since the quality is consistent, the delivery is fast and the payment terms are adequate. Besides, restaurants are not willing to pay higher prices for better quality, even while trying to replace imported products with locally produced ones. The F&B sector, however, did mention any conditions

about consistency, logistics or payment terms, which assumes that restaurants may be willing to meet the alternative food sector half way (notably in Livestock, Dairy and Fruits & Vegetables), in the wait that the latter organizes itself and establishes the proper infrastructure to meet market demands.

4.3.4. Role of NGOs and the Entrepreneurship Bias

Lebanon benefits regularly from development subsidies, aids and funds from all over the world, whether to enhance its infrastructure and/or to sustain the livelihoods of refugees. "Since 2010, the United States has provided more than \$4 billion total in foreign assistance to Lebanon. Specifically, the United States has provided more than \$2 billion in assistance since 2010 to address both economic support and security needs" (U.S. Department of State 2021)

The local food sector has been heavily subsidized due to political traumas in some cases, or due to international agendas in some others. The inbound subsidies come in for many purposes, mainly for emergency/relief or for development; so many small scale producers are usually targeted within these contexts. It is yet to be seen though, if they are equitably benefiting from development aids – or if some are being marginalized on the expense of whoever is showing characteristics of entrepreneurship, of whom are showing signs of scalable businesses to guarantee investments, and alternatively who prove to have the proper education to subsequently achieve. The baseline of the Entrepreneur versus Small Producer debate starts by defining each pole in simplicity based on the variation of the willingness to take risks, having employees, or based on the level of innovation. Carland et al. based this definition on multiple

historical considerations starting with Mill in 1848 who characterized entrepreneurs as 'risk bearing'; up until 1982 when Dunkelberg & Cooper came up with a more empirical characterization of being 'growth oriented, independence oriented, craftsman oriented'. The conclusion of Carland's work framed the Small Business Owner as "an individual who establishes and manages a business for the principal purpose of furthering personal goals", having the business as the sole income provider, absorbing the biggest part of the time and is "intricately bound with family needs and desires". Entrepreneurs on the other hand are people who found the business to make profit, and to scale it up, they are "characterized principally by innovative behaviour and will employ strategic management practices in the business" (James W. Carland 2007). Some producers tend to be like workers rather than entrepreneurs, and this is where the sensitivity of the topic needs to be addressed. Albeit for a heavily subsidized sector, the interventions may not be influencing the macroeconomic setting, and even though NGOs and INGOs can open the way to fill certain voids in their interventions, their capacity is deemed limited. Approximately 69% of respondents believe that development aids are not being distributed equally; one producer asserted that "I am an educated person, a well-connected one but I still cannot understand how this sector functions and can't seem to see its impact! Then how about the illiterates among us? I guess the approach is not fair to be top down, and as for my situation, I have a strong feeling that they instantly judge me as satisfied given the high standards of my practice. But in fact I am in dire need too". Some producers claimed that they lack information about the existence of such injections while others believe that "nothing happens unless you belong to a political party" or have the required PR. Contrarily, a young entrepreneur from the Livestock & Dairy category affirmed that "we as Entrepreneurs

are very well aided, but we need to do a lot of paper work. You need to know someone in the agency to get things done but once the on-boarding is achieved, NGOs are really helpful in providing equipment and skills". In matter of fact, 60.9% of the respondents who were aided by funds or subsidies were provided with machinery and 56.5% were provided by training & capacity building (14 and 13 out of 23 aided respondents respectively). The lowest intervention rates of subsidized projects were the ones aiming at enhancing the market access of producers and the components surrounding that axe like quality control, finance & accounting, strategy, legal, export and packaging. Table 12 below showcases the expenditure of subsidies while helping 23 out of the 43 respondents:

Table 12: Repartition of Development Aid as per 23 respondents' perspective.

Offerings	Percentage of aided producers in
	said offering
Acquisition	0%
Production (labor for handmade)	4.3%
Machinery	60.9%
Logistics & Transportation	0%
Marketing & Sales	34.7%
Quality Control	4.3%
Finance & Accounting	4.3%
Strategy & Consultancy	8.7%
Legal	0%
Packaging	8.7%
Export	0%
Training & Capacity Building	56.5%
Miscellaneous (cash, bi-products, seeds/seedlings,	4.3%
networking, compost)	

In Byblos District, a 38 years old farmer holding a master degree pointed out on a case comparing the village of Ehmej and the village of Aqoura: "I do not want to blame the donor the whole time, the Lebanese stakeholders have the tendency to do bad execution too. You may see that some are taking projects for the prestige of it, without having the resources or the technical background to properly implement them. Take Ehmej for example, no significant agricultural activities or agri-tourism hosts, and yet actors of the village still manage to acquire a good amount of subsidies every year. Whereas Aqoura ticks all the boxes and is still in dreadful need of development". On a more macro level, Dr. Kanj Hamadeh remarked that farmers do want to change but they are marginalized - especially the part-timers among them, as they are kept aside from the development world. They are not old school, they just do not have the tools and the support of markets, they do not even have post-harvesting infrastructure and public institutions or municipalities to reward them on the quality of their work. So from one end, they can't take risks due to the unreliable infrastructure and from another end, contingency planning and early responses have not been based on clear or predictive livelihood and market analyses. This means that humanitarian agencies don't understand the basic picture of how market systems operate and how people access basic goods, services and income. (Hamadeh, The Crop Production & Access to Finance in the Agri-food Sector - Agrytech Learning Session 2 2021)

CHAPTER 5

CONCLUSION & RECOMMENDATIONS

The study was conducted in Lebanon during the first and second quarters of 2021, after almost two years of political and financial unrest, and within a year through a global pandemic. The research analyzed the economic practices, existing legislations, trends, evolution and the impact of the financial meltdown in a local food system that is nesting rural small scale producers form different categories. It identified, furthermore, the challenges of the Lebanese small scale producers and exposed their willingness in changing their operations to properly adapt.

The rural/rural and rural/urban linkages have seen an evolution in the post-meltdown era, detecting shifts in Lebanese nested markets and a change in consumers' behavior that suggest the creation of a New Rurality. That shift in paradigm is still, however, greatly affected by the international-national-local equity of distribution in developmental aid.

In terms of value chain assessment, all categories of producers share the same base of the value chain that starts by grouping local raw materials with foreign biproducts to conduct the production and then proceed with direct selling (farmers' markets, direct sales...) and/or indirect selling activities (specialty shops, export...).

This baseline assists practitioners and policy makers to detect weaknesses in the chain and paves the way to any targeted strengthening process.

The retrieved impact of the sector on small scale producers highlights several points of discussion. On the economic level, pre-meltdown/COVID-19 days saw Farmers' Markets taking pole position in direct sales, while specialized shops coming in second as indirect ones. The outbreak of COVID-19 saw a significant increase in the

dependence on online e-commerce platforms, which offers a sustainable alternative to existing (or previous) practices and the need has suddenly ascended to enhance the ecommerce infrastructure in the country in order to englobe AFN. On the social level, it was noticeable that the livestock & dairy category engages the most women compared to other categories, while alcohol engages the lowest. Both categories do not situate women on the front line of the decision-making process, which requires attention by the sectors' stakeholders to include a gender equality component in their interventions whenever the rural culture permits it. In general, though, the majority of respondents feel well supported by their local communities (whether formally or informally), however this social inclusion is different in Producers' Organizations where only a minority is involved in the decision-making process that takes place internally. Politically, it is easier for producers to negotiate with specialty shops on rates and payment terms than with supermarkets, even if the latter are becoming more flexible with local stakeholders after the crisis. The setbacks did not prevent rural producers from showing a significantly high level of self-esteem, confidence and pride, notably thanks to the appreciative feedback from customers and to constructive social interactions with different AFNs stakeholders.

The Lebanese local food system is also home to historical and newly emerging challenges that begin with the absence of unified references within governmental agencies and which creates confusions, delays and chaos in the relationship between the government and small scale producers. Furthermore, the government does not apply any import policy to protect the local produce; and quality control mechanisms are quasiabsent on the Alternative Food Network level.

Other challenges revolve around the lack of standardized pricing mechanisms on producers' level, who not only struggle with this inexperience, but also with the fact that market prices of their commodities are set vis-à-vis the prices of the conventional counterparts, who have the economies of scale's advantages. Moreover, the devaluation of the Lebanese Pounds and the constant prices fluctuations created a struggle for producers, firstly because many bi-products (notably packaging) are dollarized.

Secondly, because it has situated them in a struggle of changing their prices while taking into account multiple variables that could affect their sales traction and customer retention. Lastly, the country's lack of proper logistics, transportation and distribution infrastructure has rendered producers disadvantaged to compete in the market, notably when big last minute orders are inflexible to satisfy on the artisanal level of AFN.

The change in behavior has also been reflected on consumers, who decreased their reliance on supermarket shopping of fully dollarized commodities and increased their online demand for local produce. Although quality is of an utmost priority to Lebanese consumers, the majority of the sample is not aware of the origin of their food. Awareness on sustainable consumption and local food production is intermittently and informally spread in the country and does not target the critical mass, which suggests the urgency to enhance this component and showcase positive repercussions within the marketing and communication scopes of any AFN actor, entity or institution.

Finally, the developmental sector is heavily subsidized, yet neglecting the interventions in critical constituents of the value chain like acquisition, logistics, quality control, legal, packaging and export. The country witnesses a heavy focus on capacity building and machines, and several question marks about their equity of distribution.

In brief, these challenges present an exclusion of the small rural producers from the governmental scope, a matter that can be solved by laying the foundations of a Lebanese MSMEs definition and laws, while putting it at the center of the related policies and serviceable components. Starting by the unification of definitions while paving the way for a national-local communication beyond what syndicates are applying is expected to diminish the gap in working on the abovementioned matters. As the Lebanese Republic is finalizing the relative laws and definitions of local MSMEs, it is highly required to update the data of producers beyond the registered ones, and have this action being taken on an official level rather than on an informal level, as it is being done sporadically with local NGOs. The national mismanagement of POs and Cooperatives in Lebanon resulted in disallowing them from reaching their full potential as agents of resilience, and subsequently limiting their buffering capacity while facing the crisis. This organizational deficiency in POs suggests the need to approach them on two different yet complementary levels: the first being a rehabilitation to the existing policy and system, while the second is a bottom up reinforcement that would render the internal operating models of POs more efficient and relatively participatory.

The research, nevertheless, retrieved decent marks of adaptation, notably on the post-production level, responding to the producers' market access ambitions. All those challenges can in fact be turned into opportunities for the private sector. Businesses are able to emerge and fill the gaps by offering services for producers such as warehousing, delivery to their clients or Points of Sales, management of orders versus invoices, money collection, marketing and accounting; as one-stop-shop hubs. They can also contribute in widening the scope of sales and infiltrate the products in guesthouses, restaurants, pastries, and other actors of the B2B market that the producer struggles to

scale into. The result, given its viability, would be allowing small scale producers to entirely focus on their production, get creative with the abundance of their time and limit their cluttering logistical follow up.

As the post-production components of the value chain are somewhat manageable with the existence of multiple options, the pre-production components are considered quite challenging due to the fact that several bi-products and raw materials are controlled in availability and price by conventional big merchants. Since this is a national issue, its solution lies within the proper regulations, however it is fair to suggest that humanitarian aid might need to widen its scope of assistance and design interventions that would ease the calamity of this component. Doing so will require closer relations with the field and increased amounts of pragmatic data.

The Lebanese local food system, maintained by the rural small scale producers is in dire need to a reform that allows it to move from a neglected informal status, to a constructed semi-informal framework. In order to succeed, this new framework needs to take into consideration the definition of agro-food smallholders, the logistical and intellectual needs/education that contribute to their business optimization and finally, the equity of distribution in subsidies to make sure that even the ones who not showing characteristics of entrepreneurship are also benefiting.

APPENDIX 1

QESTIONNAIRE IN ENGLISH

For rural small scale producers:

- 1- Category: Livestock & Dairy Fresh Fruits & Vegetables Provisions & Agriprocessed Bread & Bakery Honey Wine
- 2- Gender
- 3- Age
- 4- Marital Status
- 5- Number of children
- 6- Educational level
- 7- Are you registered as a company?
- 8- Are you registered as a brand?
- 9- Reasons for farming/producing:
 - a- Exclusively for home consumption with rarely any surpluses produced
 - b- Mostly for home consumption, but with the intention of selling surpluses on the market
 - c- Partly for the market and partly for home consumption
 - d- Exclusively for the market
- 10- In which stage are you?
 - a- Establishment
 - b- Survival
 - c- Early growth
 - d- Rapid growth
 - e- Maturity
- 11- Are you the most responsible person in the household?
- 12- When did you start? (x years ago)
- 13- Do you own your premises/land?
- 14- Do you have or did you ever have any certification?
 - a- If yes, which and what advantages did it give you? If not, why not/anymore?
- 15-Do you belong or did you ever belong to a producers' organization or cooperative?

- a- If yes, what advantages did it give you?
- 16- Are you involved in the decision-making process in that PO?
- 17- If you need help, where do you go?
 - a- Ministry of Economy & Trade
 - b- Ministry of Agriculture
 - c- Ministry of Social Affairs
 - d- Municipality
 - e- Governorate
 - f- Chambre du Commerce
 - g- Religious entity
 - h- Local NGOs
 - i- More experienced producer
 - j- IDAL
 - k- IMC
 - 1- None
 - m- I don't know
 - n- Other
- 18- What do these agencies offer?
 - a- Registration
 - b- Certification
 - c- Quality Control & Standardization
 - d- Training & Capacity building
 - e- Subsidies
 - f- Export Mechanism
 - g- Market access
 - h- Information
 - i- Local & Institutional support
 - j- Credits
 - k- Nothing
 - 1- I don't know
 - m- Other
- 19- Do you receive any of these services?

- a- Vaccination (Livestock)b- Feed (Livestock)
- c- Training
- d- Workshops
- e- About about any desease or problem in the field (Livestock or agriculture)
- 20- If yes, from whom?
 - a- Governmental agencies
 - b- Local NGOs
 - c- International NGOs
- 21- Do you have health insurance?
- 22- If yes, what kind of insurance do you have?
 - a- NSSF
 - b- COOP
 - c- Private Insurance
 - d- With your children
- 23- Do you have access to credits?
- 24- If yes, what kind?
 - a- Micro-credit
 - b- Kafalat
 - c- Loans
 - d- Other
- 25- Why do you use it?
 - a- Buy raw material
 - b- Buy bi-products
 - c- Invest in infrastructure
 - d- Get training
 - e- Marketing
 - f- Other
- 26-What were your direct sales channels up until the end of 2019?
 - a- Nested market (farmers' markets)
 - b- Conventional market (Supermarkets, local retailers...)
 - c- Entourage & Word of Mouth (neighbors, village, family, acquaintances...)

- d- Export
- e- (for) BtoB (Restaurants, Pubs, industrial entities...)
- f- Digital/Online
- g- Other
- 27- What were your indirect sales channels up until the end of 2019?
 - h- Nested market (farmers' markets)
 - i- Conventional market (Supermarkets, local retailers...)
 - j- Entourage & Word of Mouth (neighbors, village, family, acquaintances...)
 - k- Export
 - 1- (for) BtoB (Restaurants, Pubs, industrial entities...)
 - m- Digital/Online
 - n- Other
- 28- Were they enough to sustain you?
- 29- What are they now in the crisis?
- 30- Is it nowadays enough to sustain you?
- 31-Is it being a fair deal when you sell via a POS or an intermediary?
- 32-Does this intermediary or POS give you good service compared to the percentage you are giving him?
- 33- What is "Organic" to you?
- 34- How do you measure your time/energy/effort?
- 35- What is the quantity consumed at home? (in percentage)
- 36- Who decides on the quantity produced? (wife, spouse, myself)
- 37- What are the months in which you process & produce the most?
- 38- What are the kinds of containers/packages you use? (Plastic bags/containers, glass, carton/paper)
- 39- How much do they cost?
- 40- Who decides on the final price?
- 41- How do people know about your production?
- 42- How much time do you usually need for a big last minute order?
- 43-Do you use modern ways or traditional ways in your production or a mix of both?
- 44- In which departments do you need help to optimize your business?

- a- Acquisition
- b- Production
- c- Machinery
- d- Logistics & Transportation to POS
- e- Marketing
- f- Advertising
- g- Sales
- h- Quality control
- i- Finance and Accounting
- j- Strategy
- k- Legal
- 1- Packaging
- m- Export
- n- Training and capacity building
- o- I don't know
- p- Other
- 45- How many times per week do you have to travel outside your workshop to conduct or deliver for a sales activity?
- 46-Does your production capacity allow you to add more sales channels, but due to limited market access you do not?
- 47- What were the challenges between the post-war years and 2019 to maintain this business? (up to 3 challenges)
- 48- What are the current challenges?
- 49-Would you want your products to feature in supermarkets and other conventional stores?
- 50-Working status
 - a- Full time producer
 - b- Part time producer
- 51- When did you leave everything and made yourself fully available to the craft?
 - a- From the beginning
 - b- After 1 year of operation
 - c- After 2 years of operation

- d- After 3 years of operation
- e- After 4 years of operation
- f- After 5 years or more
- 52- How much is your monthly income? (\$1 = 3900L.L.)
 - a- <\$1,000
 - b- \$1,000 \$3,000
 - c- \$3,000 \$5,000
 - d- \$5,000 \$10,000
- 53-Do you consider yourself selling to a niche segmentation? (Y/N)
- 54- In which component(s) or stage(s) of your value chain do you consider yourself distinctive?
 - a- Price
 - b- Product quality
 - c- Production mode
 - d- Social organization of time and space (related to source of produce and local origin)
 - e- Availability
- 55- Are your consumers recognizing and appreciating these distinctions? (Y/N)
- 56- Is this recognition and appreciation enhancing your social interactions networks?
- 57- What triggers you to be creative and innovative? (whether on production level, distribution level, etc.)
 - a- The fact that you are marginalized from the conventional system?
 - b- The fact that you are lacking resources?
 - c- The fact that you are allowed to create freely with low restrictions/rules?
 - d- The fact that you are well established in a social network and your stakeholders (including consumers) are open to novelty
 - e- The fact that you are distinct and constant innovation/creativity is needed to maintain this momentum?
 - f- Other
- 58-Do you believe that rural tourism is another way of a market activity to create revenue?

- a- If yes, have you started using it? How is it affecting you?
- 59- Name up to 3 local suppliers for your bi-products
- 60-Name up to 3 suppliers we lack as bi-products in Lebanon
- 61-Do you recycle and/or employ renewable energy in the production process?
- 62-Do you or any of your suppliers use chemical pesticides to grow the food? (Y/N/I don't know)
- 63- Do you think it is important to protect biodiversity?
- 64-Why?
- 65- How many family members help you running the business?
- 66- How many of them are women?
- 67- Who participates in the decision making?
 - a- Me alone
 - b- Me and my partner
 - c- The whole family
- 68- Who has shares?
 - a- Me alone
 - b- Me and my partner
 - c- The whole family
- 69- Do you document all your financials?
- 70-Do you submit them to any official agency?
- 71- How many employees do you have?
- 72- Is there any non-family member in the company/craft who participate in the decision making?
- 73- Are you open to have an exterior partner?
- 74- Who do you call when you need help? (Local community/anyone available)
- 75-Why did you start this craft/trade?
 - a- It used to run in the family
 - b- I own the land/premises
 - c- I have the passion/Enjoyment & Tradition
 - d- By necessity/Primary income
 - e- Extra income for the family
 - f- Other

- 76- What is the percentage of raw material coming from your land?
- 77- What is the percentage of raw material coming from your area/neighboring entities/village?
- 78- What is the percentage of raw material you buy from the supermarket or industrial suppliers?
- 79- How do you compare your average price to the same imported commodity or a ? (Lower/Same/Higher)
- 80- How is your revenue being divided?
- 81- Do you mix your own's money with the work's money?
- 82- What change in consumer behavior are you facing in this crisis?
- 83-Did your sales increase now that we cannot import as easily as before?
- 84- Do you have an internal or external quality assurance system that you abide by?
- 85-Do you have standardized recipes?
- 86-How do you rate over 10 your need to branding, differentiation and labels?
- 87- What creates value in your work?
 - Value adding attributes (tools that differentiate your products)
 - Resources used
 - Skills and competencies
- 88- How likely are you to:
 - Create a price premium for your product
 - Increase cost/price to keep standard
 - Increase cost/price to add certification
- 89- Do you have any strategic partnerships?
- 90- How do you rate your access to resources? (Good Neutral Bad)
- 91- How do you rate your access to infrastructure? (Good Neutral Bad)
- 92- How do you rate your access to technology? (Good Neutral Bad)
- 93-Do you think that communities are losing respect for traditional culture?
- 94-Do you feel that you are well supported by your village and your community or is there any feeling of jealousy?
- 95- Are you involved in the decision-making process if any change in the village/area affects your work?

- 96-Do you take care of all the process by yourself or do you outsource any components? (Family is not considered outsourcing)
- 97- Do you seek training/workshops/capacity building? (Yes/No, if they come I take)
- 98-Do you think that development aids are being distributed equally?
- 99-How many times have you been assisted by a fund/NGO/project?
- 100- What did they offer?
 - a- Acquisition
 - b- Production
 - c- Machinery
 - d- Logistics & Transportation
 - e- Marketing
 - f- Sales
 - g- Quality Control
 - h- Finance & Accounting
 - i- Strategy & Consultancy
 - j- Legal
 - k- Packaging
 - 1- Export
 - m- Training & Capacity Building
 - n- Other
- 101- How likely are you willing to change your practices to adapt? (Not likely, likely, very likely)
- How did you change your practices and operations to adapt with the changes of 2020?
- 103- How did this affect:
 - a- Your sales? (Increased sales, Same Sales, Decreased sales)
 - b- Your relationship with your consumers? (Better relationship, Same relationship, Worse relationship)
 - Your relationship with your suppliers and partners? (Better relationship,
 Same relationship, Worse relationship)

- Where would you grow more, in a laissez faire system or in a regulated one?
- 105- Where do you think you meet with the industrial sector?
- 106- Self-Esteem test score

For the Ministry of Economy & Trade

- 1- What does the MoET offer to small scale producers?
- 2- How does the MoET control the quality of the small scale producers' products?
- 3- Are there any specific criteria set by the MoET to distinguish what a small scale producers is?
- 4- If yes, what are they?
- 5- Does the Ministry work with third parties like NGOs and private sector to secure funds and subsidies for SMEs?
- 6- Who controls the market? Do we a have quotas for what to be sold her and what to be exported?
- 7- What is the import strategy of the ministry to protect the local produce?
- 8- Is it better to import at a lower cost or to promote national production?

For the Ministry of Agriculture & the IMC

- 1- How do you define a small scale farmer? (Land area, volume of production...)
- 2- How many small scale farmers are there in Lebanon?
- 3- What does the ministry offer to small scale farmers?
- 4- What are the agricultural standards practices promoted by the MoA?
- 5- How do you know if small scale farmers or farmers in general abide?
- 6- How does the MoA help in creating a market linkage for the small scale farmers, or farmers in general?
- 7- How does the MoA define organic agriculture?
- 8- How much does it cost on average to have the organic certificate?
- 9- What are the advantages in having an organic certificate?
- 10- What are the minimum standards for initiating a certificate process?
- 11- Does the MoA look into the agro-processed foods sector?

- 12-Does the ministry have a clear standard procedure to apply on Cooperatives?
- 13-Does the MoA have a certain quota on the yields being harvested?
- 14- Who controls the quotas of the import/export? Based on what criteria?
- 15- Is it better to import at a lower cost or to promote national production?

For Souk El Tayeb

- 1- How do you describe the evolution of Souk El Tayeb since its foundation until now, given the external factors affecting the country?
- 2- How do you describe the impact on SET producers?
- 3- How does Souk El Tayeb differ from other grassroots initiatives like SFB?
- 4- How important is it to protect culture?
- 5- In your opinion, other than market access, what is preventing small scale producers to thrive?
- 6- How does Souk El Tayeb manage the quality control of the products being sold?
- 7- Who are the clientele of Souk El Tayeb?
- 8- Is the clientele changing? How?
- 9- Do you think that products of small scale producers should be restricted to niche clientele, or could they be sold in mass?
- 10- You have been around, how do we compare to European countries in terms of SSP market access?
- 11- What does the Slow Food sector need to be more adopted within the Lebanese community?
- 12- In which areas would you improve SET as an entity given that you have the means?
- 13- Do you think that conventional and alternative food system complement or oppose each other?
- 14- How did this new location help SET evolve and increase the impact on SSPs?
- 15-Do you think that this system is still working now with the digitalization of everything?
- 16- How is Souk El Tayeb adapting?

- 17-How impactful is rural tourism on diversifying the income of rural communities? Can it be a market by itself?
- 18-Is it better to import at a lower cost or to promote national production?

For Consumers

- 1- Do you buy your own groceries? (or part of it?)
- 2- Where do you buy your groceries from?
- 3- What is the percentage of local-made groceries you buy?
- 4- How many times do you buy from your rural family acquaintances and/or your village's supplier? (on average over 10)
- 5- From where do you buy the other times?
- 6- How frequently do you buy from small scale producers?
- 7- Are you buying more from them now in the crisis?
- 8- How do you rate the quality of their products?
- 9- On a scale over 10, how much do you know about your small scale producers' food safety measures?
- 10- If you have to choose between a small scale producer's product or an industrial one from the supermarket, knowing that the industrial one has all the needed certifications and quality measures apply, what do would you choose?
- 11-Why?
- 12-If you see the product of a small scale producer you know on a supermarket shelf, would you still buy it or would you consider it an industrial one that lost authenticity?
- 13-To which categories do the products you buy from Small scale producers belong to?
- 14- Do you prefer to buy online or to meet the producer?
- 15-Do you believe that if you visit the producer's workshop, you will improve your connection with him and become an ambassador to his work?
- 16- What do you look into while buying these groceries? (Price, Quality, Origin, Authenticity)

17- Is it better to import at a lower cost or to promote national production?

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