IMPACT OF THE FINANCIAL CRISIS ON THE AGRICULTURAL SECTOR

Rapid Assessment Report – March 2020
# Table of Content:

List of Acronyms: ........................................................................................................... 3

Context .................................................................................................................................................. 4

A. Executive summary......................................................................................................................... 4

B. Methodology .................................................................................................................................. 5

C. Findings........................................................................................................................................... 6

   Land ownership............................................................................................................................... 6

   Change in selling price..................................................................................................................... 7

   Disrupted Access to inputs.............................................................................................................. 7

   Lack of access to credit and payment facilities............................................................................... 8

   Indebtedness ................................................................................................................................... 8

   Expected incomes.......................................................................................................................... 9

   Impact and coping strategies ......................................................................................................... 9

D. Recommendations ........................................................................................................................ 11

   Immediate assistance needed (in order of priority)........................................................................ 11

   Long term support (in order of priority) ........................................................................................ 11
List of Acronyms:

BMC = Beirut, Mount Lebanon
CREAL = Centre de Recherche et d’Etude Agricole Libanais
DNM = Dunums
KII = Key Informant Interview
LARI = Lebanese Agronomic Research Institute
LBP = Lebanese Pound
PUI = Premiere Urgence Internationale
SMEB = Survival Minimal Expenditure Basket
USD = United States Dollars
**Context**

Since summer 2019, the financial situation in Lebanon has continued to deteriorate, strongly impacting the agricultural sector, and adding up to the chronic difficulties already encountered by the agricultural sector in Lebanon.

Difficulties in accessing foreign currencies in the country and the increasing exchange rate of the Lebanese Lira (between 40 and 70% in January 2020) have disrupted importations, resulting in high inflation for imported and local products.

In February 2019, according to the United Nations World Food Program, the average cost of food had increased by 36% (Survival & Minimum Expenditure Basket – SMEB), directly impacting the food security of the most vulnerable households, both Lebanese and Refugees. Same challenges are also affecting agricultural inputs markets and products’ sales, affecting all agricultural value chains.

In this context, Premiere Urgence International (PUI) in Lebanon, launched a rapid assessment in order to evaluate the impact of the financial crisis on farmers, looking into coping strategies they will adopt at short and medium term.

**A. Executive summary**

The financial crisis has strongly affected agricultural value chains. All value chains are, to a certain extent, relying on imported inputs for which market chains have been disrupted by the financial situation.

The decrease in value of the Lebanese Pound (LBP) in comparison to US dollar led to an increase in prices of all inputs, mainly imported from abroad, by 30% to 50% in average: fertilizers, seeds, pesticides, animal fodder, veterinary products, tarpaulin, and other agricultural products are imported. These figures have been recorded at the time of the survey (Dec2019 / Jan2020), the current figures as of today (March2020) show an increase of 70 to 80% due to high variation in currencies exchange. Commercial transactions are relying on US dollars, which are no more available at the official exchange rate. Importers, wholesalers and local retailers are then struggling to purchase usual goods and some specific brands of products are less available.

In October 2019, most of the inputs were already in stock for the sowing season, therefore disruptions will mainly impact the next agricultural seasons. Interviewed farmers reported that the increase in production costs will eventually lead to a 44% reduction of their profits. They are also worried of being unable to sell all their production given that consumers are currently more vulnerable as well.

A major risk linked to the crisis is the disruption of traditional funding mechanisms. As described¹ by Dr. Riad Fouad Saade, director of the CREAL², the crisis impacted an agricultural system that was already at risk due to its dependency on credit as a method of payment, rather than cash. In the absence of agricultural credit services, importers provide capital to retailers who themselves provide credit to farmers. Being unable to repay completely, many farmers end up in a spiral of

---

¹ Diagnosis of the Lebanese agriculture in light of the financial crisis, Conference in AUB, 20/01/2020
² Centre de Recherches et d’Etudes Agricoles Libanais
indebtedness. Since October 2019, the CREAL estimates that the total farmers’ debt to retailers is of 80 million USD and the retailer’s debt to importers and banks is estimated at 60 Million USD.

Following the crisis, farmers point out new difficulties in accessing credit, which usually allows them to buy the necessary inputs until harvest and debt repayment. These credits, mostly contracted directly with product buyers or input suppliers, are now almost always refused, which leads to an inability for farmers to obtain supplies to start their crops. Without required inputs, farmers are expecting to reduce their cultivated area and to face a reduction of yields.

The situation constitutes a shock on agricultural livelihoods and will directly result in immediate negative effects leading to negative coping strategies:

- Reduced in yields and changes of selling prices
- Reduction of the cropping area
- Reduction of agricultural incomes

Coping with such situation will lead farmers to adopt extreme measures to sustain their activity and avoid bankruptcy, as most farmers have already high indebtedness. A reduction of half of the labour force, mostly Syrian workers, is expected, as well as cuts in already very low wages. This will indirectly affect vulnerabilities of the Syrian refugees in Lebanon, who largely rely on agricultural seasonal incomes.

Some farmers mentioned other potential mitigation measures such as resorting to adolescent and youth labor or moving out of agriculture.

In the long term, farmers will also need to reestablish funding mechanism or find other sources of inputs, to be able to sustain their activity.

**B. Methodology**

In December 2019 and January 2020, Première Urgence Internationale (PUI) conducted a study to determine the future impacts on the agricultural sector. In a first phase of Primary data collection, Interviews were conducted with the Ministry of Agriculture, the Lebanese Agronomic Research Institute (LARI), municipalities and 20 farmers.

<table>
<thead>
<tr>
<th>Activity / # of farms</th>
<th>BML-South</th>
<th>Akkar</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Vegetables (+ pulses)</td>
<td>35</td>
<td>42</td>
<td>77</td>
</tr>
<tr>
<td>Cereals</td>
<td>8</td>
<td>1</td>
<td>9</td>
</tr>
<tr>
<td>fruit &amp; olive tree</td>
<td>30</td>
<td>15</td>
<td>45</td>
</tr>
<tr>
<td>breeding</td>
<td>8</td>
<td>2</td>
<td>10</td>
</tr>
<tr>
<td>other</td>
<td>0</td>
<td>4</td>
<td>4</td>
</tr>
</tbody>
</table>

A primary data collection survey was then conducted with a larger sample of farmers through farm visits and completed with several phone surveys.

The list of interviewees was drawn from a snow-ball method, asking each farmer to identify another farm to visit. Other farmers contacts were shared by municipalities or drawn from previous PUI projects’ list of beneficiaries.
The sample was purposively spread between various cropping and breeding activities, while also making sure to balance between small and larger land holders, and between different agro-ecological zones.

Based on internally available resources, 107 interviews with farmers were conducted. Results aren’t then quantitatively representative of the whole agricultural sector, but provide a qualitative overview of the situation:

- Two regions - Southern Lebanon (51 farms) and Akkar (56 farms)
- 4 clusters were defined per area:
  - Cereal farms
  - Vegetable farms
  - Fruit tree farms
  - Livestock farms
- Sample divided between coastal/plain and mountainous area (ideally 50%-50%)
- Small and larger farms: 60% smaller than 10 dunums of cultivated land and 40% with more than 10 dunums

### Land ownership

The survey first investigated access to land for each farm. Although not yet directly impacted by the crisis, assumption was made that it would influence the capacity of each farmer to cope with the coming difficulties. Farmers renting part or all of their land might struggle more as they have to pay for a rent (whether fixed or as a share of the harvest). They are also more likely to reduce their cultivated area as a result of the lack of inputs and incomes.

Two third of the interviewed farmers are owning their cultivated land, either totally (53%) or partly (11%). However, one third is solely relying on rented land and might be more vulnerable. Small holders are more likely to own the little land they use, in comparison to larger size farms.

<table>
<thead>
<tr>
<th>Agricultural land size</th>
<th>BML-South</th>
<th>Akkar</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>small holder-0 to 5 dnm</td>
<td>11</td>
<td>14</td>
<td>25 (23%)</td>
</tr>
<tr>
<td>medium hold.- 6 to 15 dnm</td>
<td>17</td>
<td>19</td>
<td>36 (34%)</td>
</tr>
<tr>
<td>large hold.- &gt; 15 dnm</td>
<td>23</td>
<td>23</td>
<td>46 (43%)</td>
</tr>
<tr>
<td>AVG cultiv. area in dnm</td>
<td>48 dnm.</td>
<td>29 dnm.</td>
<td>38 dnm.</td>
</tr>
</tbody>
</table>

*C 1 dunum (dnm) = 0.1 ha*

<table>
<thead>
<tr>
<th>Farms owning land per size category (Table 4)</th>
<th>Total #</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>small holder-0 to 5 dnm</td>
<td>18</td>
<td>72%</td>
</tr>
<tr>
<td>medium hold.- 6 to 15 dnm</td>
<td>23</td>
<td>64%</td>
</tr>
<tr>
<td>large hold.- &gt; 15 dnm</td>
<td>26</td>
<td>57%</td>
</tr>
<tr>
<td>Total</td>
<td>67</td>
<td>64%</td>
</tr>
</tbody>
</table>
When asked about the impact of the crisis on their selling prices, 60 of respondents (56%) declared that their selling prices would change. However, this number was significantly higher for Akkar than for South Lebanon. As explained by farmers, they are not the only decision makers with regards to prices as the buyer is often able to unilaterally change it. As farmers in Akkar are usually dependent of a unique buyer, it could explain this difference in change of prices.

Whether increase of decreasing, prices are expected to change by 30% in average.

Looking at the number of buyers, 100% of farms in Akkar are dependent of a unique buyer, while farms in BML and South have more than 2 buyers.

Regardless of the type of buyer they work with (market stall, direct selling at the farm, wholesaler, etc.), all farmers mentioned that their commercial relationships had been disrupted either in a change of prices, in a reduction of quantities traded or in the terms of payment. Indeed 63% of respondents mentioned delays in being paid compared to previous years.

Disrupted Access to inputs
Farms mainly purchase their inputs from local shops (55%), from larger retailers or cooperatives (23%) or directly from importers (21%). One farm only was in capacity to produce part of its inputs. As expected, 100% of farmers mentioned that their commercial relationship with suppliers are disrupted as a result of the crisis:

- 100% reported increased prices for inputs
- 41% mentioned that Suppliers blocked credits (89% in the south and 28% in Akkar)
- 2% mentioned that quality of inputs had reduced
- 2% that less quantity or specific brands were not available
Specifically asked about variations in cost of inputs, farmers mentioned increase of prices ranging from 37 to 51% compared to last year.

<table>
<thead>
<tr>
<th></th>
<th>Reported Average price increase (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>seeds / seedlings</td>
<td>51 %</td>
</tr>
<tr>
<td>fertilizers</td>
<td>51 %</td>
</tr>
<tr>
<td>pesticides</td>
<td>51 %</td>
</tr>
<tr>
<td>veterinary products</td>
<td>43 %</td>
</tr>
<tr>
<td>animal food</td>
<td>49 %</td>
</tr>
<tr>
<td>other items</td>
<td>37 %</td>
</tr>
</tbody>
</table>

Variations are important according to each specific variety of seeds, or brand of fertilizers. Prices for the same products are also varying from one shop to the other.

Several farmers also mentioned that some type of fertilizers of seeds were not available anymore. To cope with this increase of prices, farmers are left with very few strategies. 53% even mentioned that the only solution would be to stop part or all of their production.

**Lack of access to credit and payment facilities**
As mentioned previously, farmers usually rely on loans in order to purchase inputs. Depending on the value chain and the region, those loans are obtained either from the input supplier (through a delayed payment) or from the buyer on wholesale markets.

Since the beginning of the crisis, farmers reported that those informal credit mechanisms were jeopardized. **40% of interviewed farmers (8 out of 20) mentioned difficulties to access credit from their suppliers or buyers as usual. 50% of respondents mentioned lacking cash to buy their inputs.**

Differences per region were noticeable with farmers in BML and South facing more challenges to be able to negotiate delayed payments (after the harvest) than in the North. Farmers mentioned that credit were mostly not possible anymore except if reimbursed in dollars or based on the black market exchange rate.

**Indebtedness**
Before the crisis, a majority of farmers (64%) were often facing indebtedness with high disparities in the South and North: 87% of respondents in Akkar declared to have debts, but only 41% in the South/BML, for an average running debt of 18 million LBP.

Despite the lack of access to traditional credit mechanisms, half of the farmers could still contract new debts with their suppliers or through relatives. Facing increased costs of production, 55% of respondents declared to have taken additional debts (87% in Akkar and 19% in the South), for an average of 10.5 million LBP.
**Expected incomes**

Due to increased costs of production and reduced sales, 84% of the respondents eventually expect for a reduction of their incomes in 2020. The average expected reduction is estimated at 44% for all farmers (51 in BML South; and 39% in Akkar).

![Expected income reduction in 2020](image)

**Impact and coping strategies**

Overall, when asked about the main impact the crisis has on their activity, respondents mentioned to expect:

- **Reduced yields (46%)**
- **Reduced incomes (48%)**
- **Being unable to crop part or all of the land (6%)**

To cope with these impacts, strategies are limited for already vulnerable farmers, especially given the lack of access to financial services and funding.

Overall, expected measures revolved around a reduction of production costs to compensate the increase in inputs prices:

- **Reduction of labour force (48% of respondents): by an average of -52%**
  - Replace workers with family labour (10% of respondents)
  - Reducing salaries (10%): by an average of -42%
  - Changing type of crops (13%)
- **Reducing quantities or qualities of inputs (20 & 25%)**
  - Find other income sources, move out of agriculture (6%)

To be noted that 6 farms out of 107 respondents also mentioned that they were likely to involve adolescent and youth under 18, in agricultural labor.
During Key Informant Interviews (KII) with farmers, more than half of the farmers (5 out of 9) in the south mentioned that they had to reduce their cultivated area by 20 to 80%. The municipalities of Aarida and Cheikh Zanaad also reported that some farmers are still unable to plant a single plot in their area.

In Akkar, 10 out of 11 farmers (91%) reported a reduction in cropping surface with an average reduction of 53%.

Another strategy described is to change crops to prioritize ones with lower input costs, or with earlier harvest and income. These crops, like winter wheat, although more attractive in the short term, also offer lower incomes.

In the midterm, these coping strategies will entail significant risks for farmers and in particular the most vulnerable:
- Impoverishment of farmers and daily workers depending on the agricultural sector,
- Bankruptcy risk,
- Decision to move out of agriculture,
- Decapitalization – selling land and other physical assets.

At the national level, Lebanese agriculture risks in the short term a reduction in its overall production and a further increase in food prices. Economic impact on farmers will also affect agricultural value chains and their various stakeholders as a whole. It may also eventually result in a further degradation of working conditions, wages and work opportunities of Syrian refugee households, who depends on agricultural livelihoods.

In parallel, to cope with the increase in the cost of the average food basket, KII reported that many families were planning to cultivate available plots, with a view to establish vegetable production there. Although they do not necessarily have agricultural know-hows and background, these families hope to be able to reduce their expenditures on vegetables. This phenomenon, first mentioned by the Ministry of Agriculture, has been confirmed by several municipalities (Aarida and Cheikh Zanaad), who report that up to 30% of families are preparing plots of 200 m2 on average.
D. Recommendations

At the end of the interview, each respondent was also asked to recommend both short term and mid/long term support that are required to support farming systems during the crisis.

**Immediate assistance needed (in order of priority)**

- Support access to seeds (grants, donations, subsidies)
- Support access to inputs (grants, donations, subsidies)
- Immediate loans (with low interest rates)
- Debt repayment
- For the government to fix maximum prices for agricultural inputs

**Long term support (in order of priority)**

- Promotion of agricultural techniques to reduce use of inputs
- Initiate links with new suppliers, especially for local seeds and inputs
- Support the development of a local production of inputs
- Support farms in marketing to boost sales
- Enable low interest loans
- Support diversification of income sources for farms
- Support the implementation (with trainings and inputs) of new crops with higher values