



Science for resilient livelihoods in dry areas

# The gendered impacts and coping strategies of the COVID 19 pandemic in rural Egypt and Tunisia

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Project brief

## Abstract

Through a survey carried out with male (206) and female (204) dryland farmers in rural Egypt and Tunisia, we examine how COVID-19 affected them, and identify coping mechanisms they employed to maintain crop and livestock supplies, sales, market connections, and personal wellbeing. Since dependence on digital resources increased during the pandemic, we paid close attention to trends in cellphone ownership, access, and preferred means for receiving digital information. Findings suggests that building women's resilience to the impact of COVID-19 and even afterward, through better transport, consistent and affordable supplies of feedstock and other agricultural inputs, digital access, and on domestic issues, is a good place to start for strengthening the resilience of households and whole communities.

**Keywords:** Covid 19, Egypt, Tunisia, Gender inequality, Digital Extension

## Introduction

The current context of the COVID-19 pandemic provides an urgent opportunity to improve agricultural services, as the pandemic in many MENA countries continue to have profound impacts on rural livelihoods.

In the Middle East and North Africa (MENA) in particular, the literature on COVID 19 impacts and coping strategies are limited. As the COVID-19 pandemic places additional pressure on women and men farmers in the MENA region while also interfering with traditional extension services, the need to address the issue of gender in digital extension is pressing and is an opportunity to address gender gaps in responding to the pandemic.

## Methods

We interviewed women and men farmers in four different regions in Northern Tunisia and two different regions in Northern Egypt (see Figure 1 for locations) to understand the impacts of COVID 19 on their livelihoods and wellbeing, as well as their preferred means for virtual extension (See Table 1 for sample size and characteristics of respondents). We drew on a roster of cellphone numbers and local leaders in the community to reach farmers via phones in the target regions. We aimed for interviewing an equal number of men and women respondents.

Table 1. Characteristics of Survey Respondents

	Tunisia		Egypt	
	Male	Female	Male	Female
<b>Sample Size</b>	99	101	107	103
<b>Education level</b>				
Illiterate	3,0%	26,7%	21,5%	35,0%
Primary (6 years of schooling)	32,3%	25,7%	15,9%	17,5%
More than primary	64,6%	47,5%	62,6%	47,6%

Marital status				
Married	86,9%	87,1%	93,5%	76,7%
Single	12,1%	5,0%	5,6%	1,0%
Widow		5,9%	0,9%	18,4%
Divorced	1,0%	2,0%		3,9%
Location				
Kef	25,3%	250,0%		
Beja	25,3%	24,8%		
Zaghouan	24,2%	25,7%		
Siliana	25,3%	24,8%		
Behera			52,3%	47,6%
Bani Suweif			47,7%	52,4%

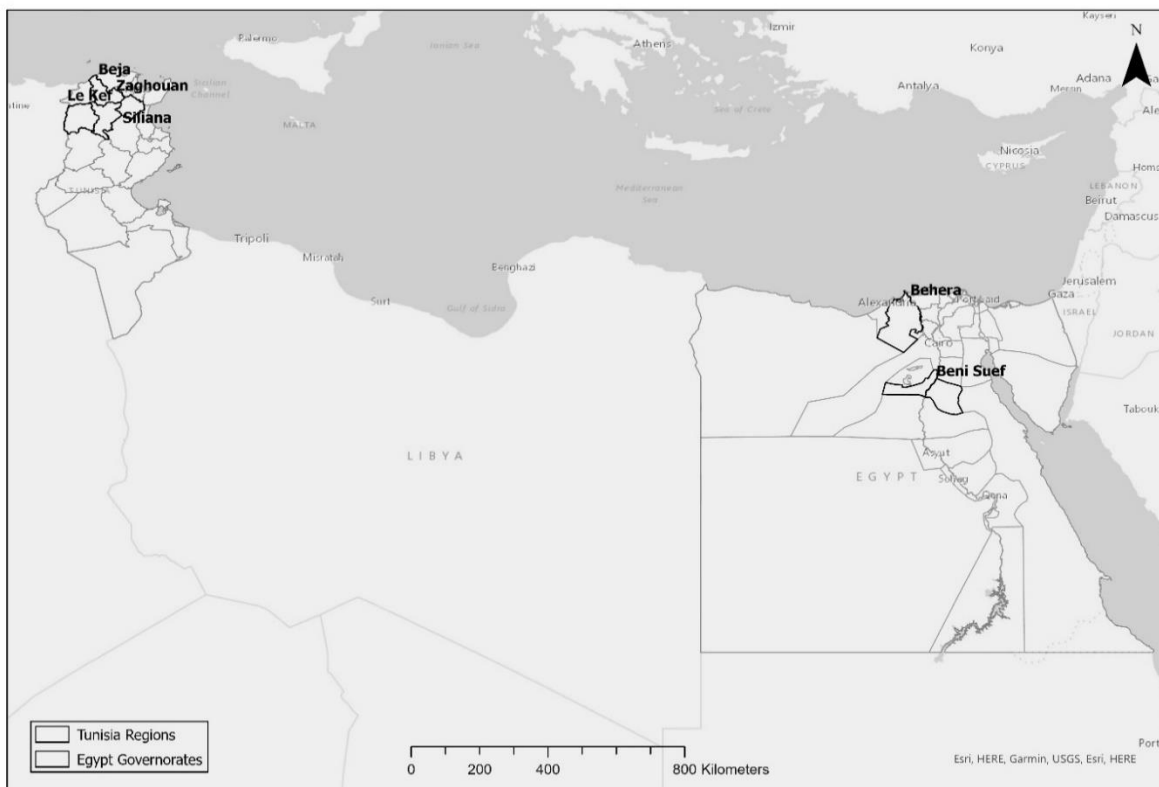


Figure 1. Map of research sites in Egypt and Tunisia.

## IMPACT ON SALES, INPUTS, AND SERVICES

### Livestock and Feed

COVID-19 lockdowns disrupted veterinary services and livestock sales in both countries. Larger livestock (cows and buffalo) especially in Egypt were affected the most by lack of veterinary services due to untreated diseases. Market closures and suspension of transport services coincided with the national Adha holidays, usually the most profitable time of the year for livestock farmers. Farmers in both countries managed to sell some livestock to local butchers but incurred overall losses.

The sale of milk and dairy products at local collection points continued in both countries, albeit in lower quantities and hence lower profit margins. Because local markets were closed, women who usually sold milk and dairy products were severely affected. However, some Egyptian women responded to the reduction in milk sales by processing milk into ghee, cheese, and other dairy products with longer shelf lives. In Tunisia, women responded to reduced milk sales by donating milk to neighbors in crisis and by selling milk from home at lower prices. When lockdowns lifted, sales of milk and dairy products recovered, but so far only to 85% of pre-pandemic sales.

Both countries experienced disruption in livestock feed supplies because of price increases during the pandemic (38% and 56% of male and female farmers, respectively, reported that in Tunisia), which farmers attributed to traders' monopolies. In Zaghouan region in Tunisia the availability of water to irrigate livestock was also disrupted as it was purchased from distant locations. Male farmers responded by traveling to multiple locations within and beyond their communities in search of better prices, which some farmers secured at bigger shops in Egypt. Female farmers in Egypt responded to feed shortages by relying on corn feed, which is more readily available. In Tunisia, male and female farmers responded to feed shortages by allowing livestock to graze farther on rangelands and for extended periods. Chicken sales plummeted during the pandemic in both countries due to suppressed markets. Female farmers responded to drops in chicken sales by diverting more chicken supplies for domestic consumption.

### Crops

Crops supplies and sales were less poorly affected during the pandemic than livestock. In Tunisia, farmers reported labor shortages due to the reduced mobility of laborers induced by suspensions of public transport and to the challenges of maintaining physical distancing requirements on farms. Procuring labor for lower-paid tasks such as weeding that woman usually perform was identified as particularly challenging during the pandemic. It led (alongside reduced access to herbicides because of market closures) to increased workloads for the women that made it to work. Some farmers were unable to plant vegetables due to labor shortages.

Male farmers reported disruptions in the sale of fava beans in Tunisia and peanuts in Behera in Egypt due to market inaccessibility. They are storing the crops until markets recover and prices improve, so depending on the pandemic duration, it remains to be seen if this is an astute coping strategy. In Tunisia, women reported a drop in usually

lucrative sales in local markets of harissa (red pepper paste) and aromatic oils. Selling from home for lower prices was identified as a temporary coping strategy.

### Digital Extension Services

Most of the women respondents owned cell phones. However, in previous studies our findings revealed that fewer women (50%) surveyed than men (83%) own cellphones. For this study we have selected women who owned phone as much as possible (100% in Egypt and 84% in Tunisia). In Tunisia, fewer women respondents owned cellphones. In Egypt, female graduates who had independently received plots of land from the government for farming were more likely to own cellphones than any other category of female farmers. In Tunisia, the ability to conduct phone interviews with female farmers was curtailed by women's lower cellphone ownership rates. Some female farmers were reached, albeit only through their husbands' consent and cellphones.

Male and female farmers in both countries identified radio (22% of women and 11% of men in Egypt and 7% of both men and women in Tunisia) and television (33% of women and 26% of men in Egypt and 20% of women and 15% of men in Tunisia) as other preferred modes for receiving agricultural information.

### Personal Wellbeing

In Tunisia, women reported increased workloads as a result of needing to "disinfect everything that entered the home." Male farmers emphasized increased expenditure due to the purchase of cleaning products and increases in feed prices. In both countries, women (sometimes from the same households as men) more often than men reported increased domestic tensions due to male job losses, a decrease in sales, or increases in household expenses (4% of men vs 10% of women in Tunisia and 66% of women vs. 59% of men). This finding confirms that perceptions and experiences of intrahousehold dynamics and tensions can differ markedly based on gender.

### Conclusion and way forward

Because women perform most of the labor of livestock rearing and retain control over sales of milk and meat in local markets, fluctuations in prices and supplies of these commodities affect them more than men.

Given women's significantly lower rates of cellphone ownership in both countries, digital interventions deployed during the pandemic, and indeed at any time, run the risk of excluding women if the exclusive focus remains on cellphones, so digital interventions should be diversified to include radio and television. Alternatively, improving women's access and control over these technologies through distribution of phone is recommended.

Figuring out ways to improve market access while complying with public health guidelines is also essential given the losses female farmers have incurred due to COVID-19-induced market closures. Although our survey and phone interviews did not provide any evidence of increased domestic violence during the pandemic, additional qualitative research may yield different results.

Regulating access to consistent and affordable supplies of feedstock and other agricultural inputs is an essential first step to resilience building. This is particularly important given the resurgence of COVID-19 in the MENA region (and the possibility of future lockdowns and market closures).

The study uncovers the often undervalued and hidden contribution that women make to rural dryland farming practices. It suggests that building women's resilience to the impact of COVID-19 and even afterward, through better transport, consistent and affordable supplies of feedstock and other agricultural inputs, digital access, and on domestic issues, is a good place to start for strengthening the resilience of households and whole communities. Given the global resurgence of COVID-19 and its expected long-term effects, now, more than ever, we should not overlook what women are already offering.