

How can geodata, crowdsourcing and artificial intelligence contribute to post-Covid resilience of food systems and communities?

Rapid country and sector assessments - Ethiopia
08-10-2020, Judith Jacobs, WCDI



1) Rapid Country assessment –why?

- To avoid a food, nutritional and socio-economic crisis in the aftermath of the current COVID-19 crisis, **urgent action** is needed to address key challenges in food systems
- Rapid country assessment was set out **to synthesise available secondary data in relation to the impact of the COVID-19 crisis and prioritise short-term challenges and actions required in Ethiopia**
- Multiple countries: Bangladesh, Kenya, Mali and Ethiopia
- For methodology and partners: see page 13

Elements country assessment: Ethiopia

- The key impacts of the COVID-19 crisis on the food system
- The effects of the lockdown measures on the most vulnerable groups
- Gaps identified in the data analysed and in government responses to the crisis
- And actions required to address short-term priorities and challenges

Some Key findings (1)

- The agricultural sector is pivotal to Ethiopia's economy, generating about 73% of employment, and absorbing large amounts of informal labour.
- GDP contributions from the agriculture sector dropped by 5.2% in the first 7 weeks of the COVID-19 outbreak in Ethiopia (March – May 2020)
- The national agricultural COVID-19 response strategy prioritises crop production with a strong focus on cereals and cash crops. Crops are mainly selected for their ease and reliability of production, their export value, or import substitution value. High-nutritional crops are not specifically prioritised

Some key findings (2)

- **Casual labourers** are often resource poor farmers (mostly young males) or students who depend on casual work to support their families for some months of the year. Due to mobility restrictions, casual labourers are not able to travel to places where there is work. The government does not have a robust social safety net for these groups
- Ultra-poor acutely malnourished women and children are the groups that most urgently need food support
- Some reports mention that – informally - funds are being raised by local communities (including local authorities) to support severely affected household
- Availability of food is not an issue (yet), affordability is..

2) Specific sector rapid assessments: seed, fertilizer and sesame sectors

- Sector Alerts identify current challenges and outline urgent action needed in the Ethiopian sesame/seed/fertilizer sector, based on surveys and focus group discussions with various stakeholders.
- Alert areas
 - The impact
 - Actions required
 - What stakeholders are involved
 - Who initiates action/who drives action
- Rapid assessments – 1-3 months interval
- For methodology and partners: see page 9

COVID-19 CRISIS

Sesame Alert

#02 August 2020

Sesame Alerts identify current challenges and outline urgent action needed in the Ethiopian sesame sector, based on surveys and focus group discussions with various stakeholders

Ethiopia

Photo: Hagos Tadesse

Alert 1

Health and safety of labourers are of major concern

Alert 2

Small businesses are at risk of collapse

Alert 3

A financial action plan is needed for timely provision of credit

Alert 4

Resource-poor farmers are facing particularly severe challenges

Alert 1

What is the impact?

The health and safety of labourers are of major concern

- Stakeholders emphasize that the main challenges of the COVID-19 crisis relate to health and safety, and transportation costs
- Transport service providers are allowed to carry only half their capacity; consequently, travellers are expected to pay a higher price
- 95% of survey respondents highlighted the fact that the spike in transportation costs has had an extremely negative effect on labourers, who are sometimes required to pay three or four times the regular amount
- Almost 80% of respondents indicated that the social-distancing and health measures implemented by transport services are insufficient
- Hygiene products like masks, sanitizer and soap are either not available or not affordable for labourers who face the rising costs of living and lower income levels
- Investor farmers are transporting labourers in tractors with sometimes more than 30 people together on a single tractor
- Because of high transport costs and security issues labourers are forced to travel in groups, making social distancing impossible and increasing the risk of spreading COVID-19
- Major concerns about health and safety combined with high transportation costs, heavy rainfall and political instability have forced labourers to return home, which has led to labour shortages in several areas; for example, a shortage of labourers for weeding (sesame and sorghum)
- The sesame sector at large is responsible for preventing the spread of the virus and ensuring that labourers receive at least a minimum net income


What actions are required?

- Ensure transport services implement the necessary health measures, adhere to the maximum number of passengers allowed, and make sure face masks are worn
- Encourage investor farmers to arrange safe travel to and from the farm site, monitor the implementation of the investment agreement that obliges investors to provide services to labourers, and provide them with financial support to help cover the additional costs incurred
- Provide hygiene materials and personal protective equipment (PPE), such as
- Reduce unnecessary travel by allowing labourers to stay at investor farms until harvest time wherever possible
- Invest in communication to inform permanent labourers through mass media (radio, TV, megaphones, brochures, etc.) about how the virus is spread and create awareness on the importance of using protective materials
- Ensure that the health of labourers is continuously monitored to reduce the risk of an outbreak of cholera or malaria, particularly in rural areas

What stakeholders are involved?

- Investor farmers and farmers' associations
- Public Health Bureaus (at federal and regional levels)
- Roads and Transport Offices
- Trade and Market Development Bureau
- Regional, zonal, woreda and kebele command posts
- Industry and Investment Bureau
- Labour and Social Affairs Office
- Mass media agencies

Who takes initiative, who drives action?



- Health, Road and Transport, and Labour and Social Affairs Offices to take the initiative; command posts to drive the action, alongside other stakeholders

Key alert areas

- **Seasonal labourers:** health, safety and transportation
- **Street vendors and small retailers** (particularly youth and women)
- A **financial action plan** is needed for the timely provision of credit
- A huge supply of **sorghum** is expected; nearly half of the cultivated area of the lowland woredas is planted with sorghum, for which marketing could become a problem if excessive production leads to a fall in market prices
- Many farmers did not move from higher altitude zones to rent land in the lowlands this year due to fears about COVID-19 and are therefore not producing food or earning an income

Outcomes/impact

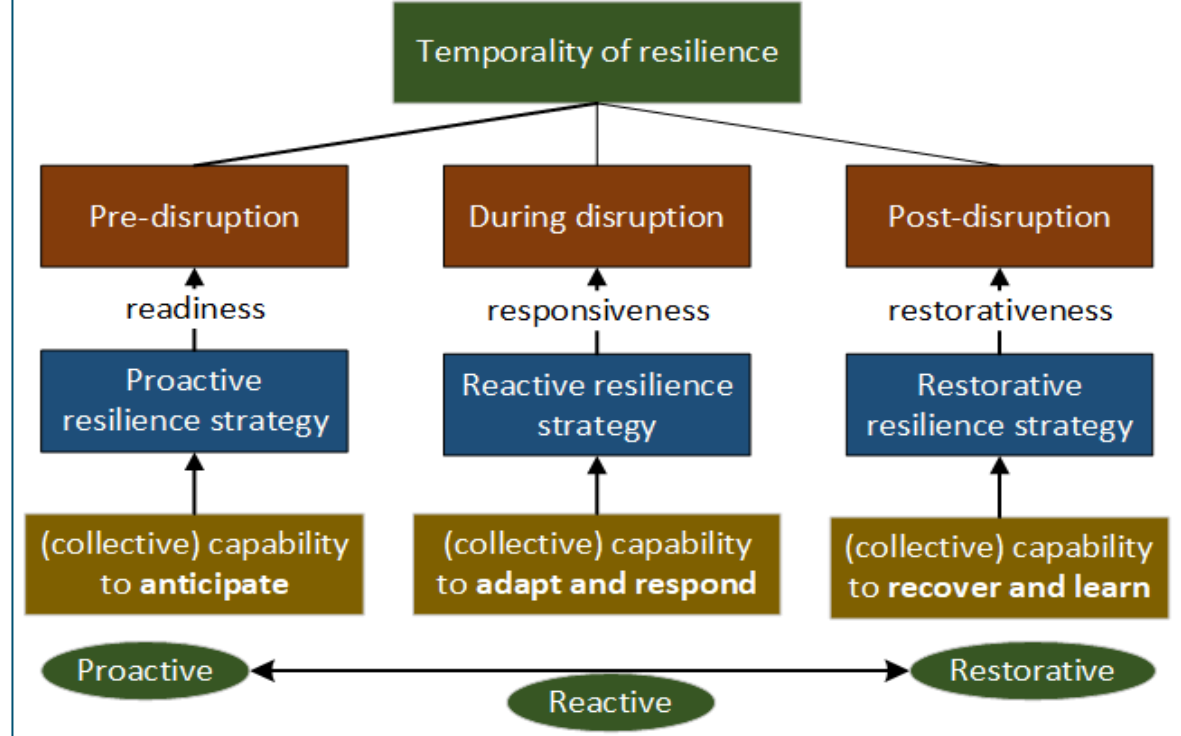
- Discussion on regional television with high level decision makers
- Actions were taken up by stakeholders
 - The cultivated area was closely monitored and an overview of planted crops was developed
 - The situation of labourers was taken more seriously by the labour office, especially to raise COVID awareness and mobilize them to work in the sesame area
 - Social affairs office took over (certain) actions in their quarterly planning

As for the purpose of this CoP

- Relevance of monitoring the impacts of Covid-19 on food security and political stability via satellite data, crowd-sourcing and artificial intelligence.
- My (humble) thoughts on this (1):
 - Do not isolate COVID19 as main shock – reality is that COVID19 is becoming new normal and other shocks/stresses like political instability might have a more/additional disruptive effect, e.g. locusts, political instability
 - Think of ownership/local partner from the beginning: who needs your monitoring efforts? Who will take it up/ensure sustainability, e.g. ministry of agriculture

My (humble) thoughts on this (2):

- Couple monitoring to actions –there is already a lot happening in local context. How can you inform or accelerate these actions or measures, e.g. command posts
- In terms of how these initiatives/monitoring can contribute to resilience to shocks in food systems....



During disruption:

- Support **collective** capability to adapt and respond
 - Accurate information
 - Support collective action
 - At different levels (large system resilience, collective resilience, individual/group resilience)
- Also/more interesting: during pre-disruption? Post-disruption?

WCDI Rapid Assessments page



The effects of COVID-19 on food systems: rapid assessments

Agricultural sectors are facing critical challenges. Without fast and informed action, the COVID-19 crisis risks becoming a food crisis. Wageningen University & Research (WUR) and partners are collaborating to identify priority steps for enhancing food systems' resilience in low and middle income countries.

Country and Sector Assessments

We've developed dashboards on a country and sector level. These dashboards show you the latest insights in priority steps for action. Our research is based on [methodology](#) and steps for rapid assessments. Find more detailed information on our country and sector assessments by clicking on the tiles below.



Questions about our rapid assessments?
Ask our expert:
ir. WJ (Joost) Guijt

[Contact form](#)



Motor squad delivers seed to farmers who cannot travel to agri-input shops in Nigeria.

Thanks

Judith Jacobs

Judith.Jacobs@wur.nl

