COVID19 Impacts on smallholders literature

Chrisendo et al. (2020)

Point of analysis

- Association between oil palm cultivation and nutrition in smallholder farm households.
- also considering changes in income and gender roles
- First hypothesis: Oil palm cultivation is positively associated with household nutrition and dietary quality

Data

Two rounds of C07 household farmer survey

Method

- Descriptives for comparing different groups of households
- run regression models
- random effects panel models
- SUR estimator
- logit estimator

Conclusion

Josephson, Kilic, and Michler (2021)

Point of analysis

Document the socioeconomic impacts of the pandemic among households, adults and children in low-income countries.

Data

Longitudinal data from high-frequency phone surveys conducted in Ethiopia, Malawi, Nigeria and Uganda with support from the World Bank. These are based on the LSMS-ISA surveys that were conducted in each of these countries. n = 10,855 households across four countries. Issues: selection bias and non-response bias

Method

Conclusion

- An estimated 77% of the population live in households which has lost income since the start of the pandemic
- \bullet there is inability to access medicine and staple foods for an estimated 30% of households who would need these items

Kumar et al. (2021)

Point of analysis

Identify, describe and analyze the different factors affecting Indian farming systems, and more broadly the agricultural sector, following the COVID-19 lockdown which started in March, 2020.

Data

- "Semi-empirical" research
- · case study UP
- farmer survey:
 - 570 farmers spread across 57 districts in UP from March-May 2020
 - asked about farm operations and whether and how investment and profitability were affected

Method

mixed methods

Conclusion

Due to the pandemic, many laborers from the cities migrated back home to their villages. There they compete for local jobs. Rural markets have ben wholly or partially closed to to lockdown. There was a government's relief package, though inadequate and not fulfilling the farmers' requirements. People below the povert line are supposed to not easily recover from the crisis. In 2020, wages in both agricultural and non-agricultural sector decreased, in fact stronger regarding the non-agricultural sector. Maybe this is due to the relief packages.

Adewopo et al. (2021)

Point of analysis

Assess the magnitude of price change over eleven weeks during and after the first COVID-related lockdown (2020), relative to the preceding year (2019).

Data

Study area: northern Nigeria, where a pilot project to crowdsource food price data in Africa was led by the European Commission's Joint Research Centre

- 23,961 spatially distributed datapoints, contributed by 236 active volunteers, on the price of four commodities (local rice, Thailand rice, white maize and yellow maize)
- combined with spatial richness index grid derived from UN-FAO
 - data and information shortage between March and April 2020

Findings

Results show that the retail price of maize (yellow and white) and rice (local and Thai rice) increased on average by respectively 26% and 44% during this COVID-related period, compared to prices reported in the same period in 2019. GPS-tracked data showed that mobility and market access of active volunteers were reduced, travel-distance to market being 54% less in 2020 compared to 2019, and illustrates potential limitations on consumers who often seek lower pricing by accessing broader markets

Method

In brief, the method consists of a series of steps implemented in algorithms (developed in R software) to assess spatial-temporal markets (clusters) of daily commodity prices, filter out spurious data points, and confine price values to reasonable attribute ranges.

Conclusion

Béné (2020)

Point of analysis

Explore and discuss the concept of local food system resilience in light of the disruptions brought to those systems by the 2020 COVID-19 pandemic.

Data

Findings

The review of existing (mainly grey or media-based) accounts on COVID- 19 suggests that, with the exception of those who lost members of their family to the virus, as per June 2020 the main impact of the pandemic derives mainly from the lockdown and mobility restrictions imposed by national/local governments, and the consequence that the subsequent loss of income and purchasing power has on people's food security, in particular the poor.

Method

Conclusion

Reference list

- Adewopo, Julius B., Gloria Solano-Hermosilla, Liesbeth Colen, and Fabio Micale. 2021. "Using crowd-sourced data for real-time monitoring of food prices during the COVID-19 pandemic: Insights from a pilot project in northern Nigeria." Global Food Security 29: 100523. https://doi.org/10.1016/j.gfs.2021.100523.
- Béné, Christophe. 2020. "Resilience of local food systems and links to food security A review of some important concepts in the context of COVID-19 and other shocks." Food Security 12 (4): 805–22. https://doi.org/10.1007/s12571-020-01076-1.
- Chrisendo, Daniel, Vijesh V. Krishna, Hermanto Siregar, and Matin Qaim. 2020. "Land-use change, nutrition, and gender roles in Indonesian farm households." Forest Policy and Economics 118 (July): 102245. https://doi.org/10.1016/j.forpol.2020.102245.
- Josephson, Anna, Talip Kilic, and Jeffrey D. Michler. 2021. "Socioeconomic impacts of COVID-19 in low-income countries." *Nature Human Behaviour* 5 (5): 557–65. https://doi.org/10.1038/s41562-021-01096-7
- Kumar, Pavan, S. S. Singh, A. K. Pandey, Ram Kumar Singh, Prashant Kumar Srivastava, Manoj Kumar, Shantanu Kumar Dubey, et al. 2021. "Multi-level impacts of the COVID-19 lockdown on agricultural systems in India: The case of Uttar Pradesh." *Agricultural Systems* 187 (December 2020): 103027. https://doi.org/10.1016/j.agsy.2020.103027.