



Does Women's Time on the Farm Affect Children's Nutritional Status? Evidence from Tanzania

*Phyllis Mumia Machio*¹

January 2021 / No.CRAf005

Context

Time allocation between reproductive and productive work in agriculture has implications for nutrition (Stevano et al., 2019). Women, especially of reproductive age, are always confronted with the inescapable reality of dual responsibility of nurturing and caring for their children and engaging in productive activities (Leslie, 1988; Rao et al., 2019). While both men and women face multiple roles and responsibilities, men's roles are performed sequentially while those of women are performed simultaneously, and this forces women

1 Lecturer, School of Economics, University of Nairobi

to make difficult tradeoffs (Blackden and Wodon, 2006). Rural women in developing countries are especially more disadvantaged. The tasks they engage in mostly add up to 16 hours a day (World Bank, 2008).

The problem

Spending many hours on the farm reduces the time for engaging in domestic nutrition-improving chores. Women may have less time to breastfeed the children, to purchase and prepare nutritious and healthy meals, to prepare food in hygienic environments, to boil water, to frequently clean children and their playing environments and to acquire water from the safest water source (Komatsu et al., 2018; Rao et al., 2019; Ruel et al., 2018). Malnutrition, especially stunting and underweight, is more prevalent in rural areas (Smith et al., 2004). Does women's time on the farm affect children's nutritional status?

Research results

The study from which this policy brief is based on used regression analysis to analyze data from the first 3 waves of the Tanzania National Panel Survey (NPS 2008/9; NPS 2010/11; NPS 2012/13). The main findings are presented here below:

Prevalence of malnutrition

- Data from the Tanzania National Panel Survey (NPS) (waves 1-3) indicated that prevalence of stunting declined only marginally from 41% in 2008/9 to 40% in 2012/13.
- Prevalence of underweight also declined from 19% to 12% during the same respective years.
- Malnutrition is more prevalent in rural areas.

Women's time allocation affects children's nutritional status

- Women's time allocation is an important determinant of nutritional status of children.
- The longer the time women worked on the farm, the higher the chance of children being stunted and underweight.

Income is an important determinant of children's nutritional status

- Income as proxied by wealth index reduces the likelihood of children being malnourished.
- Children from households with high income are less likely to be stunted and to be underweight.

Female education is significantly associated with reduction in child malnutrition

Implications for policy makers

- To promote child nutrition, it is essential to ensure women, especially those in the rural areas, do not spend too much time on the farm.
- Labour-saving technologies can reduce the time and effort required to undertake some activities (FAO, 2019).
- Partnerships involving making available labour-saving machinery such as tractors, shellers, and harvesters which women can hire at subsidized prices can go a long way in helping them reduce the hours they work on the farm.
- Women working together in work groups can reduce time per day that women work on the farm.

References

- Blackden, C. M. and Wodon, Q. (eds). 2006. *Gender, time use, and poverty in Sub-Saharan Africa*. Washington DC: World Bank.
- Komatsu, H., Malapit, H. J. L. and Theis, S. 2018. "Does women's time in domestic work and agriculture affect women's and children's dietary diversity? Evidence from Bangladesh, Nepal, Cambodia, Ghana, and Mozambique". *Food Policy*, 79: 256–270.
- Leslie, J. 1988. "Women's work and child nutrition in the Third World". *World Development*, 16(11): 1341–1362.
- Rao, N., Gazdar, H., Chanchani, D. and Ibrahim, M. 2019. "Women's agricultural work and nutrition in South Asia: From pathways to a cross-disciplinary, grounded analytical framework". *Food Policy*, 82: 50–62.
- Ruel, M. T., Quisumbing, A. R. and Balagamwala, M. 2018. "Nutrition-sensitive agriculture: What have we learned so far? *Global Food Security*, 17: 128–153.

- Smith, L. C., Ruel, M. T. and Ndiaya, A. 2004. Why is child malnutrition lower in urban than rural areas? Evidence from 36 developing countries. [FNCD Discussion Paper]. IFPRI. <https://www.ifpri.org/publication/why-child-malnutrition-lower-urban-rural-areas-0>.
- Stevano, S., Kadiyala, S., Johnston, D., Malapit, H., Hull, E. and Kalamatianou, S. 2019. "Time-use analytics: An improved way of understanding gendered agriculture-nutrition pathways". *Feminist Economics*, 25(3): 1–22.
- World Bank. 2008. *Gender in agriculture sourcebook* (No. 46162: 1-792). Washinton DC: World Bank.



Mission

To strengthen local capacity for conducting independent, rigorous inquiry into the problems facing the management of economies in sub-Saharan Africa.

The mission rests on two basic premises: that development is more likely to occur where there is sustained sound management of the economy, and that such management is more likely to happen where there is an active, well-informed group of locally based professional economists to conduct policy-relevant research.

www.aercafrica.org

Learn More



www.facebook.com/aercafrica



www.instagram.com/aercafrica_official/



twitter.com/aercafrica



www.linkedin.com/school/aercafrica/

Contact Us

African Economic Research Consortium
Consortium pour la Recherche Economique en Afrique
Middle East Bank Towers,
3rd Floor, Jakaya Kikwete Road
Nairobi 00200, Kenya
Tel: +254 (0) 20 273 4150
communications@ercafrica.org