# Do safety net transfers improve household diets and reduce undernutrition? Evidence from rural Ethiopia

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#### Key messages

- The Productive Safety Net Program is not found to have any impact on dietary diversity or child nutrition, however, it does help reduce household food insecurity.
- A nutrition-sensitive social protection program should be implemented.
- To improve child nutrition, social benefits can be made conditional on parents' participation in nutrition education programs.

### Food insecurity and malnutrition remain key issues for Ethiopia

An estimated 31.6 million people in Ethiopia are undernourished indicating a serious food shortage problem in the country, according to a 2015 UN Food and Agriculture Organization report.

Ethiopia's food production is extremely vulnerable to adverse weather conditions as the economy is dependent upon rain-fed agriculture. With about 80% of the country's population residing in rural areas and depending on agriculture for their livelihoods, recurrent drought has hit the country hard, with food security and agricultural production severely affected. Consequently, Ethiopia relies on food aid to bridge the food gap.

This lack of food security is linked to another serious problem the country faces: child malnutrition. According to a recent Ethiopian Demographic and Household Survey report, 40% of children under the age of five were stunted, 19% were wasted, and 25% were underweight in 2014.

To address the food gap and child malnutrition problems, policies that aim to improve household food security in the country are essential. Accordingly, since 2002 the Ethiopian government has put in place several economic reform programs aiming to improve the economy and eradicate rural poverty.

In 2005, the Ethiopian government and a consortium of donors introduced a large-scale social safety net program called the Food Security Program (FSP). The cornerstone of the FSP is the Productive Safety Net Program (PSNP), which aims to provide a long-term solution to the country's chronically food insecure households by offering multi-annual transfers of cash, food, or a combination of both to break the cycle of food aid.

The PSNP provides direct income to chronically food insecure households, primarily through participation in public works such a rehabilitating land and water resources, rural road construction and/or maintenance, and building schools and clinics. Unconditional direct support is also provided to households who are unable to participate in public works. There are over 7.7 million PSNP beneficiaries.

Cash transfer programs reduce household budget constraints, helping to increase the quantity, quality and diversity of the food they consume. Better access to food and dietary diversity could improve the nutritional status of resource-poor rural households and children.

This study examines whether the PSNP has had any impact on household dietary diversity and child nutrition among participating households.

## Data and methodology

This study uses data from the Ethiopian Socioeconomic Survey (ESS) – a panel household survey conducted every two years – for the years 2012 and 2014. Focusing only on rural households, this study uses a sample of almost 3,800 households for each of the observed years. The survey covers a wide range of topics, including household-level information on basic demographics, education, health, labor and time use, food consumption patterns and expenditure, household nonfarm income, food security and shocks, safety nets, irrigation, crop harvest and utilization, and livestock holdings.

To estimate the effect of the program on household dietary diversity the study uses the change in the amount of PSNP transfers in each *kebele* (Ethiopia's smallest administrative unit) between 2012 and 2014 as an instrument for the change in amount received by each household. The robustness of the results is examined using a propensity score matching approach with a continuous treatment.

To examine the effect of PSNP participation on children's long-term nutrition, the study uses information on children aged between 6 and 24 months in 2012 as a baseline, compared to children in the same age range in 2014 (who were not born during the 2012 round of the survey). Children in the same age range from non-beneficiary households act as the control group.

# **Key findings**

The analysis indicates that the increase in money received by households from PSNP transfers between 2012 and 2014 had no effect on household dietary diversity. Furthermore, participation in the PSNP was found to have no effect on child nutrition measured by height-forage or the probability of being stunted.

The results of the study show that there is a 13.4% increase in average daily calorie consumption per person in PSNP-beneficiary households between 2012 and 2014, indicating that the program does help to reduce household food insecurity.

While no significant effect is observed on household dietary diversity, households with female heads are more likely to have more varied diets than male-headed households. Similarly, there was a significant drop in the rate of child malnutrition and wasting among PSNP-participating households with female heads. These findings suggest that women could play an important role in improving the variety and quality of food consumed by households if empowered and given more resources, such as cash transfers.

In the sample, 42.8% of children under the age of five are found to be stunted and 26.3% are severely stunted, indicating that chronic malnutrition continues to be a critical issue in Ethiopia.

While the proportion of stunted children declined from 45.3% in 2012 to 42.8% in 2014, the likelihood of children being stunted was found to be greater in PSNP-beneficiary households (43%) than in non-PSNP households (41.7%).

The lack of effect observed in this study may be associated with the limited time of exposure to the PSNP. Furthermore, taking into consideration the fact that there were significant droughts between the two rounds of the survey, the lack of an effect could mean that the PSNP prevented further deterioration of child nutrition.



Ethiopian agriculture

## Implications for policy

The results of this study provide no evidence that Ethiopia's Productive Safety Net Program has had an impact on household dietary diversity or child nutrition among participating households. However, having access to the PSNP was shown to have a positive impact on household daily food consumption.

Based on these findings, more effort is required to **design a social protection program that is nutrition-sensitive**. **Pairing cash transfers with nutrition education interventions** that promote awareness of the importance of dietary diversity and the nutritional needs of children would increase the positive effects of the PSNP.

To specifically target improving the nutrition of children living in households participating in social protection programs, **cash transfers can be made conditional.** Participation in dietary diversity education programs, nutrition education programs, and attendance at precautionary healthcare services are examples of actions that could be required for potential beneficiaries to receive cash transfers. Additionally, better monitoring of child nutrition indicators in the program evaluation systems is necessary to be able to track the impact of the PSNP.



Productive Safety Net Program (PSNP) public works

Picture: Irish Aid

This policy brief is based on the PEP-Structural Transformation of African Agriculture and Rural Spaces 'STAARS' Project-06, carried out with financial support from the Government of Canada through the International Development Research Centre (IDRC). Other partners of the STAARS consortium include the African Development Bank (AfDB), the African Economic Research Consortium (AERC), the CGIAR Research Program on Policies, Institutions and Markets (PIM), Cornell University and the World Bank.

**PEP receives core funding from the Department for International Development (DFID) of the United Kingdom (or UK Aid) and the IDRC.** 

The views and opinions expressed in this publication are those of the authors and do not necessarily reflect those of PEP.