Strengthening Institutional Systems for Scaling up OFSP for Improved Nutrition and Food Security in Tigray and SNNPR, Ethiopia

From July 2017 to June 2018, a total of 8.45 million orange-fleshed sweetpotato (OFSP) cuttings (1,317,500 in Tigray and 7,131,220 in Southern Nations Nationalities and People Region (SNNPR)) were distributed. These directly reached 19,758 households (HHs); 5,348 HHs in Tigray and 14,410 HHs in SNNPR. In addition, continuous advocacy efforts by the International Potato Center (CIP) and partners in Ethiopia, led to the recently launched National Nutrition-Sensitive Agriculture (NSA) strategy of the Ministry of Agriculture and Natural Resources (MoANR) that recognizes OFSP as one of the bio-fortified crops for addressing malnutrition in Ethiopia.

Key Partners:
- Bureau of Agriculture and Rural Development (BoARD) Tigray
- Bureau of Agriculture and Rural Development (BoARD) SNNPR
- Bureau of Health (BoA) Tigray,
- Southern Agricultural Research Institute (SARI)
- Tigray Agricultural Research Institute (TARI)
- Women Association of Tigray
- Egna Leegna
- Hawassa University
- Mekelle University

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**What is the problem?**
Micronutrient deficiencies are quite prevalent in Ethiopia. Most households depend on a few staple foods and the dietary intake of animal source foods, fruits, and vegetables and other vitamin A-rich foods is lower than the amounts needed to meet daily nutrition requirements, resulting in deficiencies of key nutrients such as vitamin A, zinc, and iron. High prevalence of vitamin A deficiency (VAD) is of particular concern among pregnant and lactating women, and children under five years. According to the Ethiopian National Food consumption survey conducted in 2011, the prevalence of VAD at the national level was 82%. To address this problem, there is need for effective integration of more nutritious crops into local farming and marketing systems, so that key nutrients will become available to vulnerable populations in an affordable and sustainable manner. One of the recommendations of the ‘Cost of Hunger in Ethiopia’ report is that there is ‘need to promote biofortified crops such OFSP, beans and maize through the Ministry of Agriculture and other existing mechanisms to allow subsistence farming rural households to access micronutrients through their own production’. Furthermore, the National Nutrition programmer (NNP) and the Nutrition-Sensitive Agriculture Strategic Plan of the Ministry of Agriculture and Natural Resources (MoANR) commit to promoting production of biofortified crops. This project is primarily aimed at strengthening capacity of government institutions at national and regional levels to enhance institutionalization of OFSP for impact at scale leveraging on the achievements of the previous CIP-led, Irish Aid-funded projects - “Scaling out Sweetpotato and Potato-Led Interventions to Improve Nutrition and Food Security in Tigray and SNNPR Regions, Ethiopia”.

**What do we want to achieve?**
The overall goal of the project is to contribute to improved nutritional status and food security among vulnerable populations in SNNPR and Tigray regions of Ethiopia through the strengthening of agriculture and health systems and through institutional development. The project began in July 2017 and runs through March 2019. We seek to achieve four objectives:

1. Diagnosis of gaps in key institutions, system linkages and coordination, technical and institutional capacity and review of the OFSP evidence base to identify gaps and leverage points for system strengthening.
2. Technical capacity of the BoARD, Bureau of Health (BoH), Southern Agricultural Research Institute/Tigray Agricultural Research Institute (SARI)/TARI, agricultural, technical and vocational education training colleges (ATVETs), FTCs, and other stakeholders in the OFSP value chain strengthened to promote and implement sustainable OFSP technologies and services to smallholder farmers.

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**Fig. 1** Installed drip irrigation at Sodo Zuria Farmers Training Center (Credit F. Asfaw)
SDS. The SSP were integrated into the project workplan for Years 1 and 2 that was prepared jointly by project partners through regional stakeholder review and planning workshops conducted in each of the target regions.

- The project has increased the capacity of regional research institutes (SARI and TARI) to produce disease-free sweetpotato foundation seed.
- The project facilitated public private sector partnership in pre-basic/foundation OFSP and potato seed multiplication and production between Tigray Agricultural Research Centre's tissue culture lab and the Tigray Biotechnology Center.
- OFSP demonstration multiplication plots established at nine FTCs.
- Three ATEVET colleges in Tigray and one in SNNPR integrated CIP's OFSP Training of Trainers (TOT) materials into their training curriculum.
- Regular regional annual stakeholder sweetpotato seed demand and supply linkage forum, led by BoAs institutionalize in each target region.
- Trained 163 BoA staff in OFSP nutrition, agronomy and post-harvest management, processing and utilization, marketing and entrepreneurship.
- OFSP recipes integrated in cooking demonstrations of the regular regional BoH extension system, and conducted at 12 health centres in the two target regions. A total of 1,691 people (1,082 females, 398 males and 211 children) from project target areas were reached through cooking demonstrations at health posts led by trained health extension workers with technical backstopping from CIP, Egna Leegna, and the Women's Association of Tigray.
- Trained 19 BOH employees, two health college instructors and 140 Health Extension Workers (HEWs) on OFSP nutrition and utilization.
- Organized two field days and site exchange visits for members of woreda and regional platforms and stakeholders (Fig. 3).
- Conducted annual regional stakeholder project review and planning workshops in each region to review project progress and share lessons and experiences; and jointly plan activities for the second year of project implementation.
- Designed advocacy/communication tools, including project brief, evidence brief, policy brief, factsheet (one each), and three case studies. These were disseminated to stakeholders at different regional, national, and international fora.
- CIP and partners presented research papers and posters at different National and Regional Nutrition platform workshops aimed at sharing evidence and lessons and impacts of OFSP intervention from the Irish Aid-funded project.

**Where are we working?**

The project is being implemented in the SNNP and the Tigray regions. The project covers a total of 20 kebeles (villages) in 10 woredas (districts) in the two regions.

**How are we making it happen?**

The International Potato Center (CIP), in collaboration with implementing partners, is employing a four-pronged approach to achieve the project objectives:

i. Conduct diagnosis of key institutions, system linkages and coordination, technical and institutional capacity gaps and review of the OFSP evidence and leverage points for system strengthening.

ii. Strengthening the technical and institutional capacities of key institutions for integrating OFSP agronomy and nutrition into their training programs and implement and promote sustainable OFSP programs and deliver support services to smallholder farmers.

iii. Evidence “Learning by Doing” demonstration of best practices at Farmers Training Centers (FTCs) and health centers and lessons on using OFSP to improve food security and nutrition documented and disseminated at national, subnational and local levels.

iv. Promote evidence-based advocacy to influence policies and programming in support of OFSP as part of healthier diets.

**What have we achieved**

- System Diagnostic Study (SDS) to identify system gaps and leverage points for system strengthening was jointly designed and conducted by CIP, Mekelle University and the International Food Policy Research Institute (IFPRI). Moreover, stakeholders jointly developed regional System Strengthening Plans (SSP) based on the findings of the SDS. The SSP were integrated into the project workplan for Years 1 and 2 that was prepared jointly by project partners through regional stakeholder review and planning workshops conducted in each of the target regions.
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