Sweetpotato support platforms to build a community of practice

Three Sweetpotato Support Platforms (SSPs), located in Eastern, Southern, and West Africa are developing tools and strategies for sharing information and efficiencies to create a dynamic and cost-effective community of practice among researchers and development agents across multiple disciplines and countries. Through the Reaching Agents of Change (RAC) project, launched in June 2011, they also aim to raise the profile of vitamin A-rich sweetpotato through advocacy and build capacity among partners to effectively implement sweetpotato-based development efforts.

What is the problem?

Compared to its value relative to other food crops in Sub-Saharan Africa (SSA), there has been a major underinvestment in sweetpotato. In Eastern and Southern Africa particularly, a disproportionate share of agricultural budgets is devoted to maize research and dissemination and to non-food cash crops. Sweetpotato is typically viewed as a poor person’s food or a woman’s crop for home consumption only. It does not suffer from attention-grabbing catastrophic disease problems such as brown streak virus in cassava and is essentially left to do “more” with “less.”

Many policy makers, donors, professors, scientists, and even practitioners are unaware of the nutritional and agronomic benefits of sweetpotato or how to integrate it into their programs. Key bottlenecks to the full potential utilization of sweetpotato have been identified, but there is a dearth of researchers addressing those problems and development agents knowledgeable in good sweetpotato production and post-harvest management techniques.

What do we want to achieve?

We want to see a growing and vibrant community of practice, with sweetpotato researchers and development agents able to obtain and apply sweetpotato knowledge effectively. By developing tools, such as gender-sensitive protocols for data collection, and sharing information among stakeholders, we want to build synergy and avoid unnecessary duplication of effort.

More broadly, we want to increase breeding capacity to ensure the continuous production of high yielding, disease-resistant, nutritious varieties adapted to local agro-climatic conditions and consumer preferences. We also want increased access to those materials for any African country to use. We want to change the image of sweetpotato from being a crop of the poor to being a healthy food for all.

We want to reach the Sweetpotato for Profit and Health Initiative’s (SPHI) goal of enhancing the lives of 10 million households in 16 SSA countries by 2020 through the effective and diversified use of sweetpotato. The SSPs are integral to fulfilling that goal.

Where are we working?

To ensure access to germplasm and technical backstopping, SSPs have been established within each major sub-region of SSA. For East and Central Africa, the SSP is hosted at the National Crops Resources Research Institute (NaCRRI) in Uganda and the Kenyan Plant Health Inspection Service (KEPHIS). For Southern Africa, the SSP is based at the Agrarian Research Institute of Mozambique (IIAM) in Maputo. The West Africa
platform is located at the Crops Research Institute (CRI) in Kumasi, Ghana. RAC focuses its advocacy and training efforts in Tanzania, Mozambique, and Nigeria.

**How are we making it happen?**

Building the next generation of sweetpotato breeders is core to this effort. Working in close collaboration with the Alliance for a Green Revolution in Africa (AGRA), CIP breeders based at each SSP are backstopping national program breeders in 12 SSA countries and co-supervising PhD candidate breeders being trained in AGRA-sponsored programs in South Africa and Ghana. Annual sweetpotato speedbreeder meetings are held to learn the latest methods and share findings. Our goal is to have at least 6 new sweetpotato breeders in SSA by 2016 and all national programs using the CloneSelector Excel-based program to record and analyze their sweetpotato trial data based on a standard protocol.

At each SSP, capacity will exist to conduct virus testing and produce disease-free planting material and provide all national programs within SSA access to that material. Each SSP will have a quality laboratory, capable of quickly screening breeding material to determine its nutrient composition, including essential vitamins and minerals for human health.

Since June 2010, SSP meetings are being held every six months in each sub-region. These meetings are an opportunity to update stakeholders on any new knowledge and provides a forum for sharing new skills among community of practice (COP) members. Core to the COP effort was the establishment of the Sweetpotato Knowledge Portal (www.sweetpotatoknowledge.org) in November 2010—a website that enables users to contribute their own knowledge, references, and stories as well as learn from others. Standardized gender aware survey modules for conducting baseline surveys for interventions using sweetpotato as a key entry point have been developed and tested in SASHA delivery system studies.

The RAC project has enabled the expansion of SSP activities to include communication, advocacy, and training components. RAC focuses on the advocacy for the development and promotion of pro-vitamin A orange-fleshed sweetpotato (OFSP) and the training of development agents in effective dissemination methods. RAC is identifying and training a cadre of Africa advocates and establishing an annual training course on Everything You Ever Wanted to Know about Sweetpotato in Tanzania, Mozambique, and Nigeria.

**What have we achieved so far?**

The major accomplishments to date are:

1. SSP meetings are held twice a year, often linked to other professional meetings and increasingly focused on specialized topics. A major 2-day Seed Systems Consultation meeting was held in Nairobi, Kenya in June 2012 with 38 participants who work in 11 SSA countries and 3 non-SSA countries.
2. As of 1 July 2012, the Sweetpotato Knowledge Portal had 566 registered users and 2,339 content items. From July 2011 through June 2012, we had 15,177 visits.
3. SASHA sponsored a 4-hour work shop on Advances in Sweetpotato Research & Dissemination at the African Crop Science Meeting held in Maputo in October 2011.
4. Quality nutrition labs are functioning in Uganda, Mozambique, and Ghana.
5. There has been substantial rehabilitation of germplasm related facilities at the KEPHIS, Kenya (which serves all of SSA), including the introduction of bar-coding equipment for tissue culture management in 2011.
6. SSPs in each sub-region are serving as centers for germplasm clean-up, maintenance and exchange and are striving to meet international standards of operation.
7. One PhD breeder has graduated, and an additional 7 are in the pipeline.
8. Breeders were trained on the third version of CloneSelector in August 2012.
9. Advocacy strategies for OFSP have been developed for Nigeria, Tanzania, and Mozambique and an OFSP Advocacy Toolkit is available on the Knowledge Portal.
10. The first 10 day Everything You Ever Wanted to Know about Sweetpotato course was implemented in Mozambique in August 2012 by the Eduardo Mondlane University and CIP.

Led by CIP, the five year Sweetpotato Action for Security and Health in Africa (SASHA) project is designed to improve the food security and health of poor families in sub-Saharan Africa (SSA) by exploiting the untapped potential of sweetpotato.