

Keynote presentation

OP-2.6: R4D priority for yam improvement: summary of yam survey results

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The CGIAR Research Program on Roots, Tubers, and Bananas (RTB) is conducting a priority setting exercise to identify major constraints that are hindering the development of six major RTB crops (cassava, potato, yam, sweet potato, bananas and plantains). As part of that global exercise, a survey with yam sector stakeholders was conducted to identify major constraints for yam value chain improvement in West Africa. A total of 191 yam sector stakeholders including scientists, extension agents, farmers' organization leaders were interviewed using direct interviews and online. Participants were asked to rank options of improvement from 1 (worst) to 5 (best). Mean scores and standard deviations were then tabulated and ranked. The survey was followed with expert survey to identify key research options that can be used to address identified constraints within the RTB. An economic surplus model was later used to quantify potential benefits of each research option including number of people potentially taken out of poverty if those research options are funded and implemented. Survey results indicate that the 5 top suggested research options include (i) improving yam tuber self life (4.34/5), (ii) improving small scale processing (4.14/5), (iii) improving soil fertility (4.09/5), (iv) planting materials distribution (4.06/5) and (v) breeding for higher yields (4.04). For each broad category of research option the most suggested options are: Processing and value addition (improving shelf life, improving small scale processing and development of new yam based products); Breeding (for higher yields, for mechanization ready varieties, nutrient use efficiency, for resistance to yam mosaic, for drought tolerance, for early harvest); Access to planting materials (alternative for disease free—stocks, mass propagation techniques, Improving techniques for farmers based propagation); soil fertility and crop management (improving soil fertility and yam cropping systems; pest and diseases (management of yam tuber rot and yam mosaic) and socioeconomics (assessing adoption and impacts). The expert consultation in IITA and national programs in Nigeria, Ghana, Benin and Togo has yielded 8 priority research options and the associated parameters needed for the evaluation of the benefits. The research options also take into consideration what research in general and specifically RTB programs can deliver.