

TOWARDS INCLUSIVE AGRI-SKILLS DEVELOPMENT FOR SMALLHOLDERS IN UGANDA: THE CASE OF ABIM, LIRA AND SOROTI DISTRICTS

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Abstract

This paper argues that in order to render smallholders in Uganda competitive in agricultural markets, there are a number of dimensions to consider in empowering them with relevant skills. The focus on imparting only agronomic skills without regard for the skills necessary for healthy competition along the rest of the value-chain excludes smallholders from comprehensive skills development.

This study was conducted in three districts of Abim, Lira and Soroti and data was collected with aid of questionnaires and key informant interview guides. With the assistance of farmer-support organizations in the study areas, a representative sample of farmers from each district was identified and interviewed using a questionnaire. Of the sample, respondents included youth, women, persons with disabilities. The study targeted farmers involved in cassava, maize and millet value chains which are the major income earning crops in Karamoja, Lango and Teso regions.

The technical field staff of government agencies involved in providing capacity-building support to farmers were interviewed to ascertain the nature of training interventions extended to farmers. Respondents from these agencies included staff of National Agricultural Advisory Services (NAADS), Operation Wealth Creation (OWC) and Ministry of Agriculture, Animal Industry and Fisheries (MAAIF). The study also involved Uganda National Farmers Federation (UNFFE), a national network involved in empowering farmers as well as a sample of NGOs involved in training farmers in the study areas.

The study findings revealed that effectively empowering smallholders calls for inclusiveness in different dimensions ranging from content, delivery, gender to physical ability.

Key words: *Smallholder, agri-skills, inclusiveness*

Introduction

Since 2016, Advance Afrika has been a part of the Civic Engagement Alliance (CEA), a program focused on promoting civil society engagement in dialogue with policy makers to lobby for effective policies in Uganda. The program was anchored on 3 pathways: i) improving political space for CSOs; ii) realising inclusive and sustainable food systems; and iii) empowering small producers to access markets. Advance Afrika has been working towards improving access to markets for women, youth and disabled smallholders growing cassava, maize and millet through skills development.

Working with Edukans, one of the Dutch partners in the alliance, Advance Afrika as the local implementing partner, has targeted 3 areas of skills development as the foundation for empowering small-scale producers to access markets. First, to advocate improved smallholders' access to inclusive and quality skills extension services. Second, to champion the extended reach of opportunities for skills development extension services to women, youth and persons with disability. Third, to promote complementary skills development interventions through collaboration with actors. The overall goal of the intervention was to contribute to skills development for smallholders' in Abim, Lira and Soroti through promoting inclusive and quality agri-skills extension support.

Based on its experiences in Abim, Lira and Soroti, this paper draws lessons from practice on the role of inclusive skills development in empowering small farmers. The paper identifies the different dimensions that are seen to influence inclusive access to skills development opportunities for women, youth and persons with disabilities in the millet, cassava and maize value chains.

The paper focuses on the quality, relevance and access to skills development for women, youth and disabled smallholder farmers. This is premised on understanding how we can make agri-skills relevant to young smallholder farmers to be able to meet their needs as well as ways to improve accessibility to skill development opportunities. The study is also a contribution that informs future interventions in line with skills development of young people either from a policy perspective or implementation.

Situation of youth employment in Uganda

Uganda's real gross domestic product (GDP) in 2020 is projected to be between 0.4 and 1.7% compared to 5.6% in 2019. Agriculture is the single largest source of income for Uganda contributing 24% of the national GDP, and 52% of the total export earnings. While about 700,000 young people reach working age every year in Uganda, only 75,000 jobs are created each year. This leaves more than 65% of Ugandans employed in agriculture, mainly on a subsistence basis. In addition, the country has a majority and rising youth population in an emerging economy. The unemployment rate is high, and even higher for the youth with underemployment and employment in the informal sector (allowing for exploitation) being the major challenges. Uganda's national unemployment rate is 9.2%, while the unemployment rate for youth aged 18-30 is 13.3%. The state of youth participation in the agriculture sector in Uganda, is operating highly inefficiently, mostly owing to the effects of subsistence farming and engagement in the sector as a last resort or interim solution while other economic pursuits are aspired to. The result is a workforce engaged in agriculture that is lacking the vision, skills and awareness of opportunities for entrepreneurship within the sector and, therefore, does not unlock its employment or economic growth-generating potential. This implies, the employment potential of Uganda's agriculture and agri-food system remains largely untapped. Therefore, the need to develop skills to create more employment and income-generating opportunities, specifically for young people.

Inclusiveness

Inclusive agri-skills development is a perspective which to view transformations in the agriculture sector. This recognizes the critical role smallholder farmers in particular young people and other actors in the value chain such as the private sector play in contributing to poverty reduction. Inclusiveness from the concept of Inclusive growth refers to economic growth which results in a wider access to sustainable socioeconomic

opportunities for the majority of people while protecting the vulnerable, all being done in an environment of fairness, and equality (ADB, 2014). Inclusiveness is broad-based across sectors to promote productive employment and enhance the resilience of disadvantaged and marginalized groups from adverse shocks. Inclusive agri-skills development in this context reinforces the pillars of inclusive growth which aim to improve agricultural productivity; promote job creation, including improving skills for productivity and competitiveness; enhance wider equal access to basic social services, productive knowledge and access to business opportunities. According to FAO 2015, through inclusive agri-skills development, farmers and small enterprises are supported to establish a stronger negotiation position through skills development, collective bargaining and access to market information and financial services. In addition, the approach builds on the skills and expertise of existing market players, including traders and processors, and promotes value chain collaboration, transparency and risk sharing. Hence addressing systemic constraints in markets and changing how markets work for the poor.

The paper describes inclusive agri-skills in the dimensions of capacity development needs (Intellectual abilities), literacy levels, gender and social needs and geographical scope in relation to the training content, delivery and target groups for skills development.

Methodology

This paper is based on 3 sets of field work conducted in 2016, 2017 and 2018 in three districts of Abim, Lira and Soroti. With the assistance of farmer-support organizations in the study areas, smallholder farmers comprising women, youth and the disabled were identified. Researcher-administered structured questionnaires were developed, pre-tested and finalised to collect data from the individual smallholders.

The data was collected from each sub-county where the CEA interventions have been implemented and these included Lotukei, Morulem and Awach in Abim; Adekokwok, Agweng, Amac and Barr in Lira and Asuret and Kamuda in Soroti. In-depth interviews with key informants drawn from among the district and sub-county officials were conducted to obtain detailed information about training opportunities which target smallholder farmers.

A survey including women, youth and disabled persons who are involved in crop production in Abim, Lira and Soroti was conducted to collect information on capacity-building interventions and support. The farmers were selected randomly from lists provided by farmers' associations namely, Aridland Development Program in Abim and Facilitation for Peace and Development (FAPAD) in Lira and Pentecostal Assemblies of God (PAG) in Soroti. Deliberate effort was taken to cluster the youth, women and the disabled before the random selection to ensure that all categories are included among the respondents.

In addition, staff of different government agencies involved in providing farmer-support were also interviewed to ascertain the nature of support extended to farmers. Respondents including staff from National Agricultural Advisory Services (NAADS), Operation Wealth Creation (OWC) and Ministry of Agriculture, Animal Industry and Fisheries (MAAIF) headquarters in Entebbe were reached. The study also involved Uganda National Farmers Federation (UNFFE), a national network involved in farmer advocacy and support.

Focus Group Discussions were conducted with farmers' groups in the sub-counties during which issues affecting smallholder farmers access to skills empowerment were explored. Key informants including local leaders, elders, religious leaders, former NAADS coordinators, OWC coordinators, Northern Uganda Social Action Fund (NUSAF) coordinators were interviewed on farmer-support systems and access to markets, among other aspects. Government employees in the agriculture sector at the districts were interviewed and included Chief Administrative Officers (CAO), District Production Officers, District

Agricultural Officers, Parish Chiefs and Community Development Officers (CDO) based at the sub-counties.

The quantitative data that was collected using questionnaires was analysed using SPSS statistical software. Information gathered during the interviews and focus group discussions was triangulated and analysed by identifying common themes. In instances where discrepancies were identified in the data, clarifications were sought. Additional secondary data was obtained from available documentation.

Background to the Study Area

Uganda

Uganda is located in East Africa and lies across the equator. The country is landlocked, bordered by Kenya in the East; South Sudan in the North; Democratic Republic of Congo in the West; Tanzania in the South; and Rwanda in the South West.¹ The country is divided into 116 districts. The districts are further subdivided into 200 counties, 1,378 sub-counties and 6,495 parishes. The role of the local governments is to implement and monitor government programmes at the respective levels.² Agriculture has remained a dominant sector in the economy. The last census revealed that a total of 5.8 million households engage in agriculture. More than two thirds, 69% of households derived their livelihoods from subsistence farming as the main source of earning. In terms of employment, the majority of the working population, 65%, are subsistence farmers.³

Abim District

Formerly part of Kotido District, Abim District became functional on July 1, 2006 and comprises 5 sub-counties of Abim, Alerek, Lotuke, Morulem, Nyakwae and one town council, Abim Town Council. The district is located approximately 366 kilometres, by road, northeast of Kampala city.⁴ The national census in 2014 estimated the population of the district at 107,966 with 52,456 males and 55,510 females.⁵ The natives sustain their livelihoods through subsistence agriculture in which women are actively involved along with animal husbandry. In the semi-arid agro-ecological zone, farmers grow sorghum, maize, finger millet, peas, pumpkins, groundnuts and cucumber. However, in the wetter agro-ecological zone agriculture mainly focuses on beans, cassava, sweet potatoes, sunflower, sesame, upland rice and cotton.⁶

Lira District

Lira is located in the Lango sub-region of Northern Uganda.⁷ Lira District, which was formed in 1974 from the then Lango District, comprises two counties: Erute North and Erute South. What used to be Lira Municipality was elevated to a city status in July 2020.⁸ The 2014 National Population and Housing Census estimated the total population of the district at 408,043 with males numbering 196,663 while females

¹ Uganda Bureau of Statistics (2017), The National Population and Housing Census 2014 – Area Specific Profile Series. Uganda Bureau of Statistics

² Uganda Bureau of Statistics (2017), The National Population and Housing Census 2014 – Area Specific Profile Series. Uganda Bureau of Statistics

³ Uganda Bureau of Statistics (2017), The National Population and Housing Census 2014 – Area Specific Profile Series. Uganda Bureau of Statistics

⁴ Abim District Local Government (2020). <https://abim.go.ug/> Retrieved on September 16, 2020

⁵ GoU (2014) Karamoja: Abim District hazard, risk and vulnerability profile. UNDP

⁶ GoU (2014) Karamoja: Abim District hazard, risk and vulnerability profile. UNDP

⁷ GoU (2016) Lira District Hazard, Risk and Vulnerability Profile. GoU

⁸ Lira District (2020). www.lira.go.ug Retrieved on September 16, 2020

211,380.⁹ Agriculture is the main economic activity in the district with the majority households (81%) of the population surviving on subsistence farming. Agricultural produce largely comprises food crops including millet, simsim, cassava, groundnuts, beans, pigeon peas, cowpeas, sorghum, sweet potatoes.¹⁰ Whereas both men and women are involved in crop production, women contribute more actively during weeding, processing and storage just as women together with youth are central in animal rearing.¹¹

Soroti District

Soroti District has a population density of 151 persons per km², higher than the national average of 124 persons per km² and is among the most densely populated districts of the Teso sub-region. Much of this population (89%) is rural, of which 51% are women, characteristic of the agricultural nature of the district's economy.¹² The major crops grown in the district include millet, cassava, sorghum, citrus, groundnuts and rice. Some of the crop diseases reported are potato weevils, potato hornworm infestation, rabbis-crops (brown wilt), liver fluke caused by stagnant water in which snails breed, and black army worms affecting tomatoes in Arapai sub-county.¹³

Dimensions that frame inclusiveness of agri-skills development for smallholders

Content

Training curriculum

All district authorities acknowledge building the capacity of smallholders in areas including farming and business management. However, there was no indication from the authorities and even farmers that special attention was paid to aspects of enhancing market access of food products. Smallholders identify price fluctuations and lack of markets as the major post-harvest challenges they are facing, implying minimal or no attention to address market concerns through skills development. Smallholders view government programs as falling short of their expectations because a lot of farming necessities are not provided as had been anticipated. The provision of marketing skills also featured as a failure of government programs because many farmers were stuck with their produce due to lower prices and high costs of transport. Other farmers reported that they could not access market information and depended on middle men who exploited their ignorance. Indeed, marketing farm produce is a challenge to the majority of smallholders, mainly attributed to lack of market information. Value-addition was also reported as a challenge to most smallholders who resorted to selling their produce in raw and unprocessed forms hence attracting lower prices. Lower levels of value-addition were attributed to lack of technology and equipment, lack of knowledge on the importance and mechanisms of value-addition. Responses from the smallholders in all the three districts indicated that farmers need training in market information systems, post-harvest handling and value-addition. They also expressed interest in acquiring skills in appropriate technologies like rainwater harvesting, financial literacy and group dynamics, as well as capacity to address the challenge of fake seeds on the market. The studies found very limited value-addition on crops harvested with many of the farmers referring to traditional seasoning and drying practices as value-addition. Adding value to maize for most farmers involved sun drying and grinding just as it was for millet and cassava which were ground into flour. With respect to cassava, Kimenye and Bombom (2009) generally found lack of technical know-how on processing with traditional splitting/slicing and drying of cassava chips on bare ground, which compromises market standards, being practiced by most smallholder farmers. Thus, whereas training

⁹ Uganda Bureau of Statistics (2017), The National Population and Housing Census 2014 – Area Specific Profile Series. Uganda Bureau of Statistics

¹⁰ GoU (2016) Lira District Hazard, Risk and Vulnerability Profile. GoU

¹¹ GoU (2016) Lira District Hazard, Risk and Vulnerability Profile. GoU

¹² GoU (2014) Teso: Soroti District Hazard, Risk and Vulnerability Profile. UNDP

¹³ GoU (2014) Teso: Soroti District Hazard, Risk and Vulnerability Profile. UNDP

opportunities exist, the focus and content of the skills development does not fully embrace the breadth of the smallholders' training needs.

Relevance of content

Nearly all smallholders suffer crop losses to pests and diseases with cassava reported to be most affected by the cassava mosaic disease, in some cases leading to total losses to farmers. Thus, for many smallholders gaining access to skills in tackling crop diseases is an indispensable aspect of inclusive knowledge empowerment. With the re-emergence of cassava brown streak disease in Northern Uganda in 2005, Kumakech, *et al* (2013) found that the lack of knowledge on disease recognition and management contributed significantly to rapid spread of the disease in the region. While the government and NGOs were providing advice to farmers, especially under the NAADS program, CESVI (2013) found that smallholders' access to technical support and advice was still limited.

Learning needs

The farmers who benefitted from skills development reported improvements in planting practices, crop spacing, crop rotation and some gained a number of skills in animal and crop husbandry. However, not all farmers realized their expectations from training. Majority of farmers revealed that many of their expectations from the training were not met, especially marketing skills, quality maintenance and soil fertility maintenance. The skewed focus on the production stage of the value chain precludes smallholders from competently involving themselves in the rest of the value chain beyond production. USAID (2014) also found that within agriculture, training among donor-sponsored programs still tended to focus on production more than value-addition and on commodities that require little capital, land, and times such as horticulture, piggery, poultry, and beekeeping.

Delivery

Training techniques

The teaching methods employed by capacity-building institutions were found to be varied, dominated by field visits, discussions, lectures and role playing with drama employed in some cases. The teaching materials used by trainers were mainly posters, handouts and booklets. Discussions and field visits were believed to be the most effective methods because they enabled farmers to share experiences and observe agricultural practices in progress. Teaching resources used during farmer extension programs included flip charts, LCD projectors and in some cases, audio-visual aids. Lectures in classrooms were revealed to be least effective in ensuring learning processes especially among the illiterate farmers. Lectures were rated as the worst for most farmers. The lectures were considered to be boring and full of complex terminologies that peasant farmers could not comprehend. Experiences across Abim, Lira and Soroti show that considering smallholders' circumstances, the approach to delivering training has a bearing on how illiterate smallholders can be included in gainful skills development endeavours. Sustain for Life (2014) argues that the program design that can provide practical empowerment to achieve sustainable livelihoods depends greatly on the economic context and particular needs of marginalized groups. Based on experience with an integrated rural development project in Zimbabwe involved with implementing learning through experience in the extension system, Hagmann *et al.*, 1999 and 2002 concluded that, knowledge and understanding gained through the experimentation process strengthens farmers' confidence in their capacity and knowledge. This increases their ability to choose the best options and to develop and adapt solutions appropriate to their specific ecological, economic and socio-economic circumstances.

Language of instruction

The studies showed that smallholders gained knowledge in good agronomic practices covering crops such as beans, oranges, ground nuts, simsim, chilies, millet, maize and cassava. It was established that whereas most of the farmers were able to comprehend the content delivered, some smallholders could not make sense of the training. The training styles that government interventions of NAADS, NUSAF and OWC

employed mainly favour the educated farmers as much of the presentation involves written information on flip charts from where participants are expected to take notes for future reference. Facilitated participatory training, however, is done in local languages with illustrations on flip charts although in many areas, the illustrating posters were missing. For the technical aspects of training, experts like the agricultural and production officers are invited to facilitate the training and enhance the learning processes. According to UBOS, Karamoja sub-region, where Abim district is located, has the lowest literacy rate of 33.6% while Teso, where Soroti is located, has 71.7% and Lango, where Lira is located, has 85.7%. It is also evident that PWDs and women have lower literacy rates than the rest of the population which limits their participation in training involving written material. Across the 3 districts, a survey of education levels revealed that many farmers are illiterate and semi-illiterate and cannot therefore read and write. Majority of the farmers had attained primary school level ranging from Primary One to Primary Seven and generally have limited understanding and comprehension of modern agricultural techniques and technologies. The second large category had no education at all having missed primary education and this group could neither read nor write. Few farmers had studied up to Ordinary Level and only a handful had reached advanced levels of education. Most smallholders who did not understand the training content attributed it to lack of sufficient explanations and difficult terminologies used during training. Evidently, there is a case to be made for language of instruction as a strong consideration for the inclusiveness of skills development interventions for smallholders. Indeed, acceptance of a contextual learning approach is seen as essential to confront the constraints which exist among smallholders (Röling and Wagemakers 1998, Friis-Hansen, 2004a).

Training tools

Both NGO and government training providers use media, radio (ICTs) as a means to empower smallholders with knowledge through radio talk shows on an on-going basis. Although radio is one of the mass media prevalently accessed by the farming community, it is not always convenient for all actors. Women in particular are hindered by the shortage of time to listen to the radio owing to the different responsibilities they perform in and outside the household while for the youth, social activities are a constant distraction. PWDs, specifically those with hearing impairment, remain excluded when the learning material is only passed out through radio broadcast. On the other hand, mobile phones are a potential means of communication especially in groups, since they are increasingly being used in rural areas. However, most women, poor youth and PWDs still do not own personal cell phones.

Group approach

The skills development interventions of NGOs are more effectively delivered using a group approach since farmers can learn from and help each other. This implies that smallholders who do not join groups find it hard to access training opportunities. The studies found that in all the 3 districts, some farmers did not join groups while some groups registered but did not take off. In understanding why some smallholders did not belong to groups, the outstanding constraint was the membership fees that some farmers could not afford. For many small farmers, therefore, the challenge was not whether training opportunities existed or not but how individual smallholders could be empowered with relevant skills if they did not subscribe to a specific farmers' group.

Target beneficiaries

Needs of the target group

The support that public training providers provide to the youth, women and the disabled varies but generally includes distribution of farm seeds and other inputs like manure and fertilisers, domestic animals like cattle and piggery, training in farming activities and business management and providing food supplies to the elderly. Persons with disabilities, who constitute around 16% of the population according to the most recent National Household Survey, are virtually excluded from training opportunities in the public system. Adults have few avenues to upgrade or learn new skills. Persons living in Karamoja and the Northern regions have considerably fewer opportunities to acquire skills through training programs (Government of Uganda,

2011). With specific reference to youth roles in the agricultural value chain, USAID (2014) identified lack of specialized agricultural skills and limited understanding of market opportunities as key constraints for young people to engage in agriculture. These findings underscored the challenge to bring two needs - agricultural modernization and skills development together in coordinated effort. Thus, while the government continues to design capacity development interventions for farmers, smallholders will remain detached as long as they are only involved as homogenous recipients of the training packages.

Information gap

Whereas training sessions were conducted for farmers, most smallholders missed out either because they had no information on the training or they were not beneficiaries of government grants through NAADS or NUSAF which organized the training. Some of the farmers who never benefited from the training offered by NGOs and the private sector cited a number of reasons including lack of information on organized training. Underscoring access to knowledge, Okoboi, *et al* (2013) found that despite the fact that youths revealed interest in participating in NAADS across the country, they decried the lack of information and discrimination by older persons as the most limiting factor to their participation. NAADS required farmers to form groups before any form of support could be advanced but even with groups formed, many smallholders were still left out, claiming that the process of selecting beneficiaries was not transparent. Ngirabakunzi and Malinga (2013) found that the participation of PWDs was a function of project implementers' attitudes as well who believe there is nothing PWDs can be able to do for themselves.

Gender and mobility constraints

The gendered division of labour in family farming results in women having multiple responsibilities in the household, which restricts the time they have available to participate in training. Women are burdened with a lot of work, which limits the time they have to access training, while men do a lot of 'non-work' activities. In addition, long distances to training centres, especially at the sub-counties, hinder women, PWDs and youth owing to lack of transport. For women, the cultural norms may be an added constraint since it was reported that some men do not allow their wives to attend such meetings or even to be part of groups. As for PWDs, in all the locations, they do not have easy access to the training events. Those with physical disabilities might lack tricycles, wheelchairs, crutches, or white canes, and some venues do not have user-friendly facilities for them such as ramps on buildings. USAID (2014) also found that young women were typically not a focus of agricultural or vocational programming in either recruitment or design. Constraints especially affecting young women's ability to participate in and benefit from programming – childcare, reproductive health, mobility, land access, and decision-making over agriculture and earnings – were largely not addressed in agricultural or vocational programming with the frequent exception of providing space and care for children.

Capacity of training providers

Despite government recruiting extension workers countrywide and NGOs and some private organisations filling in some gaps, training providers were still inadequate. Moreso, much as skills providers need to be supported with continuous training in new technologies and knowledge, there is limited availability of training opportunities for them, given the inadequacy of agricultural institutions. Abim district lacks any institution of that kind and while Soroti has Busitema University (Arapai Agricultural Institute), it has limited connection with the community. Lira has some training institutions that can provide on-going support to skills providers, including ZARDI (government) at Ngetta but these are still insufficient to build the necessary capacity. The lack of instructors with appropriate skills to deal with those with hearing and speaking disabilities compounds the capacity of trainers to inclusively address the physical needs of some smallholders.

Value chains

Majority of the capacity-building interventions appeared to support maize, cassava, ground nuts and beans value chains and a considerable number targeted soya beans, chilli, mangoes and oranges. There was no

organization that specifically targeted millet growers. However, millet farmers received support from non-specialized trainers who supported all farmers irrespective of crops they grow. Most trainers provided knowledge in harvesting, land preparation, fertility maintenance, drying of food crops. The situation of millet farmers in Soroti shows that by targeting specific value-chains, agricultural extension support has remained out of reach for some smallholders.

Conclusion

Just as agri-skills development itself is gradual so is attaining inclusiveness in empowering smallholders with knowledge and skills. Different smallholders each face peculiar conditions which have a bearing on what constitutes inclusive learning for them. The experiences of Advance Afrika provide valuable insights on how greater inclusiveness in agri-skills development can be realised. The extent to which smallholders judge a training intervention as inclusive depends on the extent to which the intervention is responsive to the needs of the smallholders. The cases of smallholders in Abim, Lira and Soroti demonstrate that there is no one-size-fits-all model for inclusive agri-skills development. Achieving inclusiveness in empowering smallholders with knowledge and skills calls for context-specific lenses that recognise the heterogeneity of smallholders' circumstances and capacities. A farmer-centred approach to skills empowerment that is alive to smallholders' differentiated realities is indispensable to making the process of learning more inclusive.

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