

# VILLAGE-BASED ADVISOR (VBA) MODEL



# Table of contents

1.0 Background information on the Village-Based Advisor model.....	3
2.0 Value proposition of the VBAs .....	3
3.0 Data analysis .....	4
Input sales .....	5
Mechanisation and incomes earned from aggregation .....	7
4.0 Promoting the VBA model as a driver of an alternative extension model .....	9
Improving economic sustainability of the VBA business model .....	9
5.0 Conclusion and recommendations .....	10
5.1 Annex- Success stories .....	11- 14

## List of tables and figures

Table 1: No of VBAs who were offering at least one service to farmers during the different seasons ie extension or linkage .....	4
Table 2: Number of farmers served by one VBA.....	4
Table 3: Input sales for Tharaka Nithi and Embu Counties.....	5
Table 4: Incomes from mechanisation.....	7
Table 5: Incomes from aggregation for Tharaka Nithi and Embu Counties .....	7
Figure 1: Input sales proportion in Tharaka Nithi .....	6
Figure 2: Input sales proportion in Embu County .....	6
Figure 3: Earnings per commodity in Tharaka Nithi County .....	8
Figure 4: Earnings per commodity in Embu County .....	8

## 1.0 Background information on the Village-Based Advisor (VBA) model

Entering the early 1990s, with the advent of structural adjustment programmes, the Kenyan government adopted a plan that saw public service restructuring, including a freeze on new employment in new workers joining public services. One of the hardest hit sectors was agricultural extension services. Over 30 years later, the situation has scarcely improved.

Agricultural extension services to farmers are vital for enhancing productivity and production of agricultural produce in Kenya. Many farmers face several challenges in their farming activities, ranging from poor farming practices, inadequate use of inputs, and lack of adoption of appropriate farming technologies, leading to low crop yields, food insecurity, and low incomes.

To mitigate this challenge, an innovative concept known as the Village-Based Advisor (VBA) model is a transformative approach that is gaining traction in Kenya.<sup>1</sup> It establishes a strong linkage amongst farmers and farmer groups to enhance easy access to markets and offer last mile delivery of services and inputs.

VBAs are typically well-informed, passionate farmers who receive specialised training to provide technical extension services, inputs and market linkages to other services to other farmers.

The model is currently being adopted in parts of Kenya to address a critical gap in extension services for smallholder farmers. The current ratio of extension workers to farmers stands at 1:5,000, compared to the optimum ratio of 1:400 recommended by the UN Food and Agricultural Organization (FAO).<sup>2</sup>

Farm Africa is working in partnership with AGRA to implement the Strengthening Regenerative Agriculture in Kenya (STRAK) project in Tharaka Nithi and Embu counties and is working with 319 VBAs who are currently delivering critical extension and aggregation services to over 52,000 farmers in the two counties.

For sustainability, there is need to develop a more systematic incentive structure for VBAs through business development, linkage with private sector actors on both the inputs and outputs markets, and a diverse range of innovative service provision.

## 2.0 Value proposition of the VBAs

VBAs play a critical role in delivering extension services that are geared towards improving farmers' access to markets for their produce, directly enhancing their productivity and livelihoods. The primary services offered by the VBA model in Embu and Tharaka Nithi counties provides easy access to inputs such as quality seeds, fertilisers, sourcing, aggregation, and marketing of commodities.

The VBAs earn commission-based incomes from these different business lines, thus creating self-employment opportunities while at the same time helping smallholder farmers access technologies and promoting entrepreneurial opportunities for young people and women in various villages. This reduces the distance farmers travel to purchase yield-enhancing inputs and market their produce.

To enhance the quality of the services provided to the farmers and increase food security, income, and resilience to climate change, Farm Africa and AGRA train the VBAs in Regenerative Agriculture (RA) practices, business and marketing skills.

---

1. The VBA approach was originally pioneered by FIPS only on inputs delivery and now has been adopted in the region. <https://doi.org/10.1080/1389224X.2018.1432495> Kansime et al, 'Achieving scale of farmer reach with improved common bean technologies: the role of village-based advisors' Journal of Agricultural Education and Extension (2018). <https://blogs.ilita.org/index.php/for-farmers-seeing-is-believing-and-peer-to-peer-is-peerless-village-based-advisor-approach-working-wonders/>

2. Agricultural Information access among Smallholder Farmers: Comparative Assessment of Peri-Urban and Rural Settings in Kenya. aiw6-(16)-pp133-137-Odongo PDF (assets.fsnforum.fao.org)

### 3.0 Data analysis

This data was retrieved from previous studies and findings from STRAK survey, data analysis, reporting and validation conducted in May 2024.

#### Number of VBAs offering at least one service

Training data from the project implementation by Farm Africa and AGRA's STRAK project indicates that in the March-April-May season (MAM) of 2023, a total of 259 out of 319 VBAs (81%) engaged in Tharaka Nithi and Embu counties were offering at least one type of service to the farmers while 292 VBA's out of a total of 319 VBAs (92%) were offering at least one service to the farmers in the October-November-December (OND) 2023 season.

The types of services offered by the VBAs include: extension services (on-farm and off-farm training on regenerative agriculture practices), aggregation and market linkages for the farm produce, access to farm inputs, farm equipment, and tree seedlings as well as linkage to mechanisation services such as tractor, threshing and shelling services.

County	VBA's	Active MAM 2023	Active OND 2023	Gender	Age
Embu	161	147	155	79.3% female	7% youth
Tharaka Nithi	158	112	137	43.1% female	14.6% youth
Total	319	259	292	122.4% female	21.6% youth
Percentage		81%	92%		

**Table 1: No of VBAs who were offering at least one service to farmers during the different seasons, ie extension or market linkage**

In Embu County, 79.3 % of the VBAs are female, while 7% are youths. In Tharaka Nithi County on the other hand 43.1% of the VBAs are female and 14.6% are youth, hence demonstrating the active participation of women as VBAs..

#### The average number of farmers served by a VBA

The average number of farmers served by one VBA in Embu County is 171, while one VBA serves an average of 116 farmers in Tharaka Nithi County. In some instances, in both counties, there are VBAs serving up to 500 farmers.

County	No of farmers	No of VBAs	Average no of farmers served
Embu	26,515	155	171
Tharaka Nithi	15,901	137	116
Grand total	42,416	292	145

**Table 2: Number of farmers served by one VBA**



## Incomes earned by VBAs from inputs

In the period of March, April and May (MAM) 2023, 53 active VBAs in Tharaka Nithi county earned a total of Kshs 8,324,610 and also earned a total of Kshs 8,414,785 in the October, November and December (OND) 2023 season from the sale of inputs. This meant that the average earnings per VBA over the two seasons were Kshs 315,837.64 in the two seasons. This is translated to give every VBA a monthly income of Kshs 26,319.80.

In Embu county, 57 active VBAs earned Kshs 4,525,838 in the MAM 2023 season and Kshs 6,762,550 in the OND 2023 season. This means that each of the active VBAs in Embu county earned an average of Kshs 198,041.89 from the sale of inputs, giving a monthly income of 16,503.49.

The data from the two counties demonstrates that the VBAs are earning a significant decent income through the sale of inputs to the farmers they serve, which is higher than the set minimum wage in Kenya of Kshs 15,201.65.<sup>1</sup>

## Input sales

County	Active VBAs	MAM 2023 earnings	OND 2023 earnings	Total amount earned in two seasons	Average earning per VBA in Kshs	Highest earning inputs
Embu	53	8,324,610	8,414,785	16,739,395	315,837.64	certified seeds
Tharaka Nithi	57	4,525,838	6,762,550	11,288,388	198,041.89	certified seeds

Table 3: Input sales for Tharaka Nithi and Embu Counties

1. <https://cotu-kenya.org/wp-content/uploads/2022/07/Minimum-Wage-Gazette-Notice-2022.pdf>

### Input sales proportion- Tharaka Nithi

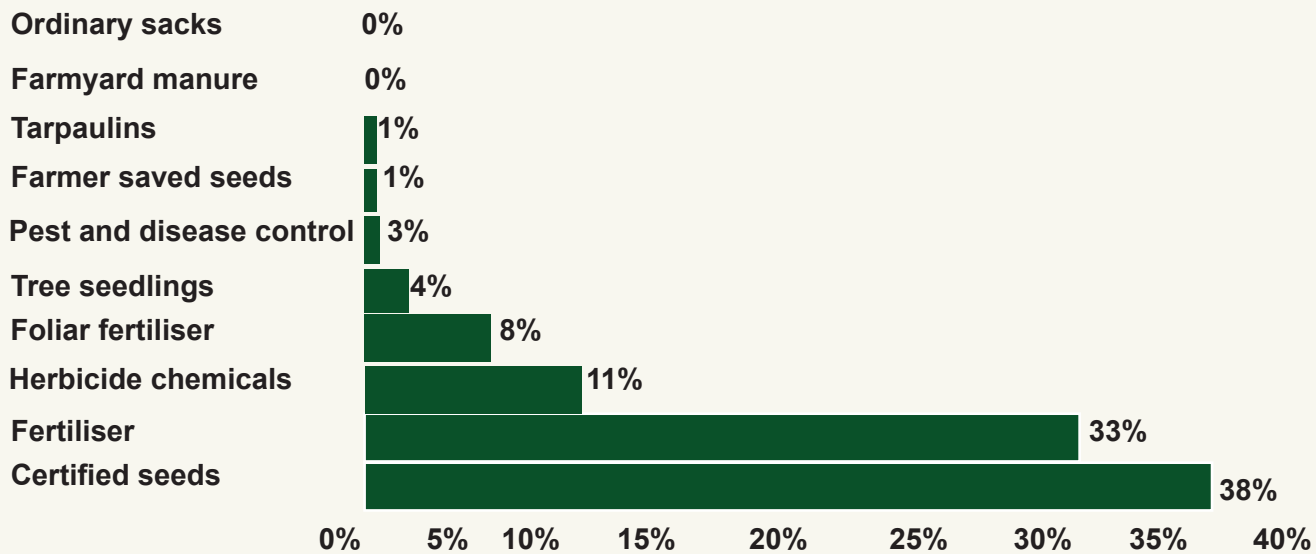


Figure 1: Input sales proportion in Tharaka Nithi County

The highest-earning input sold in Tharaka Nithi County was certified seeds which accounted for 38% of the earnings followed by fertiliser at 33%, and herbicides at 11%. Other inputs sold included foliar fertilisers, pest and disease control products, tree seedlings and tarpaulins.

### Input sales proportion- Embu County

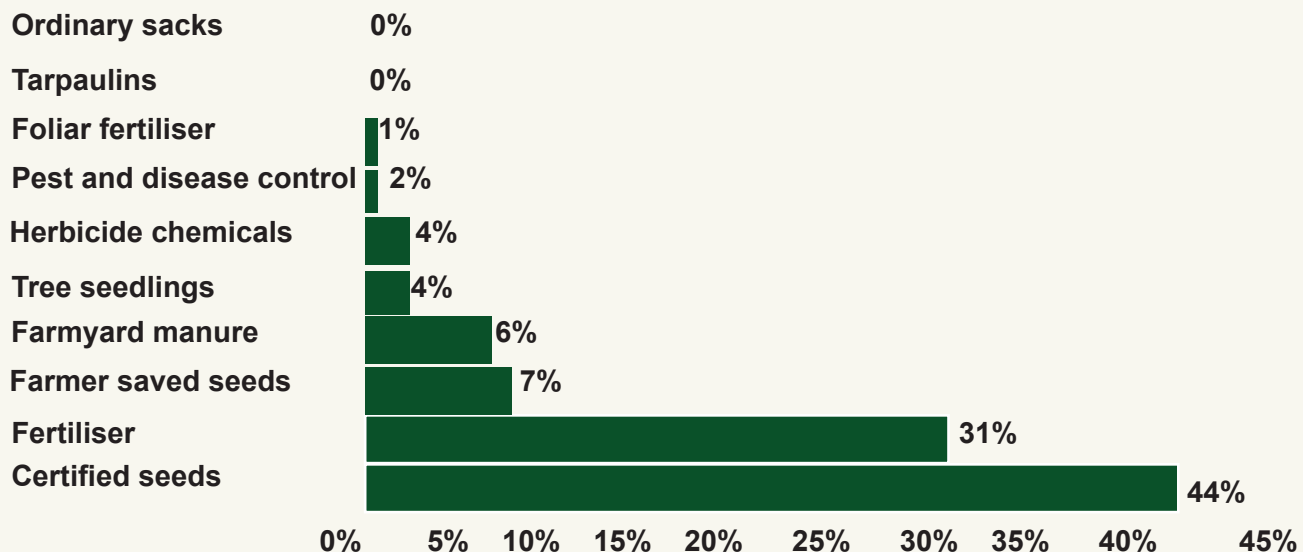


Figure 2: Input sales proportion in Embu County

The highest earning inputs sold in Embu County by the VBAs included certified seeds at 44%, fertiliser at 31% and farmer saved seeds at 7%. The rest of inputs sold included farmyard manure, herbicides, pest and disease control products, tree seedlings and tarpaulins.

It is noted that in Embu, a higher proportion of VBAs earned an income from the sale of seeds (seed multiplication) as compared to Tharaka Nithi, with the total commission earned from this being 7% of the total commissions earned in the season.

Involvement in linkages of farmers to mechanisation services was also noted as a potential income earner for VBAs in both counties. During the October, November, and December 2023 season, five VBAs offered mechanisation services to farmers. In Tharaka Nithi, this was mainly from farmer linkage to tractor services, eg ploughing and ripping, while in Embu, the commission was earned from linkage to shelling services. There is potential to create more income for VBAs by strengthening linkages with mechanisation service providers.

#### Mechanisation

County	Total commission in KSh	No of VBAs involved
Tharaka Nithi	390,000	2
Embu	650,000	5

**Table 4: Incomes from mechanisation**

#### Incomes earned by VBAs from aggregation

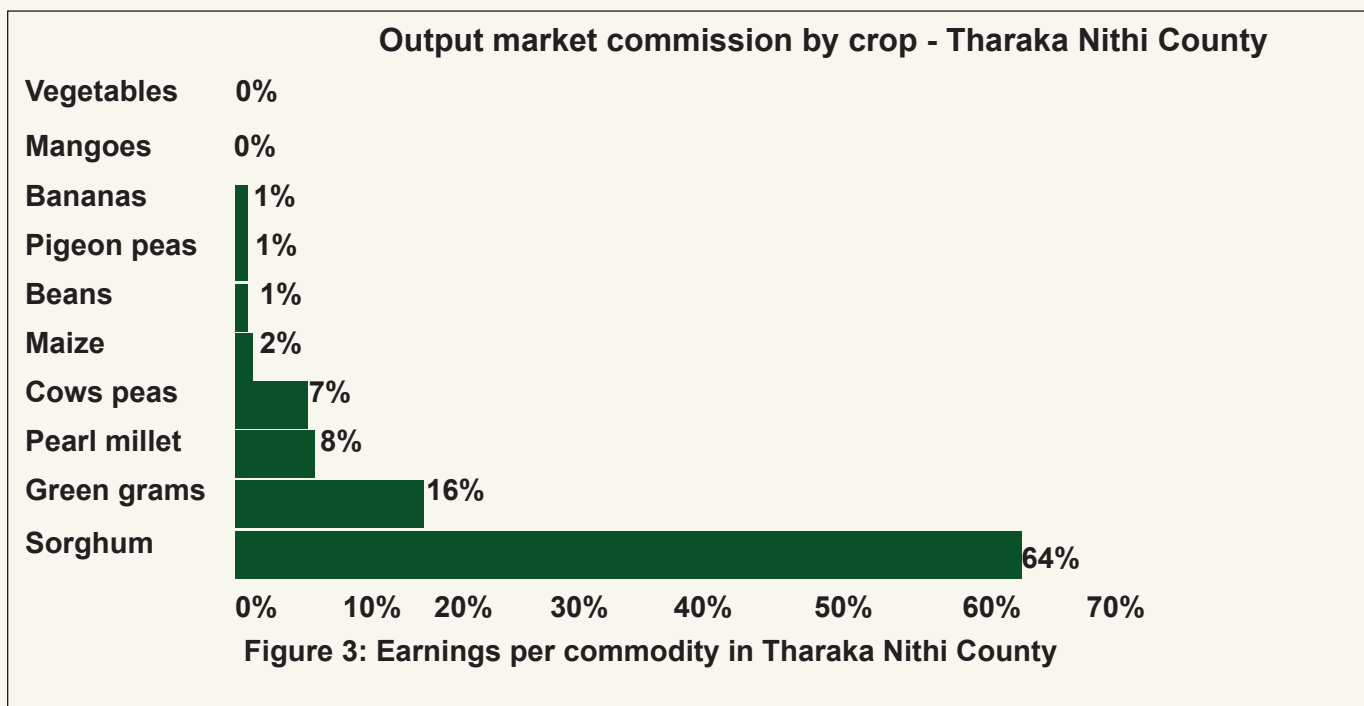
In the March, April, and May (MAM) 2023 season, 66 VBAs in Tharaka Nithi earned Kshs 9,341,245 from aggregating various commodities and Kshs 9,298,049 in the October, November and December (OND 2023) season. The average earning per VBA in the county from commodity aggregation and marketing amounted to Kshs 282,413.55 over the two seasons.

In the MAM 2023 season, 53 VBAs in Embu County earned Kshs 2,466,280 from the aggregation of commodities and a total of Kshs 2,990,487 in the OND season. The average earning per VBA on aggregation in Embu County is Kshs 102,958. The highest-earning commodity in Embu County was maize.

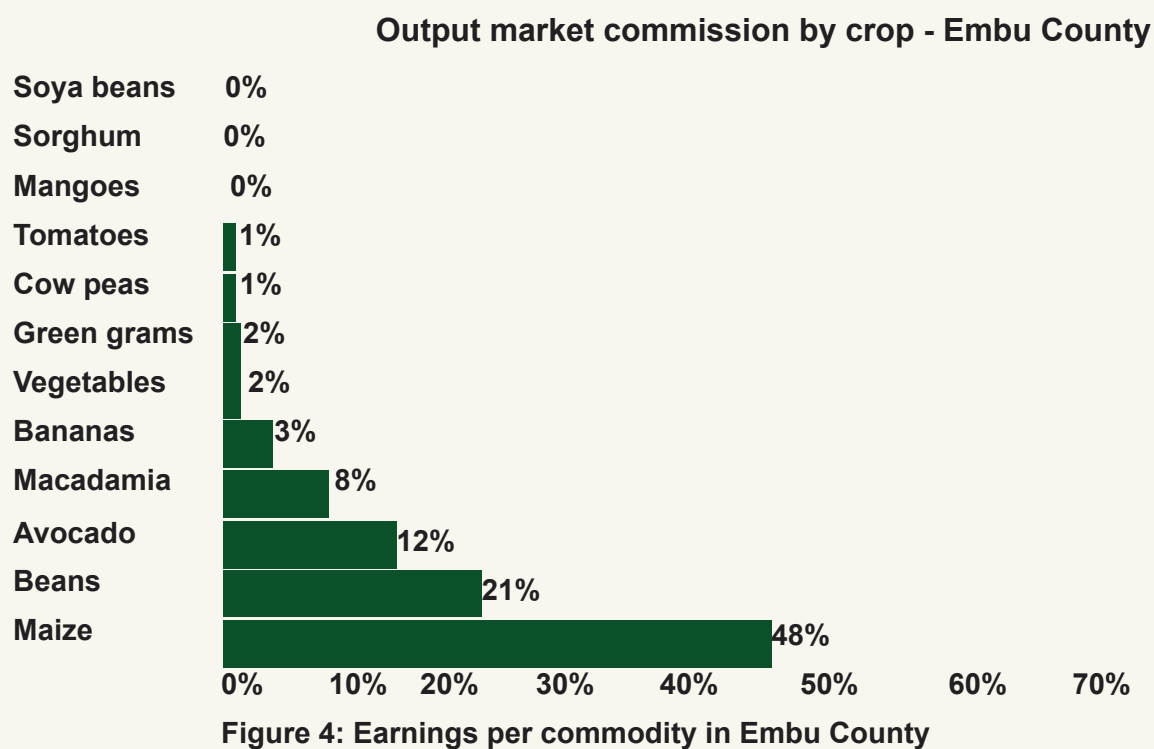
#### Aggregation

County	Active VBAs	MAM 2023	OND 2023	Total amount earned in two seasons	Average earning per VBA in Kshs	Highest earning outputs
Tharaka Nithi	66	9,341,245	9,298,049	18,639,294	282,413.55	Sorghum
Embu	53	2,466,280	2,990,487	5,456,767	102,957.87	Maize

**Table 5: Incomes from aggregation for Tharaka Nithi and Embu counties**



The highest earning commodities in Tharaka Nithi County were sorghum which made 64% of the income, green grams at 16% and pearl millet at 8%.



The highest earning commodities in Embu County are maize at 48%, beans at 21% and avocado at 12%.



## 4.0 Promoting the VBA model as a driver for alternative extension and linkage to private sector services

### Last-mile delivery and commercial engagement

The VBA model excels in last-mile delivery, ensuring critical services and inputs reach even the most remote farmers. By engaging with the private sector, such as seed and fertiliser companies, agricultural technology companies like Esoko Kenya, which provides agricultural information and market access through mobile and web-based platforms; mobile network operators like Safaricom, Airtel and fintech and financial inclusion companies like FarmDrive, the model enhances commercial opportunities for both farmers and VBAs.

Private sector involvement is crucial in creating efficient market linkages for farmers' produce, creating the incentives and availability of high-quality inputs. Strengthening these linkages will further increase the incomes of VBAs and improve the overall economic resilience of farming communities.

### Addressing the gaps in traditional extension services

Traditional agricultural extension services are often typified by low reach, inadequate resources, and low adoption rates of new technologies. The VBA model, with its community-based approach, overcomes these challenges by providing localised, tailored services that are responsive to the specific needs of farmers. The model's success in Embu and Tharaka Nithi counties is a strong case for its broader adoption across rural farming communities.

### Improving economic sustainability of the VBA business model:

#### Agroforestry, polygon mapping, agri-insurance, digital agents

To improve the economic sustainability of the Village-Based Advisors (VBA) model, Farm Africa has introduced innovative approaches under the Regenerative Agriculture project, with a strong focus on agroforestry. The high-integrity **Payment for Environmental Services (PES) Agroforestry model** has successfully onboarded 20,521 smallholders and established farmer councils to enhance decision-making in rural communities.

The model uses the sale of carbon removal units (CRUs) to financially reward farmers who plant trees and contribute to mitigating climate change. By the end of 2023, 15,097 had been enrolled, and 7,655 farmers generated CRUs at an average price of €30.75.

This initiative has generated Ksh 63 million through the sale of CRUs, significantly boosting VBA and farmer incomes while reinforcing environmental and social sustainability. A vital component of this success is the planting of a substantial number of agroforestry trees, driving demand for diverse seedlings, including fruit, fodder, and indigenous trees, which have, in turn, created new employment opportunities in the rural areas.

These efforts collectively strengthen the economic viability of the VBA business model, ensuring that VBAs remain motivated and effective while greatly benefiting the smallholder farmers they support. Additional avenues for economic growth include the **Polygon Mapping Exercise (PME)**, where VBAs have mapped land sizes and tree populations for 20,521 farmers, generating income through service fees and ensuring accurate data collection to bolster agroforestry efforts.

Furthermore, the introduction of **Agri-Insurance** presents another income stream, as VBAs earn commissions by promoting and facilitating insurance among farmers, thereby enhancing crop security. Integrating digital platforms further transforms VBAs into **digital agents**, enabling more efficient connections between farmers and input/output markets, ultimately expanding their reach and effectiveness.

In support of the programme, the VBAs and farmers received an assortment of fruit trees in both Embu and Tharaka Nithi County: 6,592 seedlings were distributed as follows: macadamia (2000); avocado (2492); mangoes (1100); citrus (1000). For the coming seasons, the programme will distribute 586,545 seedlings.

## 5.0 Conclusion and recommendations

The VBA model presents a compelling alternative to traditional agricultural extension services. By empowering VBAs, improving access to inputs and markets, and fostering commercial engagement, the model addresses critical challenges smallholder farmers face.

It makes relevant inputs and knowledge available at the community level and connects each VBA with a manageable number of farmers. The aggregation of produce increases bargaining power on price and provides margin and incentive for the VBAs. The model is self-sustaining in that it generates additional income for the VBAs, including through input supply. It supports the 'last mile' in the food system, ensuring that inputs, information and markets penetrate the farm gate.

The VBA model is a practical, sustainable, and profitable way of promoting the benefits of regenerative and climate-smart agriculture at scale, improving community resilience to increasingly unpredictable climate extremes. The model is gender inclusive, and female VBA are well represented and successful.

The data underscores the model's effectiveness in enabling VBAs to build viable businesses providing the services and inputs farmers need to enhance their productivity, income and resilience. Promoting and scaling up the VBA model will be instrumental in transforming rural agricultural systems and improving the livelihoods of smallholder farmers in Africa.

## Recommendations emerging from this experience include:

- **Policy scale up:** Village-Based Advisors model to be adopted by both government and private sector actors and entrenched in agricultural-related policies to enhance the provision of regenerative extension services to farmers in all the counties in Kenya. The county governments can emulate this approach by prioritising investments in agricultural extension services and building the capacity of local extension workers to deliver tailored support to farmers.
- **Enhancing innovation and technology:** This includes identifying innovations and technologies that will support and enhance the productivity of farmers' produce as well as the operations of VBAs, such as digital technology in the provision of e-extension services, and ensure that the majority of smallholder farmers all over the country are reached and supported.
- **Building public-private partnerships** with like-minded stakeholders, including markets and financial institutions, to develop tailor-made financial products for financial leverage and to enhance the adoption of Regenerative Agriculture practices.
- **Developing insurance products:** Identifying and working closely with institutions that provide agri-insurance to the farmers to mitigate against climate-related risks and even the VBA agri-entrepreneurs to cover risks associated with their businesses.
- **Opportunities and sustainability plan:** This includes identifying more opportunities and developing strategies for ensuring the long-term sustainability of the VBA model, such as diversifying revenue streams, monitoring and continuous mentorship, and capacity building of the VBAs to enhance the quality of services they deliver to the smallholder farmers.

## ANNEX: Success stories

The Role of Village-Based Advisors (VBAs) in agricultural innovation: success stories, challenges, and sectoral impacts.

### VBA perspective



**Jonathan Muragara, an agrodealer VBA. Photo credit: Farm Africa/ Bertha Lutome**

#### **Jonathan Murugara- Agro dealer**

“My agrovet business has expanded since I started interacting with fellow farmers as a VBA. The shop that started with a stock of Kshs 10,000 is now worth stock of more than Kshs 200,000. The customers have also increased from 50 customers in 2016 to more than 600 farmers as of now. What I love the most about being a VBA agro dealer is that I get the opportunity to educate farmers on the best fertilisers, herbicides, pesticides and seeds to plant. I train them on the correct measurement especially when using the chemicals so that they do not use plenty of chemicals, which in the long run destroys the soil and leads to low harvests.”





**Onesmus Mutethia, an aggregation VBA. Photo credit: Farm Africa/ Bertha Lutome**

### **Onesmus- Aggregator**

“I taught my farmers to practise farming as a business and do record keeping and what motivates me the most is that my farmers can meet their daily needs and pay school fees for their children through the aggregation business that I trained them on. Apart from that, my life has improved for the better. I now have two stores which have a variety of produce including; green grams, millet, sorghum, cow peas, cashew nuts, ground nuts, peas and beans. All these have increased my income from Kshs 20,000 when I started the business to more than Kshs 150,000. I also conduct trainings on how to write good business plans and in instances when the farmer is not able to write well, then I write for them at a fee.”



**Samuel Fundi at his tree nursery. Photo credit: Farm Africa/ Bertha Lutome.**

### **Samuel Fundi - nature conservation enthusiast**

“VBAs play a critical role in providing technical guidance to farmers. Through them and the Farm Africa team, I gained more knowledge on farming and investing in a tree nursery. I learnt about a variety of trees that most people prefer so that I can plant and sell more trees. Initially, I had 500 tree seedlings in my nursery and only got a profit of Kshs 3,000 since I only had one type of tree seedling. I now have 11,000 seedlings in different varieties and sold 8,000 of them at a go, hence gaining a profit of more than Kshs 100,000. After receiving this considerable profit, I was inspired to become a VBA, and what makes me happy is that I have personal experience and know that when you plant both trees and crops, you increase the revenue because you will gain.”





Emily Kangai ready to thresh maize at a farm. Photo credit: Farm Africa/ Bertha Lutome.

### Emily Kangai - creating jobs for fellow farmers through threshing.

“My interaction with VBAs as a farmer is what motivated me to become a VBA in my region. I admired how they trained us on regenerative agriculture, especially conserving the soil, selling inputs and even threshing. It is out of this that I discovered a gap in threshing and decided to venture into it. I noticed that the VBAs bring many farmers together and therefore, that was a good opportunity for me to market my business and after becoming one, I also transferred the knowledge to other farmers and created employment. I have two machines and therefore, I hire four people to operate them temporarily hence enabling me to thresh 50 bags of maize and 40 bags of millet in a day. This has increased my income since I thresh for more than 150 farmers and that is why I managed to purchase another threshing machine and a motorbike.”







**AGRA**

Sustainably Growing  
Africa's Food Systems

**Address:** Devsons Court, Apartment 09,  
Argwings Kodhek Close, Hurlingham, Nairobi, Kenya.

**Website:** [www.farmafrica.org](http://www.farmafrica.org)

**Facebook:** Farm Africa

**Instagram:** farm\_africa

**LinkedIn:** Farm Africa

**Email:** [info@farmafrica.org](mailto:info@farmafrica.org)

**Telephone:** +254 721 576531

Kenya | Ethiopia | Uganda | Tanzania | DR Congo | United Kingdom