GSJ: Volume 9, Issue 8, August 2021, Online: ISSN 2320-9186 www.globalscientificjournal.com

# Assessment of Agricultural extension services delivery system in Oromia Regional State, Ethiopia

Tilahun Geneti Abdi Oromia Agricultural Research Institute E-mail address: tilagenet2006@yahoo.com

#### **Abstract**

The study was conducted during 2018 in six zones of Oromia regional state with the objectives of assessing the agricultural extension service delivery and identifying the main challenges of extension service delivery. Household survey, FGD, and KII were used to collect the data from respondents. The result revealed that 41.9%, 16.8%, 16.1, 13.6%, and 11.6% of model farmers are rated in a very high, Average, Very Low, High and Low participant of extension services, respectively. While about 47.5%, 21%, 17%, 7.3 and 7.2% of resource poor farmers are rated to very low, Low, Average, High and Very high participant of agricultural extension service, respectively. This indicates that the majority of wealthy farmers are participants of extension services and the majority of resource poor farmers are marginalized from it. Participation of youth and women in agricultural extension service is rated very low. The result also indicates that about 82% of respondent farmers witnessed the availability of Farmers' Training Centers at kebele level but the majority (65.4%) of them indicated that there was lack of demonstration material and office furniture in most compounds of FTCs. The result also revealed that the main contributing factors for the low performance of Development agents at kebele level are low salary payment, logistic problem, lack of incentives and lack of education opportunities. Motivated DAs can change the farmers' behavior and shows enthusiasm and passion to their jobs. Agricultural extension service delivery system should incorporate all categories of farmers like wealthy, resource poor, youth and women. Farmers' training centers should be furnished by office furniture and the demonstration materials should also be fulfilled to facilitate extension service delivery. All inclusive, better quality and furnished residences of DAs should be availed at kebele level.

Keywords: Extension, services, farmers, FTCs, DAs, Oromia

## Introduction

Agricultural extension is a system that facilitates access of farmers or their organizations to new knowledge, information and technologies and promotes interaction with research, education, agribusiness, and other relevant institutions to assist them in developing their own technical, organizational and management skills and practices [3].

Agricultural extension operates within a broader knowledge system that includes research, extension, education and farmers (the four pillars of the system). Agricultural extension service which is determined by its institutional effectiveness and competency of the development agents (DAs) at field has vital role to derive the transformation process in agriculture [1].

Ethiopia's agricultural extension agents, known as Development Agents (DAs), are the people responsible for disseminating knowledge, training and support to Ethiopia's farmers, making them a critical component in the effort to increase agricultural production and transform the sector. With about 21 Development Agents (DAs) for every 10,000 farmers, Ethiopia has one of the densest agricultural extension systems in the world. However, staff retention and quality have been ongoing problems throughout the system due in large part to poor living and working conditions, and inconsistent implementation of career paths and incentive packages [2].

Development agents are part of critical work force in rural area. They have been working by being detached from urban lifestyle and forced to work under harsh environment. They are working in an infrastructure deprived of locality, travelling miles with foot every day, lacking the basic office facility and pursuing minimal educational opportunities [12]. The current status of agricultural extension delivery system and major challenges are not known in Oromia region. Therefore, assessment of agricultural extension system was initiated to fill the gaps.

#### **Objectives**

- To assess agricultural extension delivery system in Oromia Region
- To identify major challenges in extension delivery system in Oromia Region

## Methodology

This assessment was conducted by selecting 1350 respondents from 18 districts under six zones of Oromia region during the year 2018. Three districts from each zone were selected to collect data. Study zones were selected based on their agro-ecology by considering both farmers and pastoralists' area. From pastoralists' area Borana and West Hararghe (partial pastoralist) and from farmers' area Iluababor, West Wollega, West Shewa and Arsi Zones were selected representing Oromia regional state.

Focused Group Discussions (FGD) and Key Informant Interview (KII) were also conducted to support the data collections qualitatively. The collected quantitative data was analyzed by using Statistical Package for Social Science (SPSS) version 20 while qualitative data was analyzed by organizing and summarizing ideas together.

#### **Results and Discussion**

#### Participation of farmers in agricultural extension services

Table 1: Farmers' participation in extension services

Farmers' category	Participation rate (%)						
	Very high	High	Average	Low	Very low		
Model	41.9	13.6	16.8	11.6	16.1		
Medium	7.4	19.3	39.1	16.6	17.6		
Resource poor	7.2	7.3	17	21	47.5		
Youth	6.5	6.9	13.8	19.9	52.9		
Women	6.1	6.8	14.4	18.9	53.8		

As clearly shown in the table above, model farmers participation in extension service delivery is rated very high and resource poor participation in agricultural extension service is rated very low which indicates significant difference between model farmers and resource poor farmers. Resource poor farmers are marginalized in participating in agricultural extension services. Similarly, youth and women participation in agricultural extension delivery system is rated very low. This indicates that agricultural extension service delivery system is highly biased toward wealthy farmers by ignoring the majority of resource poor.

FGD and KII result also indicates that participation of model, medium and resource poor farmers in agricultural extension service is rated very high, average and very poor, respectively. Similarly, participation of youth and women in agricultural extension is rated very low. This indicates that extension service delivery is mainly focusing on wealthy and medium farmers.

#### Status of farmers' training centers

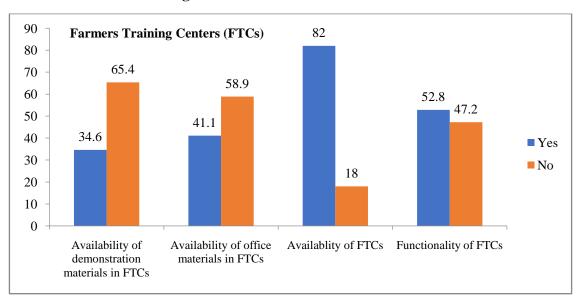


Fig 1: Status of farmers' Training Centers

The result shows that 82 % of respondents were aware about the availability of farmers' training centers (FTCs) but 65.4 % of respondents indicated that there was lack of demonstration materials in the compound of FTCs. The result from respondents also indicates that the office materials/furniture of most FTCs was lacking (Fig 1).

The result from FGD indicates that the construction of most of farmers' training centers didn't consider the weather situation of different parts of Oromia region, for instance, all parts of FTCs houses which was constructed by steel in lowland area is not comfortable for the office of development agents. The result also indicates that there is a scarcity of demonstration materials in the majority of farmers' training centers. There is also a scarcity of land for demonstration purposes in most compounds of farmers' training centers in Oromia region.

The research report by Yelemzew [11] indicates that the main limiting factors for the proper operation of FTCs have been identified as limited availability of resources including the provision of basic infrastructure, running funds, and resources at the FTC and woreda level. Most importantly, the design and provision of FTCs is not sufficient for the demand and needs of

farmers. It lacks the basics motivate to make it an infrastructure that is farmer driven and market oriented. Many of the FTCs have now either closed or failed to bring the desired outcome.

# Situations of Development Agents at Kebele level

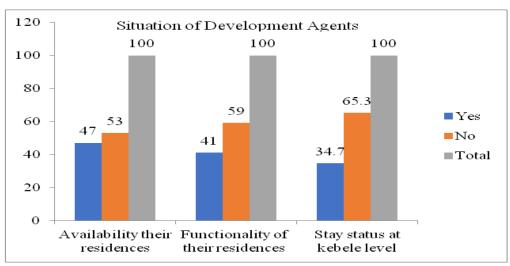


Figure 2: Situation of development Agents at kebele level

As it is clearly indicated on figure 2 above, the majority of respondents (53%) replied that the residence house of Development Agents (DAs) was not available at kebele level. The result also shows that even the available residences of DAs were not functional and able to give services. It is also indicated that about 65.3% of DAs were not staying at kebele level where they are assigned to give services. They have been working by residing at the nearest town their assigned kebeles. This may be because of lack of their residences and its functionality where it is available.

The result from FGDs also indicates that some available residences of DAs are not constructed by considering the number of DAs assigned at kebele level. It doesn't accommodate all DAs assigned. In the other hand, lack of maintenance of DAs houses is the main challenge for them.

## **Major Challenges of Developments Agents**

Table 2: Major challenges hindering better performance of development Agents

Major Challenges	Rate (%)					
	Very high	High	Average	Low	Very low	
Busy with non-agricultural works	18.9	21.7	30.3	14.9	14.2	
Lack of incentives	40.6	25.1	12.6	11.4	10.3	
Lack of education opportunity	37.7	19.4	18.3	12.6	12	
Low salary payment	44.6	22.9	10.9	9.6	12	
Logistic problem	44.5	24.6	10.3	10.3	10.3	

As it is indicated in the table above, the main contributing factors for the low performance of Development agents at kebele level are low salary payment, logistic problem, lack of incentives and lack of education opportunities.

The result from FGDs indicates that most Development Agents are not willing to stay at kebele level to perform their duties. In similar way, the FGD results indicates that lack of education

opportunity, low salary payment, lack of logistics and lack of incentives are among the contributing factors for the low performance of Development Agents.

Studies from various countries have identified key factors lowering the motivation and performance of DAs. These include lower remuneration, lack of promotion, low status and recognition, lack of professional advancement, lack of recognition and performance measurement. As a result, despite becoming a pillar in the rural transformation and food security efforts of Ethiopia, the resulted DAs are far from expected [11].

#### Conclusion

The study was conducted in Oromia region to assess agricultural extension service delivery system and the main challenges in delivering agricultural extension services. Agricultural extension service delivery system is a long history in Ethiopia. However, the extents of the services were not as expected. Agricultural extension services delivery system is highly biased toward wealthy farmers by ignoring the majority of resource poor. Most of the available Farmer Training Centers (FTCs) were lacking the office furniture and demonstration materials. In most parts of Oromia region residence of Development Agents is absent at kebele level which contributes to the low performance. The main contributing factors for the low performance of Development agents at kebele level are low salary payment, logistic problem, lack of incentives and lack of education opportunities.

#### Recommendations

In order to facilitate agricultural extension service delivery system, it is essential to create motivated, passionate and visionary DAs. Performance based incentives, furnished houses, logistics and enough salaries are recommended for them. Motivated DAs can change the farmers' behavior and shows enthusiasm and passion to their jobs. Agricultural extension service delivery should incorporate all categories of farmers like wealthy, resource poor, youth and women. Farmers' training centers should be furnished by office furniture and the demonstration materials should also be fulfilled to facilitate extension service delivery. All inclusive, better quality and furnished residences of DAs should be availed at kebele level.

#### Acknowledgements

The author acknowledges Gemachu Bekele, Garishu Bati, Fikadu Terefe, Megarssa Gebisa, Tedese Birhanu, Ayana Mirkana, Tekalign Mitiku and Abebe Birhanu for participating on the data collection in Oromia Region. The author also acknowledges Oromia Bureau of Agriculture and Natural Resource and Oromia Agricultural Research Institute for financing the data collection and allowing me to participate on the study, respectively.

#### References

- [1] Abate, H.2007. Review of Extension Systems Applied in Ethiopia with Special emphasis to the Participatory Demonstration and Training Extension System. Food and Agriculture Organization of the United Nations.
- [2] ATA (Agricultural Transformation Agency) (2014) Annual Report. ATA, Addis Ababa, Ethiopia
- [3] Christoplos. 2010. Office of Knowledge Exchange, Research and Extension eng; Global Forum for Rural Advisory Services, Lindau (Switzerland) eng; Mobilizing the potential of rural and agricultural extension
- [4] FAO. 2008a. Key messages from a Study on Ethiopia's Extension Systems. Based on the Work of Habtemariam Abate. Document ET-TRS- 08/ext/02. Project: TCPF/ETH/3101. Food and Agriculture Organization of the United Nations Sub Regional Office for Eastern Africa and FAO Representation in Ethiopia, Addis Ababa.
- [5] IFPRI (2010). In-Depth Assessment of the Public Agricultural Extension System of Ethiopia and Recommendations for Improvement. Addis Ababa.
- [6] Ministry of Agriculture and Rural Development (MOARD). 2009a. DAs & FTC. Data at National Level. Addis Ababa, Ethiopia: MOARD
- [7] MoA (2010). Participatory Extension System. Addis Ababa
- [8] Oxfam America (2011) Strengthening Ethiopian Agricultural Extension Sytem (SEAES): Report on P/FTC needs assessment. Addis Ababa
- [9] Oxfam America (2011). Strengthening Ethiopian Agricultural Extension System (SEAES): Report on P/FTC needs assessment. Addis Ababa
- [10] Spielman, D.J., M. Negash, K. Davis. and G. Ayele. 2006. The Smallholder Farmer in a Changing World: The Role of Research, Extension and Education in Ethiopian Agriculture. Ethiopian Strategy Support Program (ESSP) Policy Conference Brief No. 12. Addis Ababa: IFPRI-EDRI
- [11] Yelemzew, A., 2020. Performance Incentives for Development Agents in Ethiopia: Policy Direction for Rural Transformation Efforts