PERCEPTION OF PERFORMANCE OF EXTENSION AGENTS' ACTIVITIES IN YEWA NORTH LOCAL GOVERNMENT AREA OF OGUN STATE, NIGERIA

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Abstract

The study assessed arable crop farmers' perception of extension agents' activities in Yewa North Local Government Area of Ogun State, Nigeria. A total of 150 respondents were randomly selected and interviewed through structured interview schedule. Descriptive statistics such as frequency distribution tables and percentages were used while chi-square analysis was used to test the hypothesis. The results revealed that majority (60.0%) of the respondents were between the age brackets of 40 and 49 years and had secondary education (50.0%), about 57.3% were married, mainly belonged to the male folks (84.0%) and were Muslims (62.0%). About 74.4% had household size of 10 members and above, had more than 20 years of farming experience (59.2%) and had farm size of less than 5 hectares (78.0%). About 48% were full time farmers, sourced finance for farming activities through personal savings (36.7%), had access to cooperative loan for agricultural production (32.0%) and were aware of extension agents` activities (79.7%). Respondents had favourable perception towards extension activities. Chi-square analysis showed that there were positively significant relationship between the socio-economic characteristics such as sex (χ^2 = 15.61, p<0.05); marital status (χ^2 = 8.08 p<0.05); education (χ^2 = 17.74, p<0.05) and farm size (χ^2 = 3.69, p<0.05) of respondents and performance of extension agents. The study recommended that government should assist farmers by making improved agricultural inputs available at a subsidized cost for farmers.

Key Words: *Arable crop farmers, Extension agents, Farmers' perception, Performance*

Introduction

Agricultural extension refers to an educational system that provides farmers with technical information on innovations and advice on credit, other inputs and marketing required to increase farm output and income. It also provides research institutes and credit institutions information about farmers' conditions (Bello and Salau, 2009). There is an increasing awareness on the impact of agricultural extension service in the developmental process in relation to food crop production, through voluntary

educational programme that serves as a teaching and learning technique to disseminate useful agricultural information to the farmers in order to increase their knowledge, skills and attitude that assist them in using the technical knowledge gain to solve their own problem (Maunder, 2002).

Although extension workers need to master cultural differences which vary from one locality to another before implementation of any programme which should be based on the needs and interests of the people which are closely related to improving their livelihood through increasing farm production and their physical environment (Leagen, 2002). For the prominent role extension service plays in dissemination of vital agricultural information. From government perspectives, whatever priority is given to agricultural production, extension service remains a key policy tool for promoting ecologically and socially sustainable farming practices (Oladoja, 2004). The responsibility of making farmers aware of research findings to increase their production is that of extension service providers.

Adejo *et al.* (2012) posited that effectiveness of extension services is determined through the level of awareness created among farmers, number of visits paid to farmers by extension workers, regularity of field meetings, farmers' training sessions and numbers of farmers trained Ajayi (2005) published a model for evaluating effectiveness of extension programme which stresses assessment of the activities of extension personnel such as training, supply of inputs, and technologies, and creation of awareness as the indicators of the effectiveness. The responsibilities of extension services include transferring problems from the farm and rural households to research centers for solutions. Thus agricultural extension service aims at reaching the rural people and train them to make independent decisions for making use of available local resources (Maunder, 2002).

Nigeria has been experiencing food crisis since 1978 when rice importation bill rose to 194.76 million naira and the year's total food import bill amounted to 1.025 billion naira. The production of major agricultural commodities in the country had been on the decrease considerably since 1970. The production of agricultural commodities had since been increasing at a decreasing rate and could not keep pace with the demand for these food commodities (Agbelemoge, 2013).

The proposition is that the accomplishment of extension service goals depends primarily on the effectiveness of the extension agents achieving the programme objectives. (Omotayo *et al.,* 2001). This study therefore assessed arable crop farmers' perception of village extension agents' activities in Yewa North Local Government Area of Ogun State, Nigeria.

Objectives of the Study

The study specifically described the socio-economic characteristics of arable crop farmers and professional characteristics of Extension Agents; investigated the agronomic practices disseminated to farmers and constraints to adoption of innovation in the study area.

The hypothesis of the study was stated in the null form:

Ho[1]: There is no significant relationship between selected socio-economic characteristics of arable crop farmers and performance of extension agents' activities.

Methodology
Area of study

The study area is Yewa North (formerly Egbado North) Local Government Area of Ogun State located around 7°14′00″ N and 3°02′00″ E. The area is bounded in the West by the Republic of Benin, North by Imeko/Afon Local Government, South by Yewa South Local Government and East partly by Abeokuta North and Ewekoro Local Government. Its headquarters is in Ayetoro. The local government has the largest expanse of land in the state, with a size of 3.755.03 sq kilometers and a population of 234,747 (NPC, 2009).The area is the food basket of Ogun state. The inhabitants are mainly Yewas and ketus with some Fulanis. Their main occupation is farming, they produce food and cash crops which include cassava, maize, melon, cashew, vegetables, fruits and spices citrus and kolanut.

Method of Data Collection

Using random sampling technique, fifteen (15) farming households were selected from ten (10) villages each to make one hundred and fifty (150) respondents for this study. The primary data were collected by administering interview schedule on farmers in the villages and interpreting to them in Yoruba language while their responses were recorded for them. Descriptive and inferential statistical tools were used to analyze data collected. The descriptive statistics included frequency tables, percentages and means. Chi-square analysis was used to test the hypothesis.

Measurement of Variables

Extension Agents professional characteristics were measured by listing thirteen items which farmers responded to on a 3-point scale and were scored as follows: Always = 3; Occasionally = 1 and Never = 0. While Services rendered by Extension Agents were measured on a 3-point scale and scored as; Highly Effective = 5; Effective = 3; Slightly effective = 1 while Not effective = 0. The perception of Extension Agents` Activities were measured on a 5-point likert scale and scored Strongly Agree = 5, Agree = 3; Undecided = 1: Disagree and Strongly disagree = 0 for a positive statement and vice-versa for a negative statement. The independent variables were measured in nominal scale, absolute and continuous scale.

Statistical Analysis of Data

The data collected were analyzed with simple arithmetic computations of frequency counts, percentages, means and standard deviations from the means. The scored were later ranked. The inferential statistics used was chi-square analysis of simple relationship between variables.

Results and Discussion
Socio-economic Characteristics of Arable Crop Farmers

The results in Table 1 revealed that majority (60.0%) of respondents were in 40 and 49 years age bracket but the mean age is 48years, implying that respondents were still very strong and energetic to engage in productive activities that will enhance household income and welfare. This might not be unconnected with the fact that most youth no longer have interest in agriculture and as such migrate to urban areas in search of white collar job. Results on education showed that 50% had secondary education, about 26% had primary education, 13.3% had no formal education while 10.0% had tertiary education. This high level of education could enhance the adoption of improved agricultural technologies among the respondents. Ingye (2005) also reported

that education has a positive effect on the users of farming techniques because it allows farmers to demonstrate skills acquired from the extension agents.

Marital Status and Sex of Respondents

Majority (57.3%) of respondents were married and 36.7% were still single. Married people tend to have more mouths to feed hence will invest in enterprise that enhance household food security and income. The unmarried too are not left out as everyone needs to adequately prepare to fight against this economic recession that is biting hard on the nation's economy. This showed that the business of agriculture and by extension arable crop farming does not lie in the hand of the married people alone. Majority (84.0%) of the respondents were male folks while 16.0% were female implying that arable crop farming activities were not done by male folks only. This is because most rural households were male headed and would have to take care of the family. However, despite the huge responsibility of women in taking care of the home and processing some farm produce, 16.0% of them were engaged in farming activities.

Religion and Household Size of Respondents

Majority (62.0%) belonged to the Islamic faith while 38.0% were Christians, hence both religions are represented in farming activities in the study area. Majority (74.4%) have household size of 10 members and above, signifying the likelihood of employing family labour for most of the farming activities, hence the bulk of farm labour force was provided by family members in the study area, large family sizes are an asset to the farmers. Production of arable crop is mainly done manually rather than mechanical activities simply because most of the farmers are still very conservative, not easily adopting

the new modern technology in the study area (Table 1).

Farming Experience and Farm Size

Majority (59.2%) of the respondents had more than 20 years of farming experience, hence must have acquired enough experience to be able to weather the challenges accompanying agricultural production. About 19.3% had less than 10 years while 21.3% had between 10 and 20 years farming experience. Hence, farmers were quite knowledgeable about the production system that can enhance their adoption of improved agricultural innovation in the study area. Majority (78.0%) had less than 5 hectares of farm land. Surri (2005) and Onu (2006) reported that farm size significantly influenced farmers' adoption of innovation. (Table 2).

Perception of Extension Agents' Attributes by Arable Crop Farmers

Table 3 presents extension agents' professional attributes as evaluated by arable crop farmers in the study area. The results showed ability to demonstrate to farmers ranked first; ability to proffer solutions to farmers' problems ranked second; punctuality by extension ranked third; the fourth was patience with cheerfulness. The sixth was trust by the farmers; farmers claimed that extension agents were very energetic during the discharge of their statutory duties was seventh; Eloquence was eighth; Approachability was the ninth; Confidence was ranked tenth; Refusal to accept gift in cash.and kind eleventh; ability to carry people along in all their activities was twelfth and followed by cordiality was the thirteenth (Table 3).

Extension Services Rendered to Arable Crop Farmers

Table 4 presents extension services rendered to arable crop farmers in the

study area. The results revealed that provision of advice on marketing has the highest mean of 3.78 and was rated highly effective by 30.7% closely followed by advice on use of inputs with 3.47 mean and highly effective by 30.7% of respondents and advice on credit facilities with 3.43 mean. Training and visits of farmers was slightly effective (51.3%) and the mean score was 1.62. Organization of methods, techniques and result demonstration was effective by 52.7% and the mean score was 2.81. However, other extension services rendered to arable crop farmers were listed in table 4.

Perception of Arable Crop Farmers about Extension Activities

The results revealed that 60.0% of the respondents claimed that extension agents proffer immediate solution to agricultural challenges facing farmers in the study area and have the highest mean value of 4.2 and also 64.0% of the respondents strongly agreed that improved agricultural technologies are very good from what obtains in a friends farm with the mean value of 3.51. This implies that adopting extension agents improved agricultural practices will better the lots of the farmers in terms high yield and profit maximization. The results also revealed that while 53.3% agreed that extension agents are not satisfied until every detail instruction is carried out. However, on the contrary, the result revealed that 70.0% of the respondents indicated that the outcome of the extension innovation do not meet up with their expectation and this was the least (Table 5).

Respondent's Extent of Perception of Extension Agents' Activities

Table 6 presents frequency distribution of respondents by extent of perception of extension agents' activities in the study area. Majority (56.0%) of the respondents had favourable perception about the activities of extension agents in the study area. This implies that extension activities need to be more thorough among respondents in the study area. However, the results further revealed that 44.0% had unfavourable perception towards extension agents' activities in the study area

Constraints to Adoption of Innovation

Table 7 presents constraints militating against adoption of agricultural innovation by arable crop farmers in the study area. Adoption of agricultural innovation was bedeviled by myriads of challenges. The results showed that lack of fund (55.8%) was indicated by respondents as a constraints hindering adoption of agricultural innovation. Also, lack of adequate extension officers (80.0%) was also indicated as a constraint. This implies that when there are no adequate extension agents to disseminate and education farmers properly on a given innovation, this may hinder adoption. Findings further revealed that non-availability of equipment (70.0%), poor communication channel (75.0%) and lack of incentives from government (85.0%), all constituted constraints bedevilling arable crop farmers' adoption of innovation in the study area (Table 7).

Testing of Hypothesis

There existed significant relationship between socio-economic characteristics of the arable crop farmers and performance of extension agent's activities. Results obtained from the chi-square analysis showed that the coefficient of age does not establish any relationship with the performance of extension agents in the area. By implication, age does not influence the performance of extension agent. The coefficient of sex of respondents showed a positive significant

relationship with extension agents' performance. However, performance is seen to be high among the male extension agents, implying that village extension work is a tedious work and dominated by men. The results further revealed that education established a positive significant relationship with extension performance. The coefficients of farm size and farming experience showed positive significant relationship with extension agent's performance. This means that the larger the farm size the more the likelihood of farmers to adopting innovation (Table 8).

Conclusion

Based on the study findings, it can be concluded that age, marital status and educational qualification were all seen to establish significant relationship with performance of extension agents in the study area. Arable crop farmers` perception of Extension Agents` activities was not too favourable. The results also concluded that the performance of extension agents goes a long way in determining the extent to which farmers adopted improved agricultural technology. Hence, it is recommended that extension agents should organize training and retraining programmes for farmers in the study area on the adoption of improved agricultural innovations, government should also assist farmers in making available these improved agricultural inputs at a very subsidized cost for farmers.

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Table 1: Socio-economic characteristics of arable crop farmers in the study area

Variables	Frequency	Percent	Mean
Age group			
<40yrs	54	36.0	
40-49yrs	90	60.0	48.1
50yrs and above	6	4.0	
Educational status			
No formal education	20	13.3	
Primary education	40	26.7	
Secondary school	75	50.0	
OND/NCE	15	10.0	
Marital status			
Single	55	36.7	
Married	86	57.3	
Widow/Widower	9	6.0	
Sex			
Male	126	84.0	
Female	24	16.0	
Religion			
Christianity	57	38.0	
Islam	93	62.0	
Household size			
<10	33	22.0	
10 and above	112	74.7	6.0
Total	150	100.0	

Table 2: Distribution of respondents by agronomic practices (n=150)

Variables	Frequency	Percent	Mean
Farming experience			
<10yrs	29	19.3	
10-19yrs	32	21.3	20.3
20yrs and above	89	59.3	
Farm size			
<5ha	117	78.0	5.0
5ha and above	33	22.0	
Primary occupation			
Trading	31	20.7	
Farming	72	48.0	
Driving	33	22.0	
Civil servant	7	4.7	
Artisan	7	4.7	
Source of finance			
Personal savings	55	36.7	
Cooperative societies	48	32.0	
Friends and relatives	7	4.7	
Money lenders	32	21.3	
Others	8	5.3	
Awareness of extension activities			
Yes	119	79.3	
No	31	20.7	
Total	150	100.0	

Table 3: Distribution of respondents` assessment of extension agent's characteristics

Extension agent characteristics	Yes	Always	Occasional	PI	Mean	Rank
Ability to demonstrate	98(65.3)	97(64.7)	46(30.7)	623	4.15	1st
Ability to proffer solutions to problems	58(38.7)	89(59.3)	54(36.0)	607	4.07	2nd
Punctuality	79(52.7)	95(63.3)	33(22.0)	574	3.83	3rd
Cheerfulness	96(64.0)	90(60.0)	40(26.7)	570	3.38	4th
Patience	46(30.7)	93(62.0)	35(23.3)	570	3.80	4th
Trust	78(52.0)	77(51.3)	60(40.0)	560	3.73	6th
Energetic	104(69.3)	88(58.7)	28(18.7)	524	3.49	7th
Eloquency	90(60)	85(56.7)	30(20.0)	515	3.43	8th
Approachability	104(69.3)	97(64.7)	7(4.7)	505	3.37	9th
Confidence	60(40)	65(43.3)	45(30.0)	460	3.07	10th
Refuses to be offer in cash or kind	104(69.3)	45(30.0)	25(16.7)	300	2.00	11th
Ability to carry people along	110(73.3)	25(16.7)	125(83.3)	275	1.83	12th
Cordiality	9(6.0)	46(30.7)	7(4.7)	237	1.58	13th

Table 4: Distribution of respondents by extension services rendered

Extension Services	Yes	Highly effective	Effective	Slightly effective	Mean
Provision of advice on marketing situations	95(63.3)	46(30.7)	40(26.7)	9(6.0)	3.78
Advice on use of inputs	94(62.7)	46(30.7)	32(21.3)	-	3.47
Advice on credit facilities	95(63.3)	46(30.7)	32(21.3)	-	3.43
Supply of improved animal stocks	18(12.0)	-	13(8.7)	18(12.0)	3.17
Supply of agrochemicals	31(20.7)	-	31(20.7)	-	3.00
Organization of field meetings	94(62.7)	9(6.0)	69(46.0)	8(5.3)	2.83
Organization of methods, techniques and result demonstrations	103(68.7)	9(6.0)	79(52.7)	7(4.7)	2.81
Supply of tools and equipment	31(20.7)	-	22(14.7)	9(6.0)	2.42
Supply of improved animal stocks	31(20.7)	-	22(14.7)	9(6.0)	2.42
Provision of technical advice	86(57.3)	33(22.0)	24(16.0)	13(8.7)	2.21`
Organization of research linkage workshops	86(57.3)	-	55(36.7)	-	1.92
Supply of tools and equipment	40(26.7)	-	22(14.7)	9(6.0)	1.88
Training on efficiency of production, processing and storage	103(68.7)	22(14.7)	-	73(48.7)	1.78
Training and visits of farmers	103(68.7)	18(12.0)	-	77(51.3)	1.62

Table 5: Distribution of respondents by perception of Extension Agents' activities

Perceptional statements	SA	A	U	D	SD	Mean
Extension agents proffer immediate solution to identified problems.	90(60.0)	60(40.0)	---	---	---	4.20
Improved agricultural technologies are very good from what I have seen on my friend's farms	96(64.0)	---	46(30.7)	8(5.3)	---	3.51
Introduced practices are not compatible with my need and culture	----	---	46(30.7)	55(36.7)	49(32.7)	3.04
I cannot try extension agents recommendation on a limited basis	---	---	46(30.7)	96(64.0)	8(5.3)	2.94
The recommendation from extension agents does not yield good return for me.	---	---	46(30.7)	70(46.7)	34(22.7)	2.84
Extension agents deceived me.	---	---	46(30.7)	63(42.0)	41(27.3)	2.93
I can easily comprehend what the extension agents was talking about on the improved agricultural technologies	35(23.3)	52(34.7)	46(30.7)	8(5.3)	9(6.0)	1.65
Extension agents are not satisfied until every little detail of work is been carried out	---	80(53.3)	62(41.3)	8(5.3)	---	0.57
I do not understand them when they speak about the intention of working with us	---	8(5.3)	46(30.7)	79(52.7)	17(11.3)	0.31
The outcome of extension innovation does not meet up with my expectation.	106(70.7)	44(29.3)	---	---	---	0

Key: SA- Strongly agreed A- Agreed U- Undecided, D-Disagreed SD-Strongly disagreed

Table 6: Distribution of respondents according to their level of perception

Categories	Freq.	Percent	Mean	SD
Not favourable	66	44.0	32.37	2.40
Favourable	84	56.0		
Total	150	100.0		

Table 7: Distribution of constraints militating against adoption of innovation

Constraints	VR	R	OCC	SEL	CPI	Rank
Lack of incentives from government	102(85.0)	15(12.5)	33(22.0)	-	669	1st
Non availability of equipment	84(70.0)	33(27.5)	33(22.0)	-	651	2nd
Lack of fund	67(55.8)	50(41.7)	33(22.0)	-	634	3rd
High cost of technology	91(75.8)	26(21.7)	5(3.3)	28(18.7)	602	4th
Poor communication channel by extension agents	90(75.0)	27(22.5)	-	33(22.0)	591	5th
Lack of adequate extension officer	96(80.0)	-	21(17.5)	33(22.0)	576	6th
Technology not culturally compatible	52(43.3)	65(54.2)	-	33(22.0)	553	7th
Extension agents not friendly in their approach	2(1.7)	115(95.8)	15(10.0)	18(12.0)	533	8th
Villages not accessible	18(15.0)	99(82.5)	20(13.3)	13(8.7)	509	9th
Lateness in supplying input	33(22.0)	58(48.3)	-	59(49.2)	456	10th
Lack of understanding of innovation or processes	20(13.3)	18(15.0)	13(8.7)	99(82.5)	310	11th
Not better than previous practices	13(8.7)	15(12.5)	20(13.3)	102(85.0)	287	12th

Key: VR=Very regular; R= regular; OCC= Occasionally; SEL= Seldom; CPI= Constraint Perception Index

Table 8: Chi-square analysis of socio-economic characteristics of the arable crop farmers and performance of extension agent's activities

Variables	df	χ^2 value	p-level	Decision
Age	2	4.681[a]	0.096	NS
Sex	1	15.611[a]	0.000	S
Marital status	2	8.081[a]	0.018	S
Education	1	17.738[a]	0..000	S
Farm size	1	3.692[a]	0..055	S
Farm experience	2	2.730[a]	0.255	NS