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EFFECTIVENESS OF GENDER PARTICIPATION IN AGRICULTURAL PRODUCTIVITY IN ZURU SOUTHERN GUINEA SAVANNAH OF NIGERIA

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ABSTRACT: The research was conducted to investigate the effectiveness of gender participation in agricultural productivity in Zuru southern guinea savannah, kebbi state. Simple random sampling technique was used to select one hundred and twenty (120) farmers in all while proportionate sampling was used to select 70 males, 50 females from four local government areas (LGAs) of the emirate. Descriptive and inferential statistics (chi-square analysis) was used to analyze the data collected. Results showed that majority (70%) of the female and 37.1% of the male were between 26 – 47 years of age, 90% (male) and 70% (female) had one form of education or the other, and cultivated less than 2 acres of farmland. The female respondents were more effectively involved in marketing of agricultural produce (78.8%) and processing (60.2%) while male respondents were more actively involved in land clearing (55.7%), planting (67.1%) and thinning (77.1%). Lack of credit facilities, lack of government support and lack of access to input were some factors identified to be affecting gender participation in agricultural productivity in the emirate. Chi-square analysis recommended that government should come up with a policy to support agricultural activities in the emirate so as to reduce the problem of food insecurity and hunger in the study area.

KEYWORDS: Effectiveness, Gender Participation, Agricultural Productivity, guinea savannah.

INTRODUCTION

Agriculture is a dynamic concept that comprises a lot of livelihood systems ranging from subsistence production and processing of crops and livestock at household level to more commercialized agriculture. It can be defined as the growing of plants and raising of animals for food and other uses within rural areas and around cities and towns and related activities such as the production and delivery of inputs, processing and marketing products. Ensuring food security and appropriate nutrition of the rural and urban population, in particular the poor households has become a tremendous challenge in many cities in developing countries (FAO, 2007). Growing poverty, hunger and lack of employment opportunities, as well as the special opportunities

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provided by the rural and urban areas, including the growing demand for food, proximity to markets and availability of cheap resources and as organic wastes and wastewater, have stimulated the development of diverse agricultural production system in rural and around cities. These systems are often specialized in perishable products, such as green leafy vegetables, eggs and meat, and exploit vacant open spaces (Pious, 2000).

Agricultural productivity in both urban and rural areas is integrated into the rural and urban economic and ecological systems ; (FAO, 1996). Smit et al., (1996) claims that over 800 million people are estimated to engage in agricultural productivity worldwide; of these, 200 are market producers, employing 150 million people full time. Despite limited support and heavy losses, Agriculture is generating produce valued in the tens of millions of US Dollars, year in year out; (Mougeut, 200). Advocates that agriculture is the mainstay of greater number of Nigerian populace .He pointed out major benefits like it; enables the poor farmer to produce household food, meet some financial obligations, which enhances critical circumstances. It increases the amount of food available and enhances freshness of perishable food items reaching both rural and urban consumers. Case studies have shown that there are different nutritional benefits derived especially among children when poor families farm (IFPRI, 2012). Affordable food releases more incomes for other expenditures, including health and education. And since farmers are more likely to be empowered especially women farmers and is an attractive alternative to informal, poorly paid jobs. He went ahead to advocate that agriculture is important not just to low-income earners, but also to middle-income earners, the unemployed and the underemployed (Okpala, 2003). In Nigeria, agriculture has not received the appropriate public and institutional support despite it significant contribution to food security, poverty alleviation, empowerment and improved human nutrition through the provision of balance diet (Egbuna, 2017). However, population growth in fueling the demand for a timely supply of fresh vegetable and livestock produce can be satisfied through agricultural production. With the increasing human population and high demand for food, there is need for proper food security in the country, so as to intensify the effort of all year-round food production.

Gender analysis in agricultural productivity is essential for policy formulation and Programme planning to ensure equity in resource allocation and a balanced development that benefit both male and female farmers. Consequently, this study was conducted to assess the effectiveness of gender participation in agricultural productivity among farmers in Zuru Emirate, kebbi state. Specially, the study aimed to:

- i. Investigate the socio-economic characteristics of male and female farmers.
- ii. Assess the effectiveness of gender participation in agricultural productivity.
- iii. Identify the factors affecting gender participation in agricultural productivity.

METHODOLOGY

This research was carried out in Southern Kebbi State (Zuru Emirate), Nigeria. Zuru Emirate is one of the four Emirates in Kebbi state. The Emirate comprises of four Local Government Areas

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(LGAs) namely; Danko-Wasagu, Fakai, Sakaba and Zuru. The Emirate is located within latitudes 11° and 12° N and longitudes 4° and 5° E of the equator (NPC. 2006). The state was carved out of the former Sokoto State in 1991; the Emirate is located in the extreme South-eastern part of the state and covers an area of approximately 9,000 square kilometers. It is located on a hilly terrain and is bounded to the north by Gummi Local Government Area of Zamfara State, North-west by Koko Local Government Area, South-west by Yauri Local Government Area, North-east by Bukkuyum Local Government Area of Zamfara State and south by Rijau Local Government Area of Niger state (Girma, 2008).

The estimated population of the Emirate is 582, 106 people (NPC, 2006). The various indigenous cultural and ethnic groups of the Emirate are the Dakkarkari, Fakkawa, Dukkawa, Kelawa, Kambarawa, Katsinawan laka and Achifawa. Other nonindigenous ethnic groups in the area are the Hausa, Fulani, Yoruba, Igbo and other tribes found in Nigeria. The different religions found in the area are Islam, Christianity and traditionalist, like any other African society, these came as a result of the interaction with the outside world (NPC., 2006). However, the traditional worship of different deities is still upheld in the area with many festivals celebrated at various times of the year. The weather is marked by a single rainy season and long dry season, the average rainfall of the area is between 1025mm and 1050mm/annum. Mean temperature range between 31°C and 38°C, the rainy season is between April to October. The climatic condition of the area is characterized by hot and wet seasons as in the tropics; the months of November to February are the hamattan period. The soil type is sandy loam and rich, which makes it suitable for agriculture (NPC. 2006). It is important to point out that production of agricultural goods in pre–colonial Zuru society was geared mainly towards the production of use–values.

This is not to say that exchange did not take place. There was exchange between the produce peasant families and commodities of non-peasant households who specialized in the production of agricultural implements and other necessities which were fundamental in the working of family units. Animal husbandry was practiced side by side with crop production, even though on limited scale. The people of Zuru Emirate depend largely on the pastoral Fulani for meat, milk and butter. Hunting was the second important economic activity after crop production. Hunting was regarded as a supplementary occupation and was carried on throughout the year because it provides a means of getting meat for consumption. It also serves as a source of obtaining skins of animals for shoes, warfare robes and for making local drums. Other important economic activities are local handicrafts like pot-making and weaving by women and blacksmithing by men (NPC, 2006).

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RESULT AND DISCUSSION

Personal characteristics of respondents: findings mentioned in table 1 revealed that the mean age of the male and female respondents was 48.3 years and 42.1 years respectively. This indicated that the respondents are still in their active age category. About 66% of the male and 56% of the female were married. And also 45.7% and 46% of the males and female respondents respectively had secondary education. Thirty percentage of the male and 10% of the female had tertiary education. This may be an advantage on the part of the respondents in seeking information and understanding the techniques involved in the application and adoption of new agricultural technologies. According to Agbamu (2006), education has always been known to positively influence the adoption of improved technologies.

Trading was the major occupation of 34.3% (males) and 38% females followed by agro-processing. The means household size was 9.5 and 8.9 for the male and female respondents respectively. This is contrary to the opinion of some researchers that large household size is only found in the rural areas, although a large household size can be a source of labour on the farm. About 69% and 78% of the male and female respondents were members of one association or another. The data on source of capital revealed that 58.6% and 64% of the males and females obtained capital from personal savings, the number of years spent in farming were 16.4 years (males) and 12 years (female).

This indicates that respondents have been in farming for a long period and would probably have experience in agricultural productivity. Majority (62.8% male and 66% female) of the respondents cultivated less than 2 acres of farmland for agricultural production (with mean acres of 2.8 and 2.2 for male and female respondents respectively). This corroborates with the findings of Salau & Attah (2012) that most farmers cultivated with the difficulty of acquiring land for farming purposes. Studies have shown that most farmers in Nigeria operate on small scale (Aniedu, 2006). More than half (58.6%) of the males and 74% of the females were majority into maize and cassava production and also cultivated other crops such as leafy vegetables, pepper and tomatoes.

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Table 1: Socio-economic characteristics of respondents

Variables	Freq	(%)	Mean	Freq	(%)	Mean
Age	•			-		
< 25 years	3	4.2		2	4.0	
26 – 36 years	9	12.8		8	16.0	
37 – 47 years	17	24.3	48.3	27	54.0	42.1
48 – 58 years	34	48.6		10	20.0	
> 58 years	5	7.1		3	6.0	
Religion						
Islam	39	22.8		28	56.0	
Christian	31	37.1		22	44.0	
Marital status	01	57.1				
Single	16	22.8		14	28.0	
Married	45	65.7		28	56.0	
Divorced	4	5.7		3	6.0	
Widow/widower	4	5.7		5	10.0	
Educational status	7	5.7		3	10.0	
No formal education	9	10.0		7	14.0	
Primary education	10	14.3		15	30.0	
Secondary education	32	45.7		23	46.0	
Tertiary education	32 19	30.0		23 5	10.0	
	19	30.0		3	10.0	
Major occupation	15	21.4		4	8.0	
Civil servant						
Trading	23	34.3		19	38.0	
Artisan	7	10.0		4	8.0	
Agro-marketing	14	20.0		6	12.0	
Agro-processing	10	14.3		17	34.0	
Household size	22	21.4		10	20.0	
1-5	22	31.4		19	38.0	
6 – 10	38	52.3	9.6	23	46.0	8.9
> 10	10	14.3		8	16.0	
Membership of association						
Yes	48	68.6		39	78.0	
No	22	31.4		11	22.0	
Source of capital						
Personal savings	41	58.6		31	64.0	
Family and friends	10	14.3		10	20.0	
Associations	12	17.1		5	10.0	
Bank loan	7	10.0		3	6.0	
Year in UA farming						
1 - 10	18	25.7		15	34.0	
11 - 20	32	45.7		21	42.0	
21 - 30	12	17.1	16.4	9	14.0	12.0
>30	8	11.4		5	10.0	
Farm size						
<2 acres	44	62.8		33	66.0	
2.5 – 4 acres	16	22.8	2.8	11	22.0	2.2
4.5 – 6 acres	6	8.6		5	10.0	
>6 acres	4	5.7		1	2.0	
Types of crop cultivated						
Maize/cassava/yam	41	58.6		37	74.0	
Maize/yam	21	30.0		6	12.0	
Groundnut/cowpea	8	11.4		7	14.0	

Gender participation in agricultural productivity: Table 2 showed the distribution of respondents based on their participation in different agricultural activities. Harvesting of crops ranked 1st

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among the male respondents, this was followed by planting (2nd), thinning (3rd), land clearing (4th) and supplying. The female respondents were very much involved in marketing, processing, and storage as these ranked 1st and 2nd respectively. This corroborates the submission of Damisa *et al.*, (2007) that women are the backbone of the family and are responsible for about 100% of the work of processing of crops and 60% in marketing. He also opined that women farmers from Zuru Emirate, Kebbi State, Nigeria contribute 60% to planting, 95% to weeding and 95% to harvesting crops.

Above all, the result indicated that both male and female respondents were involved in agricultural productivity at different stages from land clearing to marketing, although the women were more into processing. This is in line with Adedayo and Tunde (2013) submission that Nigerian women play major roles in key farming operations such as planting, weeding, and harvesting. Amali (1989) added that women labour input is highest in food production, processing and marketing of both raw and processed agricultural products. As regards the level of participation (Table 3), it can be concluded that women participated averagely in agricultural productivity more than their male counterpart. This may be because participation focuses on people as agents of development. The concept therefore, emphasizes the effectiveness of gender participation in agricultural production as means to agricultural development process. According to Keough (1998), participation is a multidimensional dynamic process that takes varying forms and people will participate in any activity that will be beneficial to them.

Factors affecting the effectiveness of gender participation in agricultural productivity: Table 4 shows the factors that affect gender participation in agriculture. Unavailability of land and lack of access to credit were some of the factors identified by both male and female respondents as these ranked 1st and 2nd. According to Simetele & Binns (2008), access to land is a major constraints in agricultural productivity.

Table 2: Level of gender participation in UA

Participation level	Male	Female	
High participation	12 (17.1)	0 (0.0)	
Average participation	53 (75.7)	42 (84.0)	
Low participation	5 (71)	8 (16.0)	

Percentages are in parentheses.

Competition and power of ownership of land and legitimate land users has led to shrinkage of farmlands in many areas of agricultural importance. Also, lack of credit facilities has always been a problem to small scale farmers and this can also discourage both men and women from engaging in agricultural productivity. Other factors identified by respondents were lack of access to farm input, unavailability of market linkage, unfavorable weather condition, lack of government support for agricultural production and soil infertility other factors identified by male respondents include soil fertility (mean = 2.23; ranked 3rd), lack of access to farm inputs (mean=2.20); ranked 4th). Relationship between selected personal characteristics of respondents and level of participation in agriculture: The table above shows the level of participation in agricultural production. Participation is largely affected by age, household size and many other variables. Ekong (2003)

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opined that the motive behind farming is not primarily for sale but as a means for individual to contribute to family household-food security so as to reduce expenses on food and enhance family income. Also, Geldof (1994) submitted that people will participate in any activity that will be of benefit to them and this may have no significance with age, household size, farm size or gender. Educational status was significant to male participation in agriculture and this is in line with Agbamu (2007) submission that education is important and very useful especially when farmers need to comprehend the technicalities involved in technology adoption and continued use.

CONCLUSION AND RECOMMENDATIONS

The study concluded that both male and female were found to be effectively participating in agricultural productivity in different ways from land preparation through weeding to marketing and storage but at different levels of participation. Though, inadequate access to credits, land, farm inputs and lack of government support discouraged the effectiveness of gender participation in agricultural productivity. The study supports encouraged participation of male and female in agriculture because of its potentials and multidimensional benefits of achieving food security among household. In view of the need to supply nutritionally adequate and safe food to greater number of Nigerian populace, there is need to encourage agricultural production by the government by documenting a policy in support of gender specific roles in agricultural productivity. Ensuring the availability and affordability of farm inputs to farmers is also paramount to increasing agricultural productivity. There is also the need for the government to create an enabling environment for both rural and urban farmers through an institutionalize framework that will link them to formal sources of credit. Efforts to achieve food security must be an overall drive to eradicate poverty and promote sustainable development of the society as a whole through increased participation in agricultural productivity.

REFERENCES

- Adedoyo, A & Tunde, A.M (2013). Challenges of women in urban agriculture in Kwara state, Nigeria. Sustainable agricultural research. 2 (3), 8 14.
- Agbamu, J.U (2006). Essentials of agricultural communications in Nigeria. Malthouse press limited, Lagos.
- Amali, E (1989). The role of women in agricultural development process. Development studies review, 3 (1 2), 52 60.
- Aniedu, C. (2006). Gender factor in access and use of improved yam technologies by farmers in southwest Nigeria. Unpublished PhD thesis, department of agriculture, Umudike.
- Bryld E. (2003). Potentials, problems and policy implications for urban agriculture in developing countries. Agriculture and human value. 20, 79-86.
- COAG/FAO. (1996). (Committee on agriculture, food and agricultural organization of the united Nations). Urban and peri-urban agriculture. COAG 99 10. Presented at 15th session of the COAG, FAO Rome 25 29 January 1999.
- Ekong, E.E. (2003). An introduction to rural sociology. Dove educational publishers, Uyo, Nigeria.
- Egbuna, N.E (2017). Urban agriculture: A strategy for poverty reduction in Nigeria. Accessed from ecomod.net.site retrived on 25/01/2017

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- FAO (198). Urban and peri-urban Agriculture. Food and agricultural organization of the United Nations.
- Geldof, L (1994). Community empowerment, social mobilization in Nigeria. UNICEF publications.
- IFPRI (2002). Sustainable food security for all by 2000. Int. Food Policy Research Institute 2033k. Keough N (1998). "Participatory development principles and practices: Reflections of a Western development worker". Community Development Journal, 33 (2).
- Kiguli L. N., A Nawagaba D. Mwesigwa & J. Kiguli (2003). Access to land in Campala. Urban agriculture magazine. 11,11-12.
- Pius, C. (2010): Urban farming: A way out of the job market in Nigeria accessed from www.cityfarmer.info.retrived on 25/01/2017
- Salau, E.S and Attah A.J (2012). A socio-economic analysis of urban agriculture in Nasarawa State, Nigeria. Production Agriculture and Technology (PAT), 8 (1), 17 29.
- Samatle D. M & T. Binns (2008). Motivation and marginalization in Africa urban agriculture: the case of Lusaka, Zimbabwe. Urban forum, 19(1), 1-12.
- Smit J, Nasr J. & Rattu A. (1996). Urban agriculture: a neglected resource for food, jobs and sustainable cities. New York: UNDO.
- Tomori, M.A (2017). Ibadan metropolitan area and the challenges to sustainable development accessed from macosconsultancy/com/Ibadan m.