

**THE ROLE OF NATIONAL AGRICULTURAL ADVISORY SERVICES (NAADS) IN
PROMOTING FOOD SECURITY OF HOUSEHOLDS IN UGANDA: A CASE STUDY
OF BUGANGARI SUBCOUTY RUKUNGIRI DISTRICT**

BY

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DEDICATION

I dedicate this work to my beloved parents Mr. and Mrs. Kakyebezi Eric and the entire family who supported me financially and spiritually. I am also grateful to all my friends especially Moses Wafula who helped me through the entire process of research.

DECLARATION

I Karuhanga Anna declare that this research report is a result of my knowledge and hard work and that has never been submitted to this University or any other University / Institution for any academic award. Thus, this work is my original, a result of my own research, and where other people's research was used, the authors have been dully acknowledged.

Signature.....

Date.....14/08/2014.

APPROVAL

This is to certify that this research report has been done under my supervision.

Sign. 

Date: 14/08/2014

MR. IVAN MUHWEZI
(SUPERVISOR)

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LIST OF ABBREVIATIONS / ACRONYMS

NAADS	National Agricultural Advisory services
FEWNET	Famine Early Warning Network
MAALF	Ministry of Agriculture, Animal Industry and Fisheries
MPED	Ministry of Finance, Planning and Economic Development
FSF	Food Security Farmer
MOF	Market Oriented Farmer
ATAAS	Agricultural Technology and Agribusiness Advisory Services
M&E	Monitoring and Evaluation
UDN	Uganda Debt Network
SPSS	Statistical Package for Social Scientists
BMAU	Budget Monitoring and Accountability Unit

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ABSTRACT

National Agricultural Advisory Services (NAADS) is a semi-autonomous public agency in the ministry of Agriculture, Animal Industry and Fisheries. It is responsible for public agricultural advisory or extension services. The NAADS programme was created in 2001 to enable rural poor farmers' access agricultural information, knowledge and improved technologies. NAADS is currently being implemented in all districts, municipalities and sub counties of Uganda (New vision, Wednesday, May 28, 2014 pg3). It has been hailed by the government officials as having played a great role in promoting food security of households in Uganda through provision of services and agricultural inputs to improve agricultural productivity and hence ensuring food security in the local communities. The aim of the study was to find out the role of NAADS in promoting food security of households' in Uganda in order to suggest ways of improving the performance of the NAADS Programs. The research reviewed different authors and scholars, journals, brochures and articles that discuss the performance of NAADS in promoting food security of the local communities in Uganda. The research was a descriptive study that employed both qualitative and quantitative approaches of research. The study findings revealed that majority (62.2%) of the respondents agreed that NAADS has transformed the agricultural sector of Bugangari sub county through providing advice on the type of crops to plant, spacing of crops and the type of soil which is better for a given crop. This is evidenced by the improved yields per household in the sub-county. The challenges found by the study indicate that NAADS officials take long to visit the farms, changes in weather affects the growth of crops and that political interferences affected the operations of their activities. Respondents suggested an increase in funding, such that they have enough in puts and that politicians should avoid politicizing the programs. In conclusion, the findings in the research indicate that the NAADS program has benefited some people of Bugangari Sub County. However this contradicts with the presidents findings where he wanted to scrap off the program.

Basing on the findings, the researcher recommends increased in beneficiary participation in the NAADS programme implementation particularly at the low level. In addition more sensitization and training is also needed because most farmers who joined NAADS recently are not well conversant with it and the government should increase funding the NAADS program since it is impacting positively on promoting food security and the standard of living for the people of Bugangari sub county.

CHAPTER ONE: INTRODUCTION

1.0 Introduction

This chapter presents the background of the study, which explains food security as having access to sufficient food for a healthy and productive life, Problem statement, and the objectives of the study, the research questions, the scope and justification of the study.

1.1 Background

Food security can only be achieved "when all people at all times have access to sufficient food for a healthy and productive life, and has three main components: food availability, food access, and food utilization" (Haddad, 1997). This entails creating effective and efficient agricultural systems that supply food and foster utilization of natural resources in a sustainable manner. Although "agriculture is the principal engine of growth in many low-income developing countries, where it accounts for 60 to 80 percent of all employment" (CGIAR 1995), food security should also be linked to environmental, social, cultural, political and institutional aspects of society (Forno 1999). However attaining food security to reduce the number of people who go without food in the world continues to be one of the serious challenges in current times MFPED (2012) report: The government of Uganda is striving to achieve two main development outcomes in the agricultural sector this year. These include; increasing rural incomes, livelihood and improving household food and nutrition security. FEWNET (2011) report: One of the programs intended to deliver these outcomes is through the National Agricultural Advisory Services (NAADS). (NAADS) is a programme which was introduced to increase the efficiency and effectiveness of agricultural extension services (NAADS, 2001). It is implemented through the Ministry of Agriculture, Animal Industry and Fisheries (MAAIF). NAADS is a semi-autonomous body formed under the NAADS Act of June 2001, MAAIF (2011) report. NAADS programme was created in 2001 to enable rural poor farmer's access agricultural information, knowledge and improved technologies. It is mandated to develop a demand-driven, farmer-led agricultural service delivery system targeting poor subsistence farmers, with emphasis on women, men and youth. Its implementation started in July 2001 and by the end of financial year 2007/2008, its target was to cover 79 districts and 748 sub-counties of Uganda, directly benefiting more than 900,000 farm households and to cover 1033 sub-counties by the end of

financial year 2008/2009 (NAADS, 2008). The NAADS development goal is to enhance rural livelihoods by increasing agricultural productivity and profitability in a sustainable manner (NAADS, 2000) report. However, recent data suggests that food insecurity in Uganda is increasing in parallel to the declining contribution of the agricultural sector to the economy from 18.3% in FY 2005/06 to 13.9% in 2010/11(MFPED, 2011). Since agriculture is the sector that employs and feeds the majority of Ugandans, the Government has prioritized a number of initiatives to enhance the contribution of the sector to the economy in general and food security in particular. A significant proportion of funding in the agricultural sector is channeled to farmers through 2 types of grants: (i) Food Security Farmer (FSF) Grants and (ii) Market Oriented Farmer (MOF) Grants under NAADS. A group of people have been employed at the grass root level for proper use of these Grants to improve on food security of households in Uganda.

1.2 Definition of key terms

According to the Food and Agriculture Organization report (FAO,2011), food security "exists when all people, at all times, have physical and economic access to sufficient, safe and nutritious food to meet their dietary needs and food preferences for an active and healthy life.

Three main elements are considered in defining food security: food availability, where food must be available in sufficient quantities and on a consistent basis; food access, where people must be able to regularly acquire adequate quantities of food through purchase, home production, barter, gifts, borrowing or food aid; and food utilization, where consumed food must have a positive nutritional impact on people.

The 1974 World Food Conference report referred food security as a state being food secure when there was sufficient food to "sustain a steady expansion of food consumption and to offset fluctuations in production and prices".

National Agricultural Advisory Services (NAADS) is a semi-autonomous public agency in the ministry of Agriculture, Animal Industry and Fisheries. It is responsible for public agricultural advisory or extension services (New Vision, Wednesday, May 28, 2014pg 3).

Relating to the study food security refers to the state when there is enough food for the family and the balance kept in their granaries to sustain them in the period when there is drought and not enough food.

1.3 Problem statement

It is now thirteen years since the inception of the NAADS, the programme may have increased on the efficiency and effectiveness of agricultural extension services, introduced new crops like rice, bananas, beans, Irish potatoes and coffee, advised on the type of soil to grow crops, spacing while planting and how to control pests and diseases although there seems to be very little difference between farmers output and productivity today compared to thirteen years ago before the introduction of NAADS programme. Is it because it's not playing its role in promoting food security of households in Uganda? Or is it because of other challenges other than NAADS? Because despite the fact that NAADS has had some contribution towards promoting food security of households in Uganda, there seems to be food shortages and poverty, increase in diseases and pests infestation and the program seems to be experiencing with a number of challenges in monitoring and evaluation, management challenges related to staffing and implementation challenges and many others. However, there is still a gap in the role played by NAADS in ensuring food security. Therefore, this study seeks to find out ways in which the NAADS program can help farmers cover those gaps in promoting food security of households in Bugangari Sub County and Rukungiri district in general.

1.4 The general objective

To find out the role of NAADS in promoting food security among households in Uganda in order to suggest ways of improving the performance of the NAADS programme.

1.5 Specific objective

1. To assess the contribution of NAADS towards promoting food security among households in Bugangari sub-county.
2. To identify the challenges faced by NAADS in promoting food security of households in Bugangari sub county.
3. To find out the solution to the challenges of NAADS' role of promoting food security of households in Bugangari sub county.

1.6 Research Questions

- I. What is the contribution of NAADS in promoting food security of households in Bugangari Sub County in Rukungiri district?
- II. What are the challenges facing NAADS in improving food security of households Bugangari sub county.
- III. How can these challenges facing NAADS in promoting food security among households be addressed?

1.7 .Scope of the Study

The scope of the study involves the Geographical scope, Time scope and the content scope.

1.7.1. Geographical scope

The study investigated the role of NAADS in promoting food security of household in Bugangari sub county, Rukungiri district. Bugangari sub county is composed of seven parishes which include; Bugangari, Kasindiro, Kashayo, Nyabitete, Burama, Kakindo and Kyaburere. Rukungiri District is bordered by Rubirizi District to the north, Mitooma District to the east, Ntungamo District to the southeast, Kabale District to the south, Kanungu District to the west and the Democratic Republic of the Congo to the northwest. The district headquarters at Rukungiri are located approximately 385 kilometres (239 mi), by road, southwest of Kampala, Uganda's capital city. The coordinates of the district are; 00 47S, 29 56S. The main economic activity of the district, like the rest of the country is agriculture .More than 90% of the population is engaged in farming. In the sub county of Bugangari, production is subsistence although the soils are very fertile and with potential for intensive commercial farming. The two chief cash crops grown are coffee and mangoes and the food crops are rice, bananas, Irish and sweet potatoes among others.

1.7.2. Time scope

As much as NAADS started in 2001, its services were extended to Rukungiri in 2005. And for this reason the research covered the period from 2005 to 2014, NAADS expanded into the sub counties of Rukungiri, bringing high hopes of developments in agriculture. Therefore the study will be limited by the objectives of the study and will take place for a period of four months from April 2014 to July 2014.

1.7.3. Content scope

The study investigated NAADS role in promoting food security of households in Bugangari, Kasindiro, Kashayo, Nyabitete, Burama, Kyaburere and Kakindo parishes of Bugangari sub county Rukungiri district.

1.8. Justification of the study

The study would contribute to the existing body of knowledge through an empirical investigation into popular participation in development programmes in Uganda and its contribution to their outcomes.

The research findings would be a useful source of information for farmers, the National NAADS Secretariat, and country-wide NAADS Coordinating Units especially in Rukungiri district with a view to improving the programme's implementation.

The research findings would also be a useful source of information for researchers, development practitioners and public policy formulators and analysts in Uganda and beyond.

1.9 Significance of the study

The study findings would be useful to the farmers to devise means by use of researched knowledge provided by the research to eradicate poverty through improved productivity of crops and livestock, efficiency, marketing as well as addressing other problems such limited knowledge of the farmers, poor farming methods and dependency on nature. The findings from the study are expected to help farmers reap maximum benefits from the NAADS program.

It is also hoped that the findings would be used in providing the basic knowledge to the coordinators of NGOs such as African Highlands Initiative (AHI). Area Based Agricultural Modernization Policy (AAMP) and other agencies involved in agricultural production.

The main output of this study is the research report which would help the researcher to obtain the award of a Degree in Bachelor of public administration at Kampala International University

The findings are expected to be useful to the policy makers who are involved in designing NAADS policies especially those who are working at NAADS Secretariat as well as policy makers who are operating at district and Sub county levels.

Similarly, it is envisaged that the findings would be useful to implementers of NAADS at the grass root levels such as Sub County Chiefs, Local councilors and district officials in the production department in sensitizing and mobilizing the farmers on how to address their agricultural problems.

CHAPTER TWO: LITERATURE REVIEW

2.0 Introduction

This chapter reviews literature as an account of the knowledge and ideas that have been established by accredited scholars and experts in the field the roles of NAADS in promoting food security of households. The promotion of food security of households was done by NAADS to provide quality advisory service to farmers, varieties of crops and livestock enterprises, promotion of post-harvest and modern agricultural production technologies. However, the NAADS and farmers have faced challenge like high turnover of staff, political interference, natural and environmental factors. The chapter also viewed the solutions such as advising farmers on early planting and what to plant in which soil, strengthening the establishment of research centre in all the regions among others.

NAADS Master Document (2000) states that the planning processes in the NAADS programme are expected to be participatory. It was noted that the primary plans were to originate from the Farmer Groups. Plans were expected to be generated through group discussions (Participatory Rural Appraisal (PRA)-led) as well as consensus building and collaborative learning approaches. The aggregation of the plans is expected to be undertaken at the sub-county, district, and national levels. To make the process as transparent as possible, guidelines based on criteria developed from the NAADS principles were to be developed at national level and disseminated to the lower levels.

The master document further points out that to achieve the above, the NAADS programme would ensure effective farmers' orientation and mobilization. A core function of the NAADS programme was to facilitate farmers to acquire and enhance their capacity to access and take charge of the structures and processes that drive the advisory services. For this to happen, mobilization and then orientation of farmers so as to acquire new basic attitudes and capacities that enable them to effectively control the NAADS would be done. The orientation programme aims at developing farmer institutional capacities in four main areas namely: Definition and appreciation of the NAADS principles, procedures and conditionalities relating particularly to tendering, contracting and reporting; planning, monitoring, and evaluation, including needs assessment, gender and poverty issues. Other areas include group dynamics and the instilling of

specific skills related to group activities through formation of farmer groups and fora, and finally the multi-stakeholder dynamics where farmers both female and males meet other stakeholders, such as input suppliers, traders, credit suppliers, and advisory service providers, to negotiate and learn about prices, quality standards and other relevant issues (Ibid., 16).

NAADS Master Document (2000) generally provides a planning framework for NAADS implementation in a participatory manner. However, bearing in mind that planning is one thing and implementation is another, there was therefore need to systematically investigate whether the participatory approach that is presented in the NAADS master document is actually implemented on the ground and how it impacts on outcomes.

2.1 The Promotion of food security among households.

According to Benin et al (2004), basing on observed differences across the NAADS and non-NAADS sub-counties, it appears that the NAADS program is having substantial positive impacts on the availability and quality of Advisory Services provided to farmers, promoting adoption of new crop and livestock enterprises as well improving adoption and use of modern agricultural production technologies and practices. NAADS also appears to have promoted greater use of post-harvest technologies and commercial marketing of commodities, consistent with its mission to promote more commercially-oriented agriculture. However, despite positive effects of NAADS on adoption of improved production technologies and practices, no significant differences were found to yield growth between NAADS and non-NAADS sub-counties for most crops, reflecting there are still low levels of adoption of these technologies even in NAADS sub-counties, as well as other factors affecting productivity.

Similarly, Benin Ibid (2004) noted that NAADS appears to be having more success in promoting adoption of improved varieties of crops and some other yield enhancing technologies than in promoting improved soil fertility management. This raises concern about the sustainability of productivity increases that may occur, since such increases may lead to more rapid soil nutrient mining unless comparable success in promoting improved soil fertility management is achieved. Continued emphasis on improving the market environment, promoting adoption of more remunerative crop enterprises, and applied agronomic research, identifying more effective ways

to profitably combine inorganic and organic soil fertility measures in different crop systems can help to address this problem.

According to Tukumwire (2007), most of the goats in Mbarara are South-African boar goat breed crosses which were introduced under NAADS program. The politicians who are complaining should visit cattle markets. They will find out that boar goat crosses outnumber our indigenous goats. The boar goat crosses have a high growth rate and can weigh 30kgs within six months. Sixty percent of them produce twins. This is the same experience in Rukungiri district, the boar goats have been imported from South Africa and a few farmers are rearing and crossing it with local breed, although this does not contribute much in promoting food security of the local communities.

Tukumwire also noted that traditional banana growing areas were Bushenyi district and Rwampara areas. But with the introduction of NAADS the situation now is that in Bugangari and Nyakagyeme sub counties are also producers of bananas. On a daily basis over 10 Fuso Lorrie ferry matooke (plantain) from Rukungiri district. Now in western Uganda, what is being emphasized is not just cutting bunches of matooke for the sake, the bunches should be big. If one has a quarter acre of land, his target is to harvest 40 to 50 bunches per month. However, most of the bananas are produced for sell because the local communities prefer the local bananas, than the bananas introduced by NAADS. The bananas not nice they are just big in size “. More of quantity than quality”. They are produced by few farmers that’s why food security is still a problem.

Oryokot (Farmers Voice 2004), says that NAADS focus is only looking at agriculture as a business and as an enterprises than what we have always known; that agriculture is a major economic activity. He further says that NAADS is built on the paradigm shift from “everybody grows what he/she eats” to “we want people to do their best so that they can maximize production”. However, he does not directly address the issue of food security.

Nalidy (Farmers Voice October 2004), adds that NAADS aims at improving access to marketing formation, bring technology close to the farmers and all other facts that concern agriculture. He says that they are taking an enterprise approach; this is making agriculture a business enterprise,

which is not a sector for consumption. In other words this does not promote food security in any way.

According to Opondo et al (2006), as was expected, this pilot activity met with numerous challenges: farmers' understanding of NAADS and group management requires more time; understanding of roles and responsibilities were weak; and poor accountability, among others.

Much as a lot of positive results accruing from the implementation of NAADS were pointed out in the literatures reviewed, poverty level in the country is still high standing at 31.1% as of December 2009 (UBOS estimates). This implies that the high performance in the NAADS program could be selective rather than applicable to all the farmers in the country where the program is being implemented. This is one of the reasons why this research had to be conducted in order to find out the role of NAADS in Bugangari Sub County.

In a study done by Tweheyo and Katushemererwe (2006), it was found that NAADS had contributed much in promoting food security of the local communities in Uganda. These among others included improvements in crop production that has boosted food security in the country. Other contributions include modern farming methods, introduction of temperate fruits like apples and mangoes, improved seeds like Irish potatoes, improved extension delivery systems and fish farming. Others include; introduction of modern storage like raised stores, farmer extension delivery, and modern farming. However this has contributed much to those farmers with much capital over the poor farmers who cannot afford and manage the modern farming systems.

Ayo (2009) noted that post handling and storage of food crops has also increased and improved with NAADS improved methods of food storage and preservation. There is improvement in livestock management as a result of NAADS program. However, there was the problem of lack of veterinary medical officers to provide extension services coupled with high costs of these extension services.

2.2The challenges facing NAADS in improving food security of households

Despite the major achievements noted by the assessment, the programme is still faced with some challenges, as highlighted during the assessment. This section of the report highlights some of the challenges faced by the programmes' performance. Major challenges identified were related to staffing, programme design, management, implementation and funding, related along other factors such as environmental and natural factors that affect the work of the programme.

Kristin et al (2013), noted Management challenges related to staffing, where she reported high turnover of staff in the programme especially the coordinators, due to perceived political interference in the programme attributed to incidences of open humiliation during public events; 'NAADS advertises almost every day in the newspaper, mainly due to the very high staff turnover. According to UDN Report, (2010) some politicians want to use the NAADS programme as capital for their political career as well as an income source. They perceive themselves as the contract persons who supply the inputs which are a clear conflict of interest. This contravenes the programme guidelines and Leadership Code of conduct in areas where they are supposed to provide an oversight role in the programme to ensure proper implementation. This was critically working against commitment from NAADS technical extension staff in the programme, leaving farmers without extension services and guidance. Some staff feel disempowered to take the appropriate decisions for the benefit of the programmes. However, the writer does not show us how the high turnover in NAADS relates to lack of food security.

In addition, the UDN Report also noted a major challenge in the implementation of the programme in the staffing especially at the sub-county where staff in the production department was few. This was worsened by lack of office equipment like computers and their accessories to store data at the sub-counties on the details of NAADS Programme. Furthermore, the few staff available at the sub-counties was not technical in production. This affected the quality of extension services to the farmers, as most were actually community development officers.

According to the BMAU Report, (2012)it noted that there was a challenge of weak monitoring and supervision system. There was inadequate follow-up of NAADS activities especially at the sub-county level by the district team. This was coupled with little involvement of group members in the initiatives to ensure M&E were functioning effectively. In some instances, only group leaders were called to the sub-county, with no mechanism of delivering feedback to the

rest of the group members. This bred mistrust, lack of transparency and abuse of such process as the rest of the group. The assessment noted a lack of documentation in the programme. In almost all sub counties in the district, it was not easy to get clear records on the programme. The improper records and documentation systems had a bearing on the quality of programme tracking, monitoring and lessons learnt generated from the programme to inform future programming (BMAU, 2012). In addition, the same report noted inadequate logistical support to the production department in terms of means of transport. It limits the ability of staff to properly monitor the programme implementation, and adequately reach out to beneficiaries with instant advice.

The Ministry of Finance, Planning and Economic Development Report, 2012 highlighted programme implementation Challenges, where the procurement process was overwhelmed. The report noted that all districts advertise at the same time for supply of similar inputs to the few competent suppliers. This was noted during the assessment as posing competition in supply of the same or similar inputs among suppliers, making it hard to guarantee quality. Worse still, the procurement designs were not locally appropriate and developed. In some districts and groups, there were challenges related to choosing group members. Some groups were composed of relatives leaving out the larger community members without the capacity to organize the means to benefit from the programme as expressed by one respondent who said: '*It has become almost a family thing*', with the very poor and marginalized community members who cannot easily mobilize funds, often being left out are left out (MFPED, 2012). The same report noted a delay in supplying seedlings / seeds to farmers. This was a challenge especially where the districts take time to disburse money to the sub-county. Furthermore, the challenge of voluntarism to do communal work affects group work as the model farmers are expected to impart the skills to other farmers without any value or reward on their time to do this effectively.

Beneficiaries noted the inadequate and late delivery of seeds past the planting season. For example, in Rwampara village in Mbarara district where in the previous year, seeds were delivered late. Related to the above is the high expectation of farmers, who want to benefit individually and directly. For most of the inputs delivered, the bulk of it was delivered to the model farmers and most farmers in the groups got very little and yet the trickledown effect from the model farmers to other farmers was not seen.

*“....Imagine four bags of cassava cutting for 20 group members. This is so demoralizing! There is no benefit seen except the model farmer who is benefiting.....”*Inadequate linkage to available markets and lack of access to better markets was reported as discouraging many farmers who would have undertaken profitable enterprises under the programme. Corruption is certainly a big problem that has affected NAADS. Certain inputs supplied together with the technologies are being diverted to other use; for example, the iron sheets and cement supplied for construction of animal houses are being sold off, while the supply of inputs has been severely abused with poor inputs delivered to farmers. For instance, prices of inputs have been shiked for very poor quality. Cassava inputs and goats were very expensive (450,000/= for very small goats) were supplied to the farmers as new technologies provided by the programme, which negatively reflects on the value for money from the programme. There is conflicting information on the NAADS programme that confuses the beneficiaries as well as implementers especially the aspect related to the numerous changes made to the programme implementation guidelines in NAADS, which created a lot of inconsistency in implementation.

In Karamoja, UDN, (2010), identified a challenge of inadequate supply of water and the harsh environmental conditions, all this affected survival of the enterprises. For example, rearing of improved goats is quite difficult because of the harsh environment. The methods to rear the animals under NAADS which is not ideal for the environment and known practices of rearing animals in the region – free range animal rearing Compounding the situation are the strict Municipal Council regulations that prohibit animals from being on the streets – this further subjects beneficiaries to adhering to their traditional methods of free range, where animals loitered freely (UDN, 2010).

2.3The solutions to the challenges faced by NAADS roles in improving food security

This section documents inputs to solutions with the aim of strengthening current gains of the programme.

According to MFPED, 2012, the program should review its strategy of selecting only one person from a group of 25 members to be given the technology; instead, more members should be supplied with the technology group. The Karamoja people are used to rearing their animals in the open fields where the animals feed on their own while the NAADS programme requirement for

rearing improved animals require following improved standards such as feeding the animals, enclosing them in the shades and animal houses a practice that is not known to the local Karamoja people and greatly inhibited by the climatic conditions in the areas to ensure required guidelines for rearing improved animals are met.

In addition, NAADS programme should strengthen the establishment of research centres in all the regions. This will improve on generation and development of local technologies that can easily adapt to the local conditions and environment. This will further enhance the ease of multiplication of the traditional local seeds and breeds that can be replanted, as opposed to the improved varieties that are only planted once (UDN, 2010).

According to Okoboi et al (2013), they advise that the secretariat should establish and strengthen the monitoring and supervision structures and systems right from the centre down to the lower levels. This should include the involvement of various stakeholders in the M&E system and should include strengthening the whistle blowing policy at the community level to address corruption and mismanagement of the programme. For example, all LC I structures should be actively involved in the group selection processes, since they know all members of their community, to reduce abuse at selection processes where only family members may form a group. Additionally, learning across different groups, sub-counties and districts can reinforce programme outcomes. It should therefore be promoted as a good practice and practical learning approach to strengthen farmer groups and the programme as all. Challenges, lessons learnt and best practices should be documented and shared with farmers. This will help overcome challenges.

Kristine et al 2013, recommends that, Local and donor governments must support scientists and research; focus research on products and crop varieties that are locally adopted and will be accepted by farmers who are in most cases also the customers. In addition, Procurement processes and procedures should be revised and should be good to utilize the Public Procurement and Disposal of Assets (PPDA) strategy and systems to avoid the abuse of the procurement process and procedures by contractors for monetary gains at the expense of input quality. To effectively manage the process, everyone involved in the procurement process should be trained in the PPDA procedures. Procurement of technologies should be made either from within or from the neighboring districts as a way strengthening local capacity and what is locally known

and available to the people. As a matter of fact, the selection of enterprises should aim at helping farmers pick what they are familiar with and is simple to manage and available to them

According to the international food policy research institute, 2007, there is need to create clear lines between oversight and actual implementation roles in the implementation of NAADS to reduce and address interference in the programme between technocrats and political leaders. This will ensure that district technical staff does commit themselves to actively work in the programme and ensure a stronger oversight role in the programme. Furthermore, As much as possible, fund remittance to the districts and sub-county should be timely to avoid delays in the provision of inputs. Where possible, consideration should be made to address related challenges of access by extension staff to the programme, by providing them with transport and other monitoring support to be able to reach out to the farmers more regularly and frequently.

To ensure increased outcomes from NAADS, diversification should spread beyond merely agricultural development to other complementary activities that supports production. Where possible, the assessment recommends that NAADS should introduce non-agricultural based trades/enterprises such as business development and financial services to farmers as a means to provide startup capital to farmers to increase their productivity (IFPRI, 2007).

On strengthening the marketing and value addition in the programme, the assessment recommends the establishments of farmers' cooperatives in each district as a means to improve on the quality of produce through proper storage, strengthen farmers bargaining power through stronger negotiation and bargaining capacity to get better returns from their goods. Where the programme capacity is limited, it will be essential to link it with other upcoming programmes such as NUSAF II, CAIP to provide added value, market and access to opportunities beyond NAADS (UDN, 2010).

A Report released by Economic policy research centre in 2011 advised that, to generate greater benefits from the programme; the design, implementation and management should pay attention to the environmental political, social, economic, physical and cultural dynamics and its influence on the programme. In addition the report further recommends that the programme should incorporate context-specific and geographical factors of different areas within the programme

design and setting of different areas. For example, Karamoja region’s contextual differences must be adequately reflected in the design and implementation and M&E guidelines (EPRC, 2011). However this is missing in most reports from western Uganda. This research tried to advice on this.

2.4 Conceptual frame work

Fig. 1: The Conceptual Framework

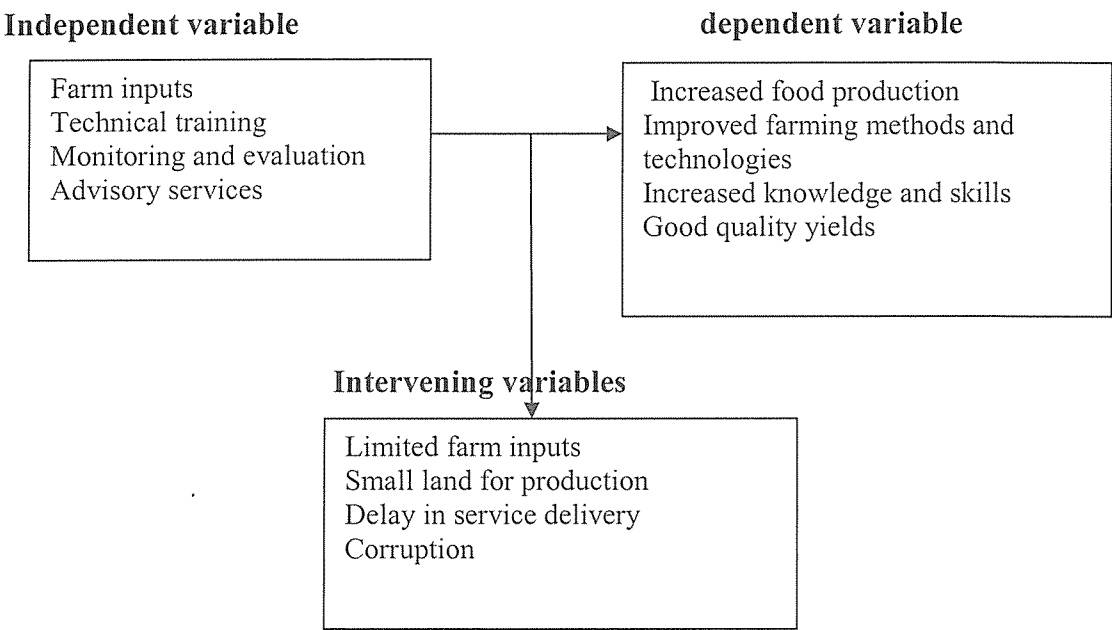


Fig 1 above: The conceptual framework is a diagrammatic representation showing the relationship the study seeks to investigate between the key variables of the study in relation to the extraneous variables. In this study the conceptual framework shows the relationship between national agricultural services the independent variable and food security the dependent variable. The conceptual framework also includes the extraneous variables that are assumed may affect the level of food security alongside the independent and dependent variables and further shows how the attributes of both the independent and dependent variables as further shown diagrammatically above. In other words the NAADS programs will influence food production. According to Benin et al (2004), the NAADS program is having substantial positive impacts on the availability and quality of Advisory Services provided to farmers, promoting adoption of new crop and livestock enterprises as well improving adoption and use of modern agricultural production technologies and practices.

CHAPTER THREE: METHODOLOGY

3.0 Introduction

This chapter comprises of a brief description of research design, area and population of the study, sample size and selection, methods of data collection, data analysis, quality control, ethical consideration and dissemination of results.

3.1 Research design

This was a descriptive study, where both qualitative and quantitative techniques of data collection was employed to find out information from farmers using quantitative technique and for sub county chief, coordinators and other leaders using qualitative technique to get specific data on the role of NAADS in promoting food security.

3.2 Study area and population

3.2.1 Study area

The study was carried out in all the seven parishes of Bugangari Sub County, Rukungiri district. These parishes include; Bugangari, Kasindiro, Kashayo, Nyabitete, Burama, Kyaburere, Kakindo.

3.2.2 Study population

The study population included farmers in Bugangari Sub County, sub county leaders and agricultural extension workers in the sub county.

3.3 Sample size and selection

3.3.1 Sample size

The study sample size was 74 respondents arrived at by the following calculation below using Yamane (1967:886) formula for proportions. A level of precision of 5% was used.

$$n = \frac{N}{1+N(e)^2}$$

Where n = sample size

N = Population of farmers in involved NAADS program in Bugangari sub county

e = level of precision

$$n = \frac{90}{1 + 90 (0.05)^2} = 73.5$$

Therefore, 74 farmers were needed for this study

3.3.2 Sample size selection

Study respondents were obtained using random sampling and purposive technique. Random sampling was used with Farmers on the basis of those who can be accessed and purposive was used with district leaders, coordinators and sub county chiefs to find out specific information or data.

3.4 Data Collection Methods

Data was collected using closed-ended questionnaire and Focus Group discussions that interviewed farmers in order to collect quantitative data about the role of NAADS program in promoting food security. Key informant interviews were carried out with sub county leaders and the NAADS agricultural extension workers during the survey.

3.5 Data quality control

For all the respondents the researcher used Interview guides and closed-ended questionnaires which helped to avoid unnecessary answers from the respondents in order to find out quality information or data.

3.6 Data Analysis

Information was filled, edited and coded. Analysis and interpretation was made around common concept, theme and emerging issues. The data was entered and analyzed using descriptive method and percentage mean

3.7 Ethical Consideration

Permission to conduct the research was sought from Kampala international university, directorate of research and undergraduate studies, the sub county chief executive officer and the local leaders. There was need to translate the questionnaires since some of the respondents were

illiterates. Consent was also sought from the respondents (farmers). Confidentiality was maintained by using anonymous questionnaire.

3.8 Dissemination of results

The results were disseminated by giving a copy to Kampala international university, directorate of research and undergraduate studies, the sub county leaders and the NAADS agricultural extension workers.

3.9 Limitations

The researcher faced a number of problems that could affect the research findings or the stipulated time for the research. Some of these problems included the following.

Financial limitations: To do any research successfully a good amount of money should be used on the different expenses like printing and other secretarial work, transport, paying any support staff among others. Since the study was carried out in Rukungiri district, the researcher traveled to Rukungiri thus incurring the transport expenses to and fro.

Timing respondents; Being a rural based research, as anticipated earlier, the timing of respondents was a challenge because there was no time convenient to everyone. Respondents could be involved in their day-to-day activities such as gardening, grazing, purchasing livestock feeds and farm implements. Others were attending parties, funerals, and others had journeys for more than two days before returning home. The key informants like such as NAADS coordinators, extension workers were attending meetings and others engaged in field tours. Sparing time for an interview or filling the questionnaire was somehow regarded as an inconvenience and interruption of one's working schedule.

However, the researcher would approach the respondents wherever they would be and through rapport creation process, he would explain to them why one's responses to the study are vital and therefore sparing some little time to adjust and participate in the study was important and desirable. In cases of unadjustable schedules, appointments would be secured for the next time. Lunch time hours was also mostly used to meet the respondents as they retired from their activities back home. Some respondents did not respond and others were bias thus affecting the results of the study and the legitimacy of the findings thereafter

CHAPTER FOUR: DATA PRESENTATION, INTERPRETATION, ANALYSIS AND DISCUSSIONS OF THE FINDINGS

4.0 Introduction

This chapter presents the findings of the study and the interpretation according to the three objectives of the study. That is, to assess the contribution of NAADS towards promoting food security among households in Bugangari sub-county, to identify the challenges faced by NAADS in promoting food security of households in Bugangari sub county and to find out the solution to the challenges of NAADS' role of promoting food security of households in Bugangari sub county.

4.1 Demographic characteristics of respondents

The demographic characteristics of respondents were critically examined and the findings are as shown on the table below.

4.1.1 Gender

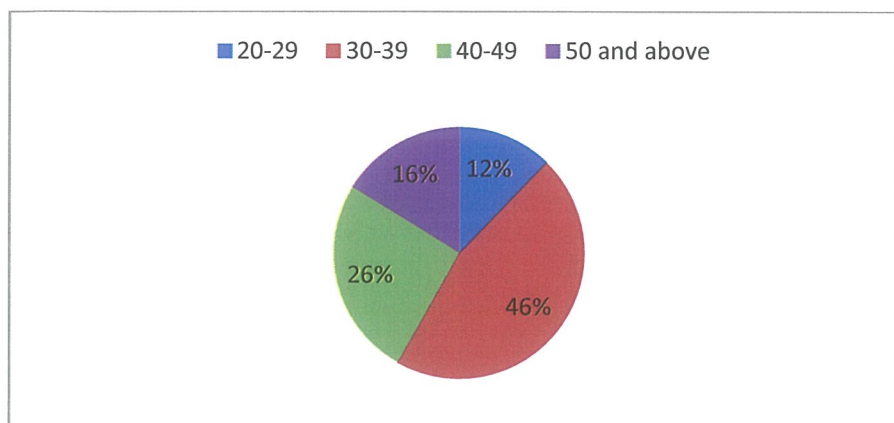
Table 1: Showing gender of the respondent

ITEM		Frequency	Percent
	Male	41	55.4
	Female	33	44.6
	Total	74	100.0

Findings from the table above revealed that out of 74 total respondents, 55.4% were males and 44.6% were females and this implied that majority of the respondents were males compared to that of females because male got involved in research more actively and these gave relevant information for the study.

4.1.2 Age

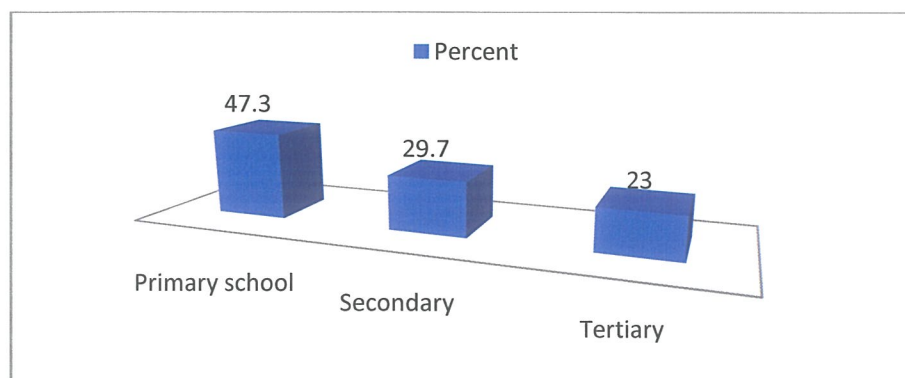
Figure 1: Showing the age of the respondents



Findings from figure 2 above indicated the age brackets of the respondents, it revealed that 46% of the respondents were between 30-39 years; this was followed by 26% who were between 40-49 years, 16% were 50 above years while 12% were between 20-29 years. It is important to note that it's logical to say the respondents were mature enough to give relevant information on the topic of study, and this implied that respondents had varying views on the role of NAADS in Bugangari sub-county.

4.1.3 Education

Figure 2: Showing education level of respondents



Research from the study revealed the education background of the respondents and out of 74 total respondents, 47.3% of the respondents had primary level of education, followed by 29.7%

who had a secondary level of education and 23.0% had tertiary education. The implication was that all the respondents who participated in the study were able to read and write and therefore they gave reliable information.

4.1.4 Parish

Table 2: Showing Parishes of respondents

ITEM		Frequency	Percent
	Bugangari	17	23.0
	Kasindiro	9	12.2
	Kashayo	6	8.1
	Nyabitete	20	27.0
	Burama	12	16.2
	Kyaburere	4	5.4
	Kakido	6	8.1
	Total	74	100.0

Findings from the table indicated a number of different parishes of origins were respondents came from and it was found out that 27.0% of the respondents were from Nyabitete, this was followed by 23.0% were from Kugangari, 16.2% were from Burama, 12.2% were from Kasindiro, 8.1% were from either Kashayo and Kakido and only 5.4% were from Kyaburere parish. This implied that majority of the respondents came from Nyabitete parish were NAADS programmes are mostly practiced.

4.2 Assess the Contribution of Naads towards Promotion of Food Security Among Households.

4.2.1 Involvement in the NAADS programme

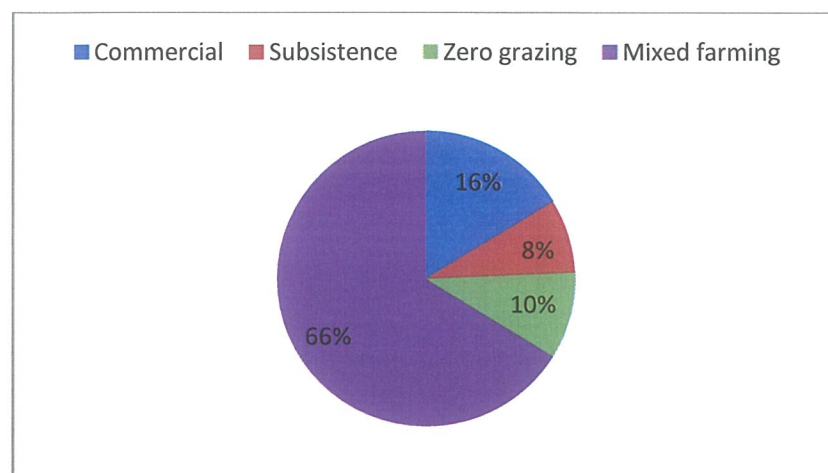
Table 3: Showing the period spent in the NAADS programme

ITEM		Frequency	Percent
	1-3years	8	10.8
	4-6years	12	16.2
	above 6years	54	73.0
	Total	74	100.0

Findings from the table above revealed a period respondent spent while involving in the NAADS programme and the study revealed that 73.0% of the respondents had spent above 6years involved in the NAADS programme, followed by 16.2% spent 4-6years involved in the programme while 10.8% had spent 1-3years in the programme. This implied that majority of the respondents who took part in the study had experience in practicing NAADS programme because they had spent a number of years in the NAADS service.

4.2.2 Type of farming

Figure 3: Showing types of farming practiced



Research from the study revealed the different type of farming practiced Bugangari sub-county and it brought to light that 66.2% of the respondents practiced mixed farming, 16.2% practiced commercial farming, 9.5% practiced zero-grazing and 8.1% practiced subsistence farming. The implication was that majority of the respondents practiced mixed farming such that they could have different portions of every aspect of agricultural activity and that is crop farming, cattle grazing among others.

4.2.3 Land under production

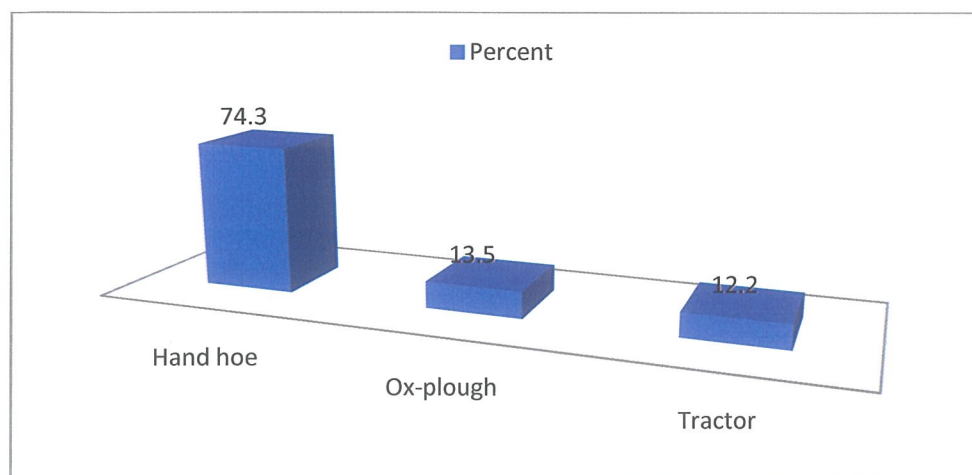
Table 4: Showing types of farming practiced

ITEM		Frequency	Percent
	Less than one acre	28	37.8
	One and half acres	21	28.4
	Two-three acres	15	20.3
	More than three acres	10	13.5
	Total	74	100.0

Findings from that table above revealed that 37.8% of the respondents used less than one acre in the production of their services, 28.4% produce on one and half acres, 20.3% produce on two-three acres of land and 13.5% produce on more than three acres. This implied that majority of the respondents produce on a small piece of land and this is attributed that fact that whichever little they produce is for home consumption.

4.2.4 Implement used

Figure 4: Showing implement used



The study indicated the implements used in the preparation of fields and it revealed that 74.3% of the respondents used hand hoe to prepare the fields, 13.5% used Ox-plough and 12.2% used tractors to prepare the fields. This implied that since majority of the respondents used hand hoe because they practiced agriculture on less than one acre and more so food was for home consumption. According to the interview with the farmers they revealed that, “they use fertilizer applications to prepare the field, spray the field and for rice they use forked planters for spacing” all these help farmers prepare field for planting.

4.2.5 Source of capital

Table 5: Showing the sources of capital

ITEM		Frequency	Percent
	Own savings	55	74.3
	Credit from friends	1	1.4
	Credit from Bank/MFI	18	24.3
	Total	74	100.0

The study in the table above revealed the different sources of capital and it indicated that 74.3% of the respondents got capital from their own savings, 24.3% got capital from credit from Bank/MFI while 1.4% from credit from friends. The implication was that majority of the respondents got capital from their own savings and this because of the good saving culture that respondents have and also being that they practiced agriculture on less than one acre, so the little they save was enough to enable them start their agriculture.

4.2.6 Planting or rearing new breeds of crops and livestock

Table 6: Showing the planting or rearing new breeds of crops and livestock

ITEM		Frequency	Percent
	Yes	61	82.4
	No	13	17.6
	Total	74	100.0

Research revealed that 82.4% of the respondents said Yes that they rear new breeds of crops and livestock while 17.6% said no. the implication was that planting or rearing new crops and livestock produce good quality yields and more they take long to mature and these new crops and livestock were distributed by NAADS co-coordinators, NAARO and UCDRA.

4.2.7 Storage technologies

Table 7: Showing storage technologies used

ITEM		Frequency	Percent
	Use of raised stores	12	16.2
	Use of silos	8	10.8
	Use of granaries	54	73.0
	Total	74	100.0

The study from the table above indicated the different storage technologies used to store food and it revealed that 73.0% of the respondents used granaries to store food, 16.2% used raised

stores for food safety while 10.8% used silos to store food and others store food from their own house. The implication was that majority of the respondents in Bugangari sub-county Rukungiri district because granaries do not require much capital and according to the interview with farmers they said, “That they use coffee hand pulpers for pulping Arabic wet coffee and coffee processing factory, drying on tarpaulins for quality, pulping coffee using hand pulpers and storage in a well thatched store”

4.2.8 How did farmers get to know of the technologies?

The study revealed that farmers got to know of the technologies through the trainings offered NAADS officers, extension workers, RUDIFA, Kachwekano research center staff and radio talk shows by district production officials, others from schools while others from their own parents and friends.

4.2.9 NAADS advise

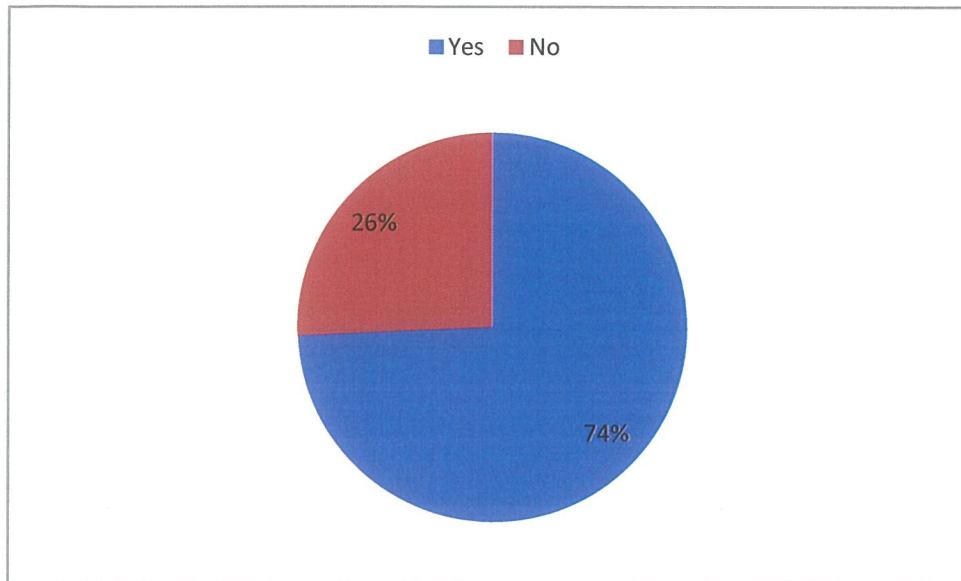
Table 8: Showing whether NAADS offer advice to farmers

ITEM		Frequency	Percent
	Type of crops to plant	46	62.2
	On how to do spacing of crops while planting	14	18.9
	Type of soil which is better for given crops and not others	14	18.9
	Total	74	100.0

From the table, it indicated the different aspects that NAADS offer advice on and it revealed that 62.2% of the respondents said that NAADS offer advice on the type of crops to plant, 18.9% said advise was offered either on how to do spacing of crops while planting or the type of soil which is better for given crops and not others. This implied that NAADS since it is an advisory center offer advisory services on the different crops planted and also on how to look after those crops.

4.2.8 Advise on pest and disease control

Figure 5: Showing whether NAADS offer advise pest and disease control



The research revealed that 74% of the respondents said Yes that NAADS offer advice on pest and disease control while 26% said no. This implied that since NAADS is an advisory centre and it encourage and advise people on how to have enough food such that they do not circum to famine therefore for respondents to have enough security they have to be advised on how to control pests and diseases.

Findings after the study revealed a number of NAADS contributions in promoting food security through emphasizing farmers to practice different types of farming that is mixed farming, commercial farming, zero-grazing and subsistence farming such that they grow food of bigger scale and most of the famers in Bugangari product food on less than one acre, one and half acres, two-three acres of land and on more than three acres, and they application of different technologies in the storage of food and that is; used granaries to store food, raised stores for food safety, used silos to store food while others store food from their own house. Generally NAADS aims at improving access to marketing formation, bring technology close to the farmers and all other facts that concern agriculture. It has been noted that post handling and storage of food crops has also increased and improved with NAADS improved methods of food storage and preservation thereby promoting food security.

4.3 CHALLENGES FACED BY NAADS AND FARMERS IN PROMOTING FOOD SECURITY

4.3.1 NAADS officials visit farms

Table 9: Showing regularly NAADS officials visit your farm

ITEM		Frequency	Percent
	once a month	46	62.2
	twice a month	15	20.3
	thrice a month	13	17.6
	Total	74	100.0

Findings from the study indicated the intervals NAADS officials visit people's farms and it revealed that 62.2% of the respondents said that NAADS officials spend or take a month to visit their farms, 20.3% take twice a month while 17.6% take thrice a month. This implied that NAADS officials take long to visit people's farms and yet it's their main responsibility to monitor their farms such that they could detect the progress of the farm.

4.3.2 Environment conditions affect crops

Table 10: Showing environmental condition affects the growth of crops

ITEM		Frequency	Percent
	inadequate water supply	25	33.8
	change in seasons	46	62.2
	pests and diseases	3	4.1
	Total	74	100.0

Findings from the table above revealed the ways through which the environment affects the growth of crops, it brought to light that 62.2% of the respondents said that change in whether affects the growth of the crops, 33.8% inadequate water supply while 4.1% pests and diseases affect the growth of the crop. The implication was that seasonal changes affect so much of the growth of crops as they often happen with different uncertainties which are hard for farmers to detect. According to the interview with farmers from Bugangari sub-county said that climatic

changes for example “we expected rain from February to May but it only rained from February and only part of March. This means that the harvest will not exceed 30%, soil exhaustion due to continuous tillage and more so natural calamities like hailstorm that happen in case of heavy rains” all this therefore affects the growth of the crops.

Table 11: Showing management challenges

ITEM	Management challenges	Frequency	Percent
	political interference	20	27.0
	lack of office space and equipment	17	23.0
	lack of records	12	16.2
	failure to do regular monitoring and evaluation	17	23.0
	inadequate or late delivery of logistics like seeds	8	10.8
	Total	74	100.0

Finding in the table above disclosed the management issues and it revealed that 27.0% of the respondents said political interference affects the operation of their activities, 23.0% either lack of office space and equipment or failure to do regular monitoring and evaluation while 10.8% inadequate or late delivery of logistics like seeds. This implied political interference by different officials in the sub-county and the district at large has paralyzed the operation of NAADS programme. From the interview with farmers in the Bugangari sub-county said that, “failure by the ministry to release full budgeted funds, corruption from the leaders themselves were most of the items are taken by themselves, bureaucracy were by every step has to be followed” all this therefore has caused the operation of NAADS operation in the sub-county”

4.3.4 Resource factors that affect running of NAADS programme

Table 12: Showing Resource factors affect operation of NAADS

ITEM		Frequency	Percent
	inadequate funding	54	73.0
	high turnover of staff	10	13.5
	lack of qualified staff	10	13.5
	Total	74	100.0

Findings from the study disclosed that 73.0% of the respondents said that inadequate funding affect the operation of the NAADS programme, 13.5% either high turnover of staff or lack of qualified staff, and according to the interview with NAADS officials they said, “that inadequate resource where by staff are three with only one sound motorcycle, computer resource is a problem to the fact that the sub-county has no hydro-electricity. This means that unless one goes to Rukungiri town typing and printing continues to be problem” this therefore in has affected the operation of NAADS programme in the Bugangari sub-county because they are adequately funded; they do not have enough resources to operate their programme.

Findings after the study indicated the varying challenges that affect food security that environmental effect such as change in weather, inadequate water supply, pests and diseases, soil exhaustion due to continuous tillage and natural calamities like hailstorm that happen in case of heavy rains” all this therefore affects affect the food security. Management issues has also affected food security in Bagangari sub-county that is political interference affects the operation of their activities, lack of office space and equipment, failure to do regular monitoring and evaluation, late delivery of logistics like seeds, failure by the ministry to release full budgeted funds and corruption from the leaders divert the input for their own gains. Resource challenges also affect food security that is inadequate funding, high turnover of staff, lack of qualified staff, inadequate resource such as limited motorcycle and computer resource which is attribute to lack of hydro-electricity in the sub-county. This is in line with the view reflected. Findings revealed that NAADS is reportedly high turnover of staff in the programme especially the coordinators, due to perceived political interference in the programme attributed to incidences of open

humiliation during public events; 'NAADS advertises almost every day in the newspaper, mainly due to the very high staff turnover.

4.4 SOLUTION TO THE CHALLENGES

4.4.1 What should be done to overcome challenges

From the interview with farmers from Bugangari sub-county, findings from the study disclosed a number of solutions proposed by respondents to cut down the challenges faced which included; "introduction of irrigation schemes such that it could help reduce on the problem of water, practice crop rotation, use of fertilizers and organic manure to have good yields, carry out intensive research in agriculture such that could know ways of looking after their crops.

The NAADS should also provide capacity building to agricultural staff, increase innovativeness amongst farmers and agricultural staff, increased funding such that farmers could have enough input and more to for the organization to have enough human resource, the organization (NAADS) should help farmer look for the viable market for their produce, avoid politicizing the programme, should increase on the amount of inputs given to farmers, increased monitoring (field visits) and training facilitation" therefore if all the suggested solutions are taken into consideration, the problems would have been solved.

Findings after the study brought to light a number of suggestions to help NAADS improve its services and among them included; introduction of irrigation schemes reduce on the problem of water, practice crop rotation, use of fertilizers and organic manure to improve on the quality of yields to, carry out intensive research of new quality seeds, provide capacity building to agricultural staff and to the farmers themselves, increase the level of innovativeness amongst farmers and agricultural staff, increased funding from the government to have enough input and human resource, the organization (NAADS) should help farmer look for the viable market for their produce, avoid politicizing the programme, continuous monitoring of the NAADS activities and firms and more providing more training facilitation by doing this would help revamp NAADS activities and increase morale of the farmers towards the programme. It should be noted that agriculture would be modernized if the proprietors and other stakeholders involved take relevant measures such that they make the staff competent and more offering training to the farmers.

CHAPTER FIVE: CONCLUSIONS AND RECOMMENDATIONS

5.0 Introduction

This chapter involves the conclusions and recommendations in relation to the study objectives.

5.1. Conclusions

From the above findings it can be concluded that popular participation in the NAADS programme existed in the first and second phase of its implementation but has been on decline. It should be noted that, it is argued that the programme has not benefited the people and it's the reason as to why his excellency the president wanted to scrap it off, however according to the findings the programme has not failed completely but rather has benefited some people like those in Bugangari sub-county and scope of participation by the beneficiary farmers include selecting enterprises, forming farmers' groups, electing group leaders and representatives, attending training, and group and inter-group meetings. However, this participation was and is still mostly felt at the farmers' group level as major decisions are made by higher NAADS programme implementation authorities. It is clear that there would be much more benefits accruing from the programme if the beneficiaries were fully participating in the decision making regarding the programme planning, and implementation. The participation of the beneficiaries in the NAADS programme has been on decline over the years since the early stages of its implementation. The situation has been worsened by the introduction of new programme implementation guidelines which took effect from the 2010/2012 financial year. The important decisions are now made by higher authority right from the sub-county level upwards. Such decisions include the selection of enterprises which is done at sub-county level without participation from the grass root farmers. Other decisions are entailed in the irreversible directives from the president on the distribution of goats and the supply of other agricultural and technology inputs and farm implements, the number of beneficiaries per parish each financial year which is regarded to be very small compared to the total number of beneficiaries in the parish. This leaves majority of the 'so called' beneficiaries idle, demoralized and disinterested in participating in programme activities.

5.2. Recommendations

Basing on the above findings, research would recommend increased beneficiary participation in NAADS programme implementation particularly at the lower level. Beneficiaries right from the group level need to get involved in all the activities of the programme including planning, identifying their needs, and selecting their own favourite enterprises, while the farmers' forum, sub-county technical staff and extension workers play an advisory role.

All the NAADS programme key stakeholders need to ensure that the procurement and supply process is transparent and it actively involves farmers' elected community based selection / procurement committees both at parish level and sub-county level. The process should be in accordance with the stipulated NAADS programme implementation.

The NAADS coordinators, elected leaders of farmers' groups and committees at different levels need to sensitize the programme beneficiaries most especially about the new programme implementation guidelines. Information is needed on the implication of these new guidelines for previous arrangements (first phase of NAADS programme). Most farmers especially in Rwampara are still waiting for a response from the sub-county NAADS coordinator to their applications for enterprises. Yet with these new guidelines, this arrangement is no longer applicable. The NAADS coordinator and other elected leaders at different levels should inform the farmers the truth regarding the fate of their applications for enterprises instead of keeping them waiting in vain which makes them demoralized, de-motivated and disinterested in participating in NAADS programme activities.

More sensitization and training is also needed because most farmers who joined the programme recently are not well conversant with it. This is mostly needed in Bugangari sub-county, with particular emphasis on their roles, obligations, rights and desired degree of participation as beneficiaries of the programme. More training sessions for farmers on the ways to manage and develop their selected enterprises need to be carried out.

The NAADS Coordinators at sub-county and district levels as well as the National NAADS programme implementation agency(ies) need to pay adequate attention to all NAADS programme beneficiaries in their farmers groups but not only on the selected six lead and demonstration farmers per parish as the case seems to be today. This will keep the farmers

actively involved in the activities of their selected farmer group's enterprises. Besides, the number of selected beneficiaries for each financial year should be increased to match the number of the registered beneficiaries in each parish.

NAADS programme implementing agencies also need to encourage more men and youths to get involved in the programme by identifying the factors inhibiting their participation.

Finally, politicking NAADS programme need to be avoided as much as possible so that the programme remains a development programme rather than a political tool. There is a need to make a clear demarcation between the two programmes - NAADS and Prosperity For All, with each programme being given distinctive structures with different target beneficiaries. Otherwise, making NAADS programme a political conduit by the NRM political party members / supporters restrains the interest of the non-NRM members from participating in the programme.

5.3. Areas of further research

Similar research can be carried out in other districts / regions in this country.

Research can also be carried out to assess the impact of Rural Development programmes on the rural economy, with different case studies.

Research can be done about gender equity or age-specific and participation in the NAADS programme.

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APPENDIX A: QUESTIONNAIRE FOR FARMERS

I am ANNA KARUHANGA, A third year student pursuing a Bachelor of Public Administration at Kampala International University. This questionnaire is designed to find out the role of NAADS towards the promotion food security of the local communities in Rukungiri District a case study of Bugangari Sub County. The information that you will give will be used for academic purpose only. I therefore kindly request you to give your honest opinion.

Date.....

Position of the respondent.....

Instruction: Tick appropriate option and fill in where required

SECTION A: Background Information

Please tick the correct answer.

1. Gender:

a.) Male ☐

b.) Female ☐

2. Age

a.) 20-29 ☐

b.) 30-39 ☐

c.) 40-49 ☐

d.) 50 above ☐

3. What is your highest level of education:

a.) Primary School ☐

c.) Tertiary ☐

b.) Secondary ☐

d.) Others (Specify).....

4. Parish of origin

a) Bugangari ☐

d) Nyabitete ☐

b) Kasindiro ☐

e) Burama ☐

c) Kashayo ☐

f) Kyaburere ☐

g) Kakindo ☐

SECTION B: Promotion of food security

1. For how long have you been involved in the NAADS programme?

- a.) 1-3 years ☐ c.) Above 6 years ☐
b.) 4-6 years ☐

2. What type of farming are you practicing?

- a.) Commercial ☐ d.) Mixed farming ☐
b.) Subsistence ☐ e.) Others (specify) -----
c.) Zero-grazing ☐

3. What is the size of your land under production?

- a.) Less than one acre ☐
b.) One and half acres ☐
c.) Two-three acres ☐
d.) More than three acres ☐

4. What implements do you use in the preparation of fields?

- a.) Hand hoe ☐
b.) Ox-plough ☐
c.) Tractor ☐
d.) Any other (specify).....

5. What is the source of your farm capital?

- a.) Own savings ☐ c.) Credit from Bank/MFI ☐
b.) Credit from friends ☐

5. Are you currently planting or rearing new breeds of crops and livestock respectively?

- a.) Yes ☐ b.) No ☐

6. If yes, where did you get these breeds from?

.....
.....

7. What types of storage technologies do you use for your produce?

- a.) Use of raised stores ☐
b.) Use of silos ☐

c.) Use of granaries ☐

d.) Others (specify)

8. How did you get to know about these technologies

.....
.....

9. Does NAADS advise on the following;

a) Type of crops to plant. ☐

b) On how to do spacing of crops while planting. ☐

c) Type of soil which is better for given crops and not others. ☐

10. Does NAADS advise you on how to control pests and diseases?

a) Yes ☐

b) No ☐

SECTION C: Challenges faced by NAADS and farmers in promoting food security.

Tick all the correct answers.

11. How regularly do NAADS officials visit you farms

a.) Once a month ☐

b.) Twice a month ☐

c.) Thrice a month ☐

d.) Others (specify)

12. What environmental conditions affect the growth of your crops?

a.) Inadequate water supply ☐

b.) Change in seasons ☐

c.) Pests and diseases ☐

d.) Others (specify)

13. What are some of the management issues that affect the running of NAADS activities in your sub-county

a.) Political inference ☐

b.) Lack of office space and equipments ☐

c.) Lack of records ☐

d.) Failure to do regular monitoring and evaluation ☐

e.) Inadequate or late delivery of logistic like seeds ☐

f.) Others (specify) -----

14. What are some of the resource factors that affect running of NAADS program in your sub-county

a.) Inadequate funding ☐

b.) High turnover of staff ☐

c.) Lack of qualified staff ☐

d.) Others (specify) -----

SECTION E: Solutions to the above challenges.

16. What should be done to overcome the above challenges?

Thank you so much for your cooperation

APPENDIX B: KEY INFORMANT INTERVIEW GUIDE FOR THE SUB COUNTY NAADS COORDINATOR

Good morning Sir/Madam, I am ANNA KARUHANGA a third year Bachelor of Public Administration student of Kampala International University. This questionnaire is designed to assess the role of NAADS towards the promotion of food security of households in Rukungiri District, a case study of Bugangari Sub County. The information that you will give will be used for academic purpose only. I therefore kindly request you to give your honest opinion.

Date

Position of respondent

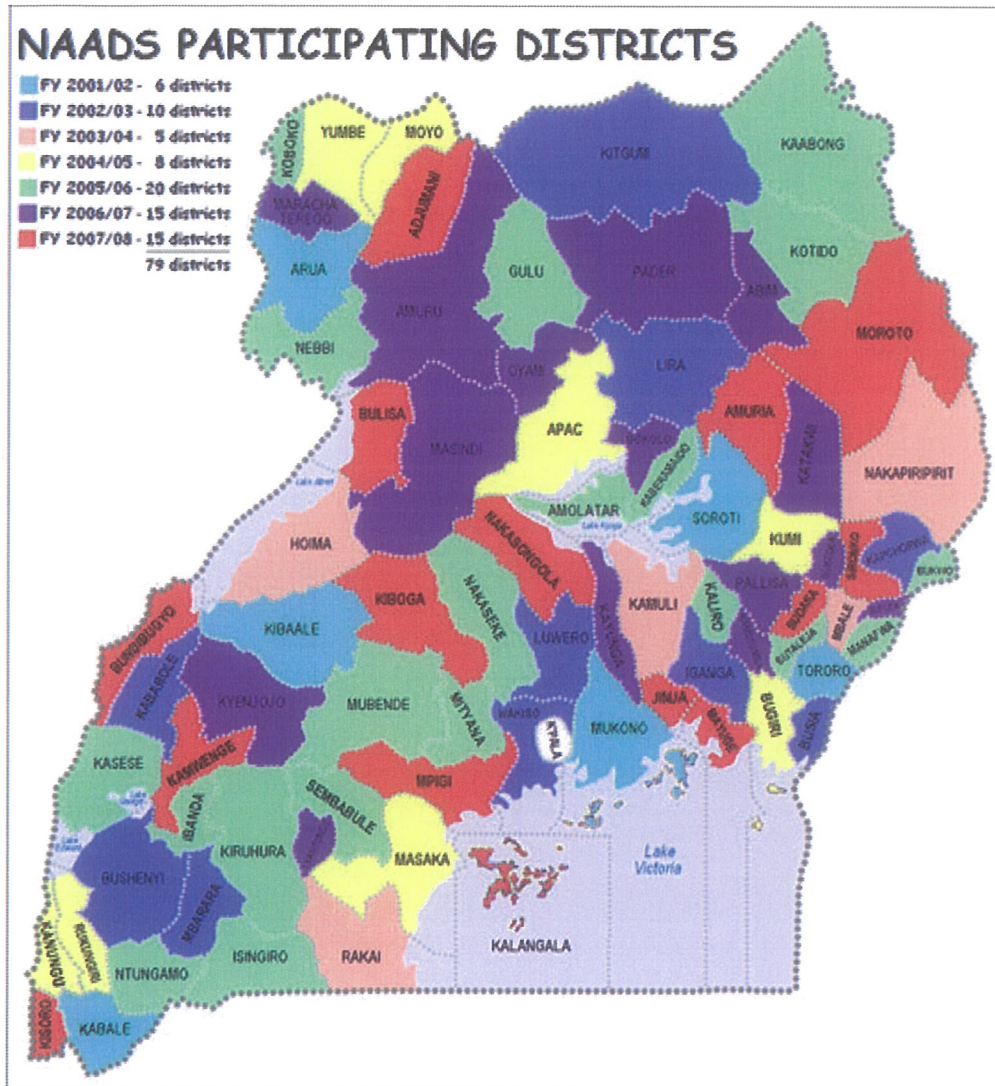
Questions

1. What role do you play in the NAADS programme?
2. What type of farming methods are practiced by farmers in this area?
3. What technologies do farmers in this area use for farming?
4. What type of post harvest strategies do your farmers use for handling and processing their produce?
5. How did these farmers get to know about the different technologies and post harvesting handling methods?
6. Does NAADS advise farmers on the fertilizers to use, crops to grow or it goes ahead to distribute them?
7. How many NAADS officials are you in this sub-county?
8. What are some of the management challenges faced by the program in this area?
9. What are some of the resource challenges you face in this area?
10. Are there any environmental challenges that affect the success of NAADS in this area?
11. What solution would you suggest in order to address the above mention challenges?

Thank you so much for your time

God bless you

**APPENDIX C: MAP OF UGANDA SHOWING NAADS PARTICIPATING DISTRICTS
BY FY 2009/2010**



Source: NAADS programme website- www.naads.org.ug/. Accessed in June 2014.

Key

Area of study (Rukungiri district)

Map showing District of study (Rukungiri district)

