

**A STUDY TO ASSESS THE IMPACT OF BUREAUCRATIC  
FORM OF AGRICULTURAL EXTENSION ON SMALL SCALE  
FARMERS' PARTICIPATION IN AGRICULTURAL ACTIVITIES  
IN SOLWEZI DISTRICT: A CASE OF KYAFUKUMA  
AGRICULTUAL CAMP**

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**UNZA**

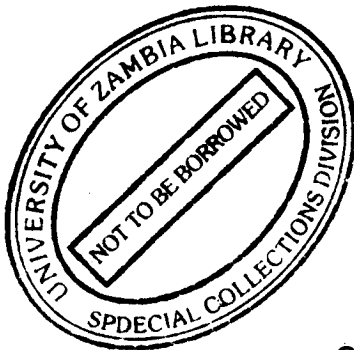
**2004**

# **THE UNIVERSITY OF ZAMBIA**

**SCHOOL OF EDUCATION**

**DEPARTMENT OF ADULT EDUCATION AND EXTENSION STUDIES**

**A STUDY TO ASSESS THE IMPACT OF BUREAUCRATIC  
FORM OF AGRICULTURAL EXTENSION ON SMALL SCALE  
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IN SOLWEZI DISTRICT: A CASE OF KYAFUKUMA  
AGRICULTUAL CAMP**



**BY**

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**COMPUTER NO. 99056518**

**A DESSERTATION SUBMITTED IN PARTIAL FULFILMENT OF  
THE REQUIREMENTS FOR THE AWARD OF THE BACHELOR  
OF ADULT EDUCATION DEGREE.**

**SUPERVISOR: MR. PATRICK SELETA NGOMA**

**UNZA**

**2004**

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## **DEDICATION**

To my Mother, Monica Tembo and late Father, Nazael Phiri. Your love and affection inspired this effort in my studies.

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Completing my Bachelor of Arts Degree in adult Education at the University of Zambia would have been impossible had it not been for the all-round support from my lecturers in the Department of Adult Education and Extension Studies, family members, friends and individuals. I write with gratitude to express my heartfelt appreciations to everyone who unconditionally rendered me moral, spiritual financial and material support towards what I have achieved.

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In Lusaka, I thank the following family members for all the support they rendered during my studies; Mr. And Mrs Stephen Sasu, Mr. And Mrs Isaac Phiri, Mr. and Mrs Wilbroad Kasopa and my grandies Mr. And Mrs Zimba of

Mtendere; I thank my friends Mr. Sepeti, Mutale, Likando, Chakale, Mr. Sakuwaha, Mr. Mwansa and Mr. Kapamulomo for the encouragement, and I also thank THE PARTNERSHIP FORUM for the partial scholarship offered to me during my third year, second semester tuition fees.

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## **ACRONYMS**

|         |   |                                                             |
|---------|---|-------------------------------------------------------------|
| AGRITEX | : | Department of Agricultural Technical and Extension Services |
| CTA     | : | Technical Centre for Agricultural and Rural Cooperation.    |
| DACO    | : | District Agricultural Coordinator                           |
| FAO     | : | Food and Agricultural Organisation                          |
| MACO    | : | Ministry of Agriculture and Co-operatives                   |
| PACO    | : | Provincial Agricultural Coordinator                         |
| T and V | : | Training and Visit System                                   |
| V.E.G.  | : | Village Extension Group                                     |
| UNZA    | : | University of Zambia                                        |
| W.B.    | : | World Bank                                                  |

## **CHAPTER ONE**

### **INTRODUCTION**

Agricultural development in rural areas of Zambia consist mainly of small scale farmers. The agricultural activities depend on the National Agricultural Extension Services which design most agricultural messages inform of advice and technical information.

Small Scale Farmers are usually subjected to a top-down or bureaucratic form of agricultural extension in an extension officer – farmers relationship. Extension Services are structured and operate on the assumption that small scale farmers are on a receiving end and thus, passive, such that they are illiterate and ignorant and that they are unable to integrate new agricultural technologies into their established farming systems (C.T.A, 1997). More often than not, small scale farmers are asked to participate in activities of no benefit in the name of participation. Bureaucratic form of agricultural extension to small scale farmers has tended to promote dependency syndrome. The implication of this syndrome has resulted into non-sustainability of various funded projects when the sponsor has long gone. The programme initiators, in this case agricultural extension officers, are looked upon as experts or reservoirs of knowledge who have all the solutions to the farmers' problems. On the other hand, the small scale farmers act as empty vessels who wait to be filled with information for them to participate in a given activity.

A study by Maramwidze (1978), looked at problems related to agricultural productivity among small scale farmers. The focus of the study was directed at government's role in promoting agricultural production. Social and economic incentives, such as provision of agricultural inputs, establishment of credit schemes and creation of tractor hire units for small scale farmers were emphasized. These incentives acted as independent variables that positively affected agricultural productivity. However, the study did not investigate how agricultural extension messages were delivered to farmers and how small scale farmers got involved in accessing the incentives to promote their farming activities. This disparity motivated the researcher in this study to carry out an investigation to determine how top-down type of agricultural extension influenced small scale farmers participation in agricultural activities.

### **Statement of the Problem**

Agricultural extension in Zambia is mainly a government driven service. It's focus is towards meeting the small scale farmer's needs by way of providing appropriate agricultural technology and information. Reports indicate that participation of small scale farmers in agricultural activities has been characterized by apathy, that is, low involvement with regard to farmers attendance at village extension group meetings, agricultural shows, field days and other related organized agricultural programmes. The impact of such trends has also been experience in other donor supported projects which have come and gone leaving behind small scale farmers as beneficiaries,

poorer and of low socio-economic status. This scenario has shown that most agricultural related programmes that government initiates, through its extension service have ended up being “white elephants” soon as the programmes come to expire. The questions could be, who should be blamed? Is it the programme planners, or the agricultural extension practitioners, or the small scale farmers as beneficiaries or still, is it the type of extension delivery system used to reach out to the farmers? In the absence of lack of sustainability, it is hoped and expected that small scale farmers should be seen to progress and graduate or transform from the level of being a small scale farmer to medium scale farmer and then to a large scale or commercial farmer.

As a reflection to this problem statement, this study was intended to determine the extent to which bureaucratic approach of agricultural extension to small scale farmers affected their participation in related agricultural activities in Kyafukuma Agricultural Camp of Solwezi District.

### **Purpose of the Study**

The purpose of the study was to assess the impact of bureaucratic form of agricultural extension on small scale farmer's participation in agricultural activities.

## **Hypotheses**

Ho : There is no significant relationship between bureaucratic form of agricultural extension and small scale farmers' participation in agricultural activities.

H1 : There is a significant relationship between bureaucratic form of agricultural extension and small scale farmers' participation in agricultural activities.

The acceptance of the Ho hypothesis would be interpreted to imply that bureaucratic form of agricultural extension does not affect small scale farmers' participation in agricultural activities. However, the rejection of the Ho hypothesis would imply that bureaucratic form of agricultural extension does affect small scale farmers' participation in agricultural activities.

## **Objectives of the Study**

The following were the objectives of the study:-

- a. to determine the relationship between bureaucratic form of agricultural extension and small scale farmers attendance at village extension group meetings.
- b. to assess whether bureaucratic form of agricultural extension improved Small scale farmers' adoption of agricultural innovations.

- c. to determine whether bureaucratic form of agricultural extension increased income levels of small scale farmers.
- d. to determine whether bureaucratic form of agricultural extension sustained small scale farmers accessibility to agricultural credit.

### **Significance of the Study**

The study was significant because the findings were likely to contribute to existing research knowledge on extension methods and instructions in the field of agriculture. Furthermore, the findings might be useful to agricultural extension programme planners, policy makers, agricultural extension practitioners, donors and other interested persons to acquaint themselves with problems and, or opportunities regarding small scale farmers participation in agricultural activities.

### **Limitation of the Study**

The study was limited to only one agricultural camp (Kyafukuma Agricultural Camp) in Solwezi district. The researcher had no capacity to cover all the thirty camps in the district because of lack of transport to go round the camps, financial resources and inadequate time. The study was also limited to small scale farmers who were registered in the camp register and were members in the village extension groups.

## **Operational Definitions**

### **Bureaucratic form of agricultural extension:**

A typical top-down extension approach of agricultural message delivery system.

### **Passive Participation:**

A type of participation by communities who merely become recipients of messages.

### **Small Scale Farmers:**

Participating farmers who cultivate up to five (5) hectares, use family labour and use less specialized farming systems.

## CHPATER TWO

### LITERATURE REVIEW

#### Banking Concept Of Education

This is Paulo Freire's (a Brazilian adult Educator) perception about how unbalanced education can be with regard to the relationship between the educator and the learner. Freire (1972:57) posit that a careful analysis of the educator – learner relationship at any level, inside or outside the school system, reveals its narrative character. This relationship involves a narrating subject (the educator) and the patient listerning objects (the learners). The task of the educator in this relationship is to fill the learners with the contents of his or her narration. The learner records mechanically, memorises and repeats the messages narrated to them. Freire, further argues that, worse, yet it turns the learners into containers, into receptacles to be filled by the educator. Bureaucratic form of agricultural extension, thus, become an act of depositing in which the farmers are the depositories and the extension expect is the depositor. Hope and Timmel (1984:17) in agreement with Freire call such a teaching learning scenario the banking concept of education in which the scope of action allowed to the learners, extend only as far as receiving, filling and storing the deposits.

One of the objectives of agricultural extension in an extension worker – farmer linkage, is to assist small scale farmers by giving them knowledge and advice

in farming in an effort to increase their productivity and welfare. More often than not, the solutions are rarely found. Freire (1972:59) highlights that on the contrary, banking education maintains and even stipulates the contradiction through the following attitudes and practices:

- The educator teaches and the learners are taught.
- The educator knows everything and the learners know nothing
- The educator chooses and enforces his/her choice and the learner complies
- The educator is the subject of the learning process while the learners are merely objects.
- Knowledge is seen as a ready – made package of reliable information that must be passed on from one person to another.

Thus, the implication of such an educator-learner relationship, as observed by Rehnema (1992), means that more often than not, people are asked or dragged into participating in operations or activities of no interest to them, in the name of participation.

In relation to the foregoing sentiments, studies conducted by AGRITEX et al (1998:9) in Zimbabwe and many other countries in Africa, indicated that transfer of technology and other agricultural messages, through a top-down type of agricultural extension delivery, is based on the assumption that, a

transfer of technology and knowledge from extension experts will trigger agricultural development. Thus, it is assumed that farmers' problems and concerns can be solved by extension experts and institutions like agricultural research stations who design modern technology. Results have not been so expectant, such that farmers have often been considered as the main constraint to agricultural development, as mismanagers of their resources and difficult to change. One notable feature in the top-down agricultural extension, as observed by AGRITEX et al (1998:24) was that farmers may be persuaded through material incentives or forced by authoritarian extension workers to adopt new agricultural practices or innovations. However, in situations where material incentives are offered, (in an effort to promote farmers' involvement in agricultural practices), it is often observed that these material incentives, in the long run distort perceptions, create a dependency syndrome and give misleading impression that local people are supportive of externally driven initiatives (Reig, 1988; Bush, 1991 and Kerr, 1994).

### **Interpretation of Peoples Participation**

In recent years, an increasing number of analyses of projects have shown that participation by local people is one of the critical components of success in irrigation, livestock and other agricultural enterprises (FAO, 1997:48; World Bank, 1994). The term people's participation has now become part of the normal language of many development agencies as well as political leaders. William (1992) argues that the perception of the term peoples participation

has brought new dangers. New dangers in the sense that the term has been used and interpreted differently such as to justify the extension of state control aid to build local capacity and self-reliance; participation for material incentives; participation in information giving; participation by consultation; functional participation; passive participation and other typologies of participation. Thus, these various forms of the term participation, ranges from passive participation where people are involved in an activity merely by being told what would be happening, to self-mobilisation where people take initiatives independently of external institutions or individuals (Pretty, 1994:104).

It is clear from this typology of participation that the term peoples participation should not be accepted without appropriate qualification. This study intended to qualify passive participation by small scale farmers as an effect of bureaucratic form of agricultural extension delivery in an extension worker-farmer relationship. Furthermore, the study intended to determine other possible implications to small scale farmers whom the extension service intends to change in a bid of improving the agricultural industry.

### **Perception of the Role of Change Agents**

The perception of the role of agricultural extension agents in an important element in understanding the transmission and diffusion of agricultural extension messages to small scale farmers. Extension Workers, as change

agents, are often credited as one- way messengers who pass along to farmers a package of recommended farming practices which experts in the agricultural research sector decide would fit farmers' needs and are thus, expected to do their best to persuade farmers to adopt these farming practices (Leagans and Loomis, 1971:40). Extension agents embark upon a top-down agricultural extension delivery system in information and innovations where they are perceived as experts or owners of information by the beneficiaries. Maramwidze (1994:68) observed that this perception is geared towards teaching or training the small scale farmers the modern way. Rodgers (1962:254) also stresses the role of the change agents, He writes:

“... the change agents position is a linker between the change agency and the client systems. As a bridge between two differing systems the change agents are a marginal figure with, each one foot in each of the two worlds. His or her success in linking the change agency with the client system often lies at the heart of the diffusion process.”

This puts the role of the change agent in an awkward position. This is because the change agent who is merely acting as a conveyor belt in transmitting agricultural information, receives blames from both the farmers at activity level and the experts at the supervisory level. The experts develop technologies which are transferred to small scale farmers through a change agent. In such a situation, small scale farmers perceive the change agent as

one who brings to them complicated and irrelevant recommendations and practices which do not work in their situation. This scenario is similar to a study in Zimbabwe by AGRITEX (1998:7) who observed that the recommendations made had often failed to address farmers' felt needs and constraints because the practices tended to ignore the farmers' diverse local contexts.

On the other hand, the supervisors and experts blame the change agents at camp level as being lazy, inefficient and ineffective in delivering the agricultural innovations to the small scale farmers. Mwansa (1993:21) confirms this statement and adds that; quite often, it happens that researchers blame extension workers that they have not been able to convince the farmers in the field.

However, this might not be the fault of extension workers at the camp level. In some cases the messages may not be appropriate as alluded to earlier. Rodgers (1962:319), explains that one of the most important and difficult roles for the change agent is to diagnose clients' real needs. He cites, that diffusion campaigns often fail because change agents are more innovative minded than client oriented. They scratch where the clients do not itch. Therefore, it becomes a common phrase that, extension workers just sit and are paid for nothing.

Thus, small scale farmers tend to perceive the role of extension agents with mixed feelings, including the innovations the experts bring to them. Farmers tend not to respond appropriately and quickly, unless they clearly understand the relevance of the technology and the benefit they would gain from the innovations.

Looking at the foregoing sentiments, it stands not clear whether the government perception (through the extension service) about the problem areas of agricultural development, vis-avis it's strategies and methodologies to achieve the solutions, correspond to those of the small scale farmers. However, one can argue that the reasons for poor performance by small scale farmers in Zambia are many and varied. Maramwidze (1992:5) indicates lack of extension workers to fill in vacant camps, transport, poor infrastructure lack of qualified personnel to effectively run credit, poor marketing and other related administrative constraints. What surprises one is that even where and when these ills have been identified and steps taken to correct them, the situation does not improve and it is getting worse, characterized by farmers' apathy at village extension group meetings, household food insecurity, low income levels and generally high poverty levels among small scale farmers.

### **Perceptions About the concept Extension**

The concept or the term extension is not easily used. It is a relative term and has been studied on a comparative basis from one country to another. A

great many activities are covered by it and has been given many different meanings. Van and Hawkins (1985:54) have pointed out on a comparative basis that in the United Kingdom, Germany and Scandinavian countries, the focus of extension is on advisory work, thus, on solving specific problems; while in the American Tradition, the term extension education is used to emphasise that they deal with an educational activity, which seeks to teach people to solve problems by extending valuable information. These perceptions have usually taken a bureaucratic style of extension. Reactions against top-down definitions according to Freire (1972:93) have led to many counter terms such as animation, mobilization and conscientisation. Extension is thus, expected to achieve different purposes depending on the policy tradition, within which it functions. Neils (1988:40) observes that in conservative tradition, extension is seen as an instrument for helping people make well considered choices among alternatives which it has provided. The emphasis is on supporting the individual to make optional decisions with respect to achieving his or her goals. The individual is free to use or not to use the extension practices. This form of extension is referred to as informative extension.

Furthermore, Hope and Timmel (1984:19-26) observed in their study about rural extension that in socialist and Christian traditions, extension is seen as an instrument of emancipation and upliftment of the poor; a pedagogy of the oppressed as Paulo Freire the reknown Brazilian adult educator called it.

Therefore, extension could be a good instrument for achieving societal objectives and for correcting structural problems. In both traditions, there is considerable emphasis on the use of extension for developing the human being on farming or enhancing his or her capacities to make decisions.

In relation to the above, a study by Neils (1988:40), indicated that in most countries, extension was deployed, first of all, as an instrument to achieve policy goals, thus, an instrument to make individuals or farmers behave in ways which are conducive to achieve policy goals. Agricultural extension had been earmarked as one where most developing countries use agricultural extension services as one of the instruments for developing the agricultural industry and not for helping the individual farmers. Usually, priority is given to areas such as export goals, national food security and others above the welfare of individuals. Neils (1988:47) further explains that very few governments would, for examples, look upon extension services as instruments to maintain employment opportunities in agriculture. If agricultural extension is used for the benefit of the individual farm families, it is usually deployed by voluntary agencies who seek to assist the rural poor. These examples are becoming common in the Zambian situation where the policy of economic liberalisation has seen a number of voluntary agencies in the name of Non-governmental Organisations, United Nations Agencies and other private organisations taking part in agricultural related activities to involve the general population. It was, therefore, among the objectives of this

study to determine the idea of agricultural extension in Zambia and how it is used to induce change among small scale farmers. Furthermore, the study intended to determine how farmers at activity level participated in agricultural practices in response or in relation to the top-down type of extension delivery and to tease out extension type (s) which best suit their local situation.

## **CHAPTER THREE**

### **METHODOLOGY**

#### **Research Design**

The study relied on both qualitative and quantitative research approaches. These approaches enabled the researcher to clarify more about the research variables and objectives. A survey research type was followed and took a baseline form, since the study was the first of its kind in Kyafukuma Agricultural Camp of Solwezi District.

#### **Population**

The study targeted only small scale farmers in Kyafukuma agricultural camp who were recorded in the camp register and were members of village extension groups.

#### **Sample and Sampling Procedure**

The study drew a sample from the universe by conducting a simple random sampling procedure. A lottery technic was conducted. This procedure ensured an equal opportunity to each element for inclusion in the sample. The sample size for this study was forty (40)) small scale farmers of both sexes who were among those registered in camp records and belonged to village extension groups.

### **Research Instruments and Data Collection**

Data Collection instrument prepared to collect data in this study were questionnaires. The questionnaires with both closed ended as well as open ended questions were administered to farmers. All the questions were prepared in English language. Enumerators conversant with the local language Kikande were used to conduct the data collection.

### **Data Analysis**

The raw data collection was analysed manually through engaging both quantitative and qualitative data processing procedures. It included editing and classifying the data. Then, the data was analysed in form of use of percentages and pie-diagrams. The data was further discussed to determine the findings of the study in relation to the research objectives.

## **CHAPTER FOUR**

### **DISCUSSION OF RESEARCH FINDINGS**

This chapter presents the findings of the study which was conducted to assess the impact of bureaucratic form of agricultural extension on small scale farmers' participation in agricultural activities in Kyafukuma Agricultural Camp.

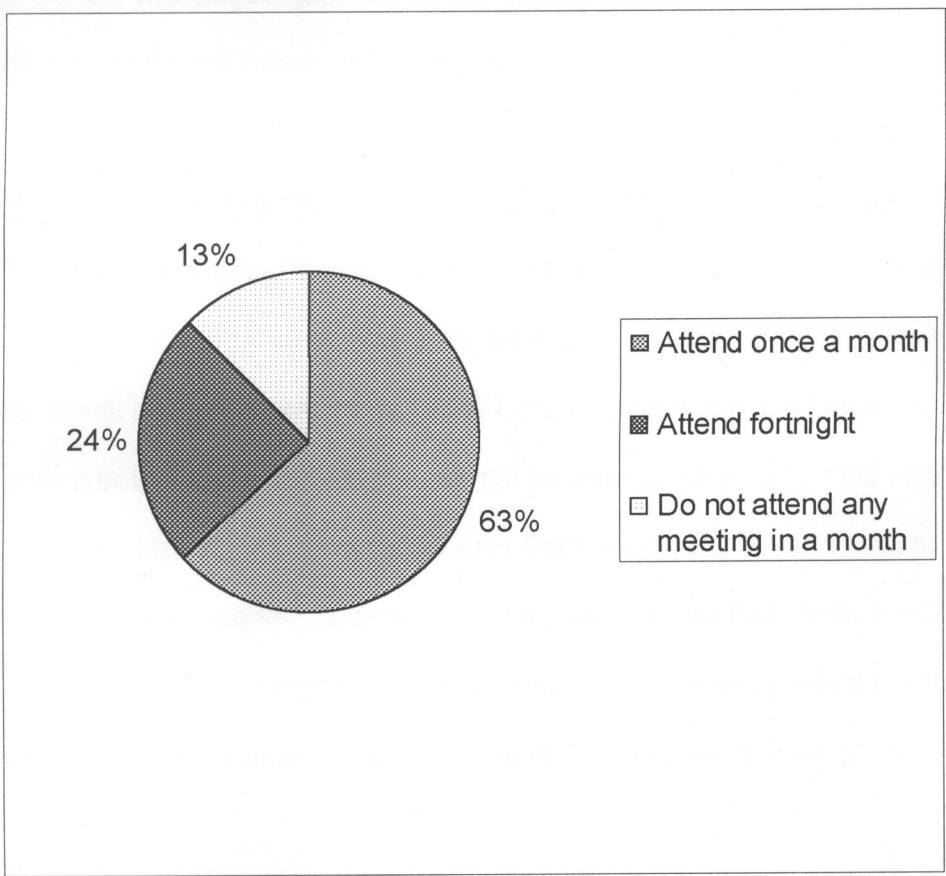
#### **Attendance at Village Extension Group Meetings**

Village Extension Meetings involve farmer groups and are organised in such a manner that the Extension officer is expected to teach farmers at an agreed time. Small scale farmers receive extension messages from the camp extension officer. The success or failure of these farmer's meetings are determine by the attendance of members at a particular time. Attendance is an indicator to empirically reflect the response of small scale farmers to agricultural extension messages being delivered by the extension agent.

The study established that attendance at village extension group meetings was such that 62% of the respondents attended only once in a month, 25% attended fortnightly and 13% did not attend any meeting in a month. The Training and Visit (T and V) System demands that a camp extension officer is expected to meet (through a contact farmer) his or her farmer group ( a

minimum of 8 village extension groups in a camp) two times in a month. Farmers attend the meeting to learn skills and new ideas on certain agricultural recommendations and practices. The training courses in which small scale farmers get trained include, demonstrations mobile courses, farmer group management, credit and marketing programme. The statistics of attendance indicate that there was a problem of attendance in responding to these training programmes. Figure 1 below indicates proportions of farmers' attendance in a month.

**Figure 1 Proportions of farmers showing attendance.**



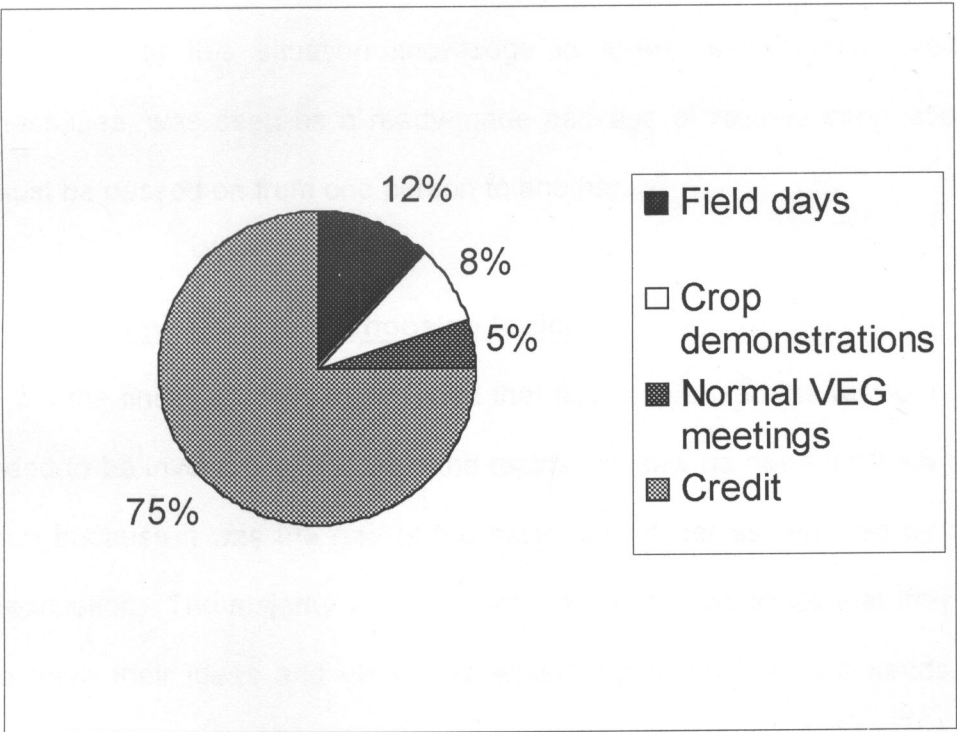
However, the findings of this study have shown that the majority of the small scale farmers in Kyafukuma Agricultural Camp, inspite of their membership in the village extension group, did not usually attend extension training programmes. This could be attributed to many reasons. Some farmers cited low attendance due to lack of interest in the extension messages, pre-occupation with church activities, illness and other personal reasons. From the findings it was found that inspite of recognising the presence of the extension officer in providing a service to the farmers, farmers did not get immediate benefits from the messages, such that the farmers opted for alternative means of activities for their survival. This could be because, the extension messages passed on to the small scale farmers did not really respond to the felt needs of the farmers.

#### **Motivating factors to Attend Village Extension Group Meetings**

The study established that small scale farmers got motivated to attend village extension meetings such that 75% were motivated by meetings associated with credit or agricultural loans. 12% cited fielddays, 8% said crop demonstration and 5% cited the normal extension meetings. This variation in motivation has a bias towards gaining from an incentive (agricultural inputs) than the much needed extension training aspect. Indeed, from the findings, the majority of the respondents explained that extension meetings that had agendas on procurement of agricultural inputs such as fertilizers and maize

seed on loan, were taken seriously because their future farming profitability depended on the availability of inputs. As shown in figure 2, the information obtained indicated that small scale farmers' motivation to attend the village extension meetings was demand driven towards the material incentive.

**Figure 2. Proportion of Motivating factors to attend VEG meetings.**



**Small Scale Farmers' involvement in group discussions**

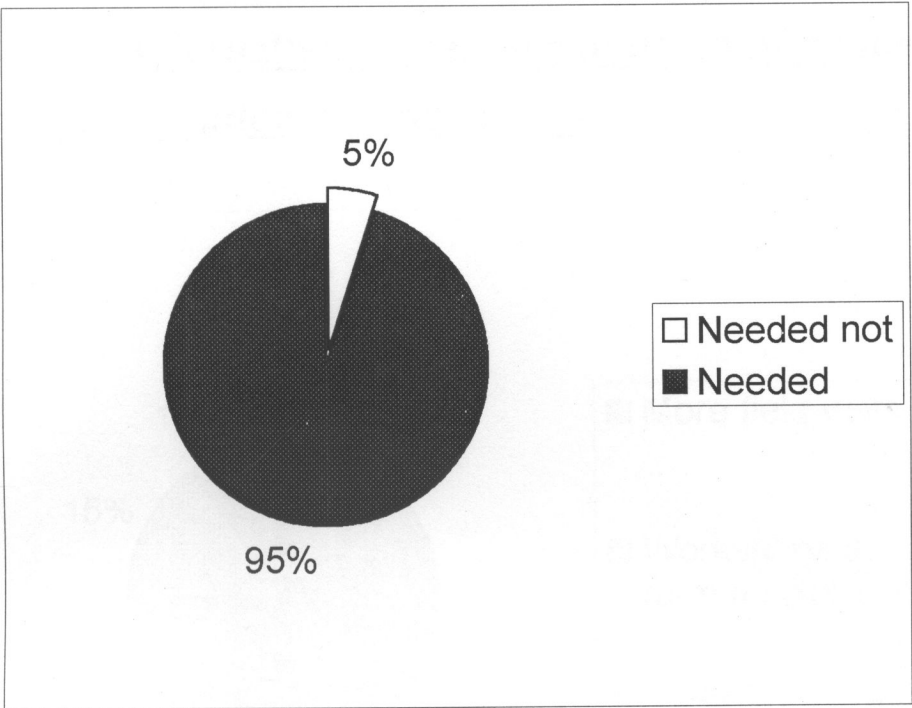
The study established that small scale farmer's involvement in group discussions was such that 87% of them, expressed that the extension officer acted like a teacher at the primary or basic school, where he decided and

prepared what should be taught as an expert in agricultural practices. 8% viewed that their group leader (contact farmer) decided on the agenda and 5% said some influential and well to do farmers decided on the topics on behalf of their fellow farmers, Therefore, the majority of the farmers were for the opinion that their extension worker was supposed to provide them with latest information from the 'Boma" (district agricultural office). It was found that farmers attended meetings to listen, as it had been happening in the past whereby, the farmers used to be called to attend a workshop at the local farm institute. In this situation knowledge in terms of agricultural technical messages, was seen as a ready-made package of reliable information that must be passed on from one person to another.

### **Farmer's involvement in choosing topics**

From the findings it was established that 95% expressed the willingness and need to be involved in choosing the topics 5% saw no need for them to take part because it was the role of the extension officer as required by his job description. The majority of the farmers, however, explained that they ought to have their ideas and views expressed based on their felt needs. The farmers said their extension officer, needed to prepare the lessons having in mind the farmer's interests. This response showed that the farmers wanted to exercise their democratic rights where they felt they had to be part and parcel of the decision making process in deciding their real farming needs. Figure 3 illustrates proportions of farmers who desired to be involved and those who did not in deciding on the topic discussion.

**Figure 3. Proportion of farmers who needed or needed not to be involved in deciding**

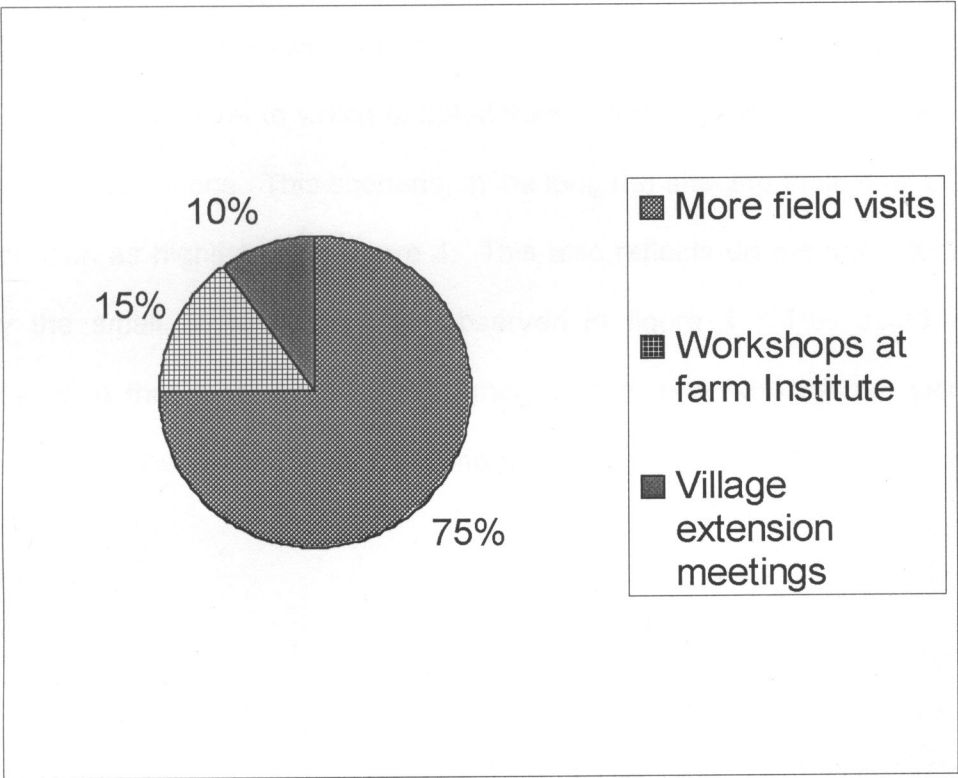


**Small scale farmers adoption rate in innovations**

The small scale farmers expected to learn more by doing as a result of the learning experiences they went through. It was found that most of the respondents did not put the extension messages into practice. The farmers said the messages taught were a mere hear-say and could not even be practiced at their fields. 75% suggested for more field visits by the extension officer than having lessons at home. 15% felt the old system of holding farmers workshops at the local farm institute should be revisited, while 10% insisted the current village extension meetings were okay. Figure 4 illustrates

the proportions for alternative modes of extension methods of increasing adoption of innovations.

**Figure 4. Alternative modes of extension methods to increase adoption of innovations**



The illustration in figure 4, indicates that the majority of the small scale farmers in Kyafukuma agricultural camp want to have a shift in the manner extension messages were delivered. 75% desired for more extension field visits to increase their levels of adoption through practicals right at their fields.

### **Interpretation of the term farmer participation**

It was found that small scale farmers had a mixed feeling about how they participated at village extension group meetings. 30% of the respondents said they actively participated during the group discussions while 70% did not usually get involved in the discussions. Farmers cited that the extension worker and the group leader dominated the discussion while they merely sat and listened. These views indicated that farmers participation was passive at the discussion level to which enabled them not to express their opinions and make contributions. This scenario, in the long run affected their level of adoption as highlighted in figure 4. This also reflects on the low attendance by the small scale farmers as observed in figure 1. This could be an indication that most activities designed by the extension system were not centred on the felt needs of the farmers.

## **CHAPTER FIVE**

### **CONCLUSION AND RECOMMENDATIONS**

#### **Conclusions**

Arising from the study, it was noticed that several factors surrounded the relationship between bureaucratic form of agricultural extension and small scale farmers participation in agricultural activities.

Owing to the fact that extension services in Zambia are structured and operated on the assumption that small scale farmers were on the receiving end, what had been established from the study indicated that participation of small scale farmers in agricultural activities had been characterized by apathy.

With regard to farmers attendance during village extension group meetings, low monthly attendance had been experienced as shown in figure 1. This kind of a trend clearly showed that the village extension group meetings were not functioning regularly. The erratic attendance implies that, farmers had little or no interest in what was going on in the meetings. The pattern of attendance appeared to improve seasonally. The seasonal increase was motivated by aspiration for material incentives ( applications for farming inputs), such that after the incentive fever was long gone, the pattern of attendance drastically dropped even in other related activities like demonstrations and fielddays, worse for the village extension group meetings.

It was no wonder some farmers belonged to the village extension groups to benefit from an incentive in form of a seasonal credit facility only.

The study also established that the extension officer was the sole decider of the type of agricultural messages to be discussed. The dominant stand taken by the extension officer had been challenged and was received with mixed feelings by the majority of the farmers interviewed. As the statistics in figure 3, show, 95% of the farmers were for the idea that they too, needed to be involved in deciding on the topic discussion reflecting their felt needs.

Perhaps their active involvement in the decision making process could have lessened the apathy characterized by low attendance at village extension group meetings and other organized agricultural events as highlighted in figure 1.

The study further established that the small scale farmers opted for a broadened learning catchment to increase on the rate of adoption of agricultural innovations and other practice besides their usual village extension group meetings as illustrated in figure 4.

The situation based on the findings indicated that the relationship between the extension service provider and the small scale farmers was top-down whereby the flow of extension messages or information was literally one way, that is, from the extension officer and less or not much from the other partner,

- the farmer. The feedback from small scale farmers during the study clearly showed to challenge the top-down extension approach. The majority of the small scale farmers expressed the need for them to be part and parcel of the decision making process at the activity level, without which their participation in agricultural extension activities had been characterized by apathy.

The study also established that there was no significant relationship between bureaucratic mode of agricultural extension and small scale farmers participation in agricultural activities.

### **Recommendations**

In light of the findings of this study, the following recommendations had been made:-

a. **practitioners of agricultural extension.**

i. The extension system at camp level should exercise flexibility in coming up with extension messages. The system at the camp should bear in mind to synthesize both messages from the National Agricultural Extension Services and the felt needs as expressed by the local farmers.

ii. The extension system at the camp level should equally be flexible enough to adopt to a teacher – learner relationship whereby during extension training sessions, the teacher takes the role of the learner and the learner

takes the role of a teacher. A give and take link should be developed to achieve an effective extension delivery.

iii. As subjects of the extension services, extension officers should develop and have consistent and diversified extension messages that reflect the felt needs of the farmers.

**b. Policy makers**

i. The Ministry of Agriculture and Co-operatives should consider revisiting the top-down extension approach so that it responds to the liberalised patterns of the agricultural sector.

ii. Government should show its political will to equip the extension service at activity level with transport and extension kit to effectively service the felt needs of the farmers.

iii. Government should broaden the agricultural marketing base to encompass other agricultural enterprises to enhance farmer's participation in agricultural activities

**c. Future researchers**

This study had focused on the impact of the top-down mode of agricultural extension delivery on the participation of small scale farmers in agricultural activities. Future researchers should perhaps investigate other levels of participation by small scale farmers from where they can effectively increase agricultural productivity.

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UNIVERSITY OF ZAMBIA

SCHOOL OF EDUCATION

DEPARTMENT OF ADULT EDUCATION AND EXTENSION STUDIES

QUESTIONNAIRE FOR SMALL SCALE FARMERS

Dear Respondent,

Kindly answer the following questions as frankly and honestly as you can. The purpose of this questionnaire is to determine how you participate in agricultural extension activities. The information sought will be strictly confidential and will be used for academic purposes.

INSTRUCTIONS

- 1. Tick your answer in the space provided [✓] and write down in the spaces for non-multiple questions.
- 2. Please do not write your name.

PART 1

PERSONAL INFORMATION:

- 1. Sex
  - a. Male [ ]
  - b. Female [ ]
- 2. Age
  - a. 21 – 30 [ ]
  - b. 31 – 40 [ ]
  - c. 41 – 50 [ ]
  - d. 51 – 60 [ ]
  - e. 61 – 70 [ ]
  - f. 71 – 80 [ ]
- 3. Marital Status
  - a. Married [ ]
  - b. Single [ ]
  - c. Divorced [ ]
  - d. Widowed [ ]

- 4. Educational level
  - a. Primary [ ]
  - b. Junior Secondary [ ]
  - c. Senior Secondary [ ]
  - d. College [ ]
  - e. University [ ]

**PART 2**

**INFORMATION ABOUT ACCESS TO AGRUCULTURAL EXTENSION ACTIVITIES**

- 5. Do you attend Village Extension Group meetings with the local Extension Officer?
  - a. Yes [ ]
  - b. NO. [ ]
  
- 6. If yes in question 5, how often do you attend the Village Extension meetings?
  - a. Once in a week [ ]
  - b. Once in two weeks [ ]
  - c. Once in a month [ ]
  - d. Once in a year [ ]
  
- 7. If No in question 5, what do you think are the reason?
  - a. Not interest [ ]
  - b. Long distance to venue [ ]
  - c. Not relevant to my needs [ ]
  - d. Iam too busy to attend [ ]
  - e. other specify).....  
 .....  
 .....
  
- 8. What motivates you most to attend agricultural extension activities?
  - a. A meeting called by the extension officer [ ]
  - b. When called to attend a crop demonstration [ ]
  
  - c. When called to apply for loans [ ]
  - d. When called to attend a fieldday [ ]
  - e. others(specify) .....  
 .....  
 .....

9. When you attend Village extension Group meetings who decides on the type of message to be taught or discussed.

- a. the farmer group [ ]
- b. the Extension officer [ ]
- c. the individual farmer [ ]
- d. others(specify

.....  
.....  
.....

10. During Village Extension Group meetings. Do you actively participate or contribute in the discussion?

- a. Always participate [ ]
- b. Sometimes participate [ ]
- c. not at all [ ]
- d. others(specify)

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.....

11. If the response to question 10 is "not at all, What could be the reason for not participating?

- a. Not allowed to contribute [ ]
- b. feel shy [ ]
- c. It is the duty of the extension worker [ ]
- d. other(specify)

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.....

12. Do you think you as a farmer need to be involved to decide on what you should learn from the extension officer.

- a. Yes [ ]
- b. No. [ ]

13. If the answer in question 12 is Yes, give reasons for your response.

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14. If the answer to question 12 is No. give the reasons for your response.  
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15. How would you want the extension system at the camp level to be run?  
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16. How would you as a farmer want to be involved in agricultural extension activities to benefit more in your farming?  
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17. What can you suggest to Government on how to improve the agricultural sector among small scale farmers in your area?  
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.....

**End of Interview**

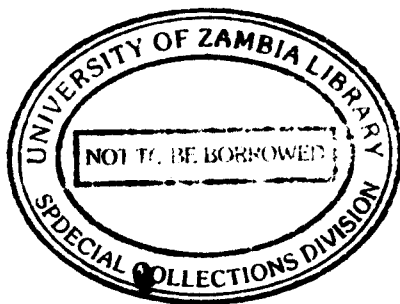
**Thank you for your cooperation**

BUDGET

| DESCRIPTION                                              | UNIT                    | NO OF UNIT | UNIT RATE (K) | TOTAL (K)      |
|----------------------------------------------------------|-------------------------|------------|---------------|----------------|
| <b>1 PERSONNEL COSTS</b>                                 |                         |            |               |                |
| Research Assistants                                      | Meal-Allowance<br>s     | 2 days     | 50,000        | 100,000        |
| <b>Sub total:</b>                                        |                         |            |               | 100,000        |
|                                                          |                         |            |               |                |
| <b>2. Non Personnel Costs<br/>Stationery/Secretarial</b> |                         |            |               |                |
| Paper                                                    | Reams                   | 1          | 25,000        | 25,000         |
| Typing                                                   | Pages                   | 80         | 2,500         | 200,000        |
| Photocopying                                             | Pages                   | 360        | 150           | 54,000         |
| Cover design and Binding                                 | Copies                  | 4          | 25,000        | 100,000        |
| <b>Sub total</b>                                         |                         |            |               | 479,000        |
| Contingency                                              | 10% Non Personnel Costs |            |               | 47,900         |
| <b>Grand Total:</b>                                      |                         |            |               | <b>626,900</b> |
|                                                          |                         |            |               |                |

TIME SCHEDULE

| ACTIVITY                  | FEB | MAR | APR | MAY | JUN | JUL | AUG | SEPT | OCT | NOV | DEC |
|---------------------------|-----|-----|-----|-----|-----|-----|-----|------|-----|-----|-----|
| Selection of topic        |     |     |     |     |     |     |     |      |     |     |     |
| Proposal writing          |     |     |     |     |     |     |     |      |     |     |     |
| Questionnaire Development |     |     |     |     |     |     |     |      |     |     |     |
| Data Collection           |     |     |     |     |     |     |     |      |     |     |     |
| Data Analysis             |     |     |     |     |     |     |     |      |     |     |     |
| Draft Report              |     |     |     |     |     |     |     |      |     |     |     |
| Final Report              |     |     |     |     |     |     |     |      |     |     |     |
|                           |     |     |     |     |     |     |     |      |     |     |     |



**THE UNIVERSITY OF ZAMBIA**  
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P O BOX 32379  
Lusaka, Zambia

Your Ref:

June 1....., 2004

NAME: Phiri Clement.....

**TO WHOM IT MAY CONCERN**

**RE: RESEARCH UNDERTAKING**

The bearer(s) of this letter is a student in the Diploma/Degree<sup>✓</sup> in Adult Education. He/she has been requested to undertake research in your organization as part of his/her learning experience. Your help and cooperation in this regard will be highly appreciated by the department, as this will enable the student to link theory work, which is offered in the class, and practical work, which can only be obtained from organizations like yours.

I look forward very much to a favourable response in this regard.

Yours faithfully

for   
D.M. Sibalwa (Dr.)  
**ACTING HEAD OF DEPARTMENT**  
**ADULT EDUCATION AND EXTENSION STUDIES.**

University of Zambia  
School of Education  
Department of Adult Education and Extension studies  
P.O. Box 32379  
**Lusaka**

18th October, 2004

The District Agriculture Coordinator  
Ministry of Agriculture  
P.O. Box 110241  
**Solwezi**

Dear Sir//Madam,

**Re: APPRECIATION FOR PERMISSION TO CONDUCT A DATA  
COLLECTION EXERCISE IN YOUR AREA**

I wish to express my sincere thanks and appreciations for allowing me to conduct a research that was carried out on your farmers in Kyafukuma Agricultural Camp.

I also thank the farmers in Kyafukuma for their hospitality and cooperation they rendered to me. I hope that the same spirit will continue even in future assignments.

Yours faithfully,



Phiri Clement  
**Student, adult Education and Extension Studies**