Assessing Extension Staffs’ Competencies in Mitigating HIV/AIDS.

A Study of Central Province, Kenya

A research Project Submitted to Van Hall Larenstein, University of Applied Science in Partial Fulfillment of the requirements for the Degree of Masters of Development Specialization AIDS and Rural Development

By
David Nganga Kiiru
September 2008

Wageningen
The Netherlands
© Copyright David Nganga Kiiru, 2008. All rights reserved.
ACKNOWLEDGEMENT
I thank God for giving me strength, courage, and grace during my study in the Netherlands.

I thank the Dutch government for awarding me a fellowship and the Government of Kenya for allowing me to study in the Netherlands.

I sincerely thank my supervisor, Ms. Koos Kingma for the inspiration and valuable comments, suggestions and guidance she made while I was writing my research project thesis, which made this work possible.

I specially thank all lecturers in the MOD course for their valuable advice and encouragements during the development of the proposal and the whole period of my study. Thanks also go to the entire Van Hall Larenstein University of Applied Sciences for their support. I am grateful to all RDA participants and the other MOD and APCM students for their support and encouragement during the study.

Special thanks go to my corridor mate in Djikraff 17A for their support and encouragement during my stay in the Netherlands.

I acknowledge the support of the DAOs, the DIGMOs, and other officers, the farmers who shared their knowledge and experiences with me.

I thank my mother for prayers before and during my studies in the Netherlands. I thank my friends in Kenya and Netherlands for their support and encouragement.

Finally, I thank my wife, Susan Mbuiya for her support and encouragement during my study and for taking very good care of the children; and my daughter Bernadetta Wanjiku and Moses Kiiru for being so understanding.

May God bless you all.
<table>
<thead>
<tr>
<th>Acronym</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACU</td>
<td>AIDS Control Unit</td>
</tr>
<tr>
<td>BBS</td>
<td>Broad Based Survey</td>
</tr>
<tr>
<td>CACC</td>
<td>Constituency AIDS Control committee</td>
</tr>
<tr>
<td>CAP</td>
<td>Community Action Plan</td>
</tr>
<tr>
<td>DAO</td>
<td>District Agricultural Officer</td>
</tr>
<tr>
<td>MoA</td>
<td>Ministry of Agriculture</td>
</tr>
<tr>
<td>NALEP</td>
<td>National Agriculture and Livestock Extension Programme</td>
</tr>
<tr>
<td>NACC</td>
<td>National AIDS Control Council</td>
</tr>
<tr>
<td>KHADREP</td>
<td>Kenya HIV/AIDS Disaster Response Project</td>
</tr>
<tr>
<td>PAPOLD</td>
<td>Participatory Analysis of Poverty and Livelihood Dynamics</td>
</tr>
<tr>
<td>GTZ-PSDA</td>
<td>Promotion of Private Sector Development in Agriculture Project</td>
</tr>
<tr>
<td>NASEP</td>
<td>National Agricultural Sector Extension Policy</td>
</tr>
<tr>
<td>FADC</td>
<td>Focal Area Development Committee</td>
</tr>
<tr>
<td>FAO</td>
<td>Food and Agriculture Organization</td>
</tr>
<tr>
<td>KNASP</td>
<td>Kenya National HIV/AIDS Strategic Plan</td>
</tr>
<tr>
<td>FBOs</td>
<td>Faith Based Organizations</td>
</tr>
<tr>
<td>NGOs</td>
<td>Non-Governmental Organizations</td>
</tr>
<tr>
<td>FA</td>
<td>Focal Area</td>
</tr>
<tr>
<td>PRA</td>
<td>Participatory Rural Appraisal</td>
</tr>
<tr>
<td>PIGMO</td>
<td>Provincial Gender and Home Economics Officer</td>
</tr>
<tr>
<td>DIGMO</td>
<td>District Gender and Home Economics Officer</td>
</tr>
<tr>
<td>PDA</td>
<td>Provincial Agricultural officer</td>
</tr>
<tr>
<td>CBOs</td>
<td>Community Based Organizations</td>
</tr>
<tr>
<td>DAE0</td>
<td>Division Agriculture Extension Officer</td>
</tr>
<tr>
<td>PLWHA</td>
<td>People Living With HIV/AIDS</td>
</tr>
<tr>
<td>CIGs</td>
<td>Common Interest Groups</td>
</tr>
<tr>
<td>SHGs</td>
<td>Self Help Groups</td>
</tr>
</tbody>
</table>

1 Euro = Ksh. 100
# Table of Contents

**CHAPTER ONE** ................................................................. 6
1.0 Introduction ........................................................................ 6
1.1 Background Information ......................................................... 6
1.2 Impacts of HIV/AIDS on Agriculture in Kenya ......................... 6
1.3 Responses to Mitigate the Impact of HIV/AIDS on Agriculture in Kenya ......................................................... 7
1.4 Problem Statement ............................................................. 8
1.5 Objective........................................................................... 8
1.6 Main Research Questions ....................................................... 8
1.7 Definition of Concepts .......................................................... 9
1.8 Conceptual Framework ........................................................ 10

**CHAPTER TWO - HIV/AIDS AND COMPETENCY NEED FOR AGRICULTURAL EXTENSION STAFFS** ............................................................... 12
2.1 Introduction ........................................................................ 12
2.2 HIV/AIDS and Rural Development Organizations ..................... 12
2.3 Impact of HIV/AIDS on Agricultural Extension Services .............. 12
2.4 Impact of HIV/AIDS on Households Affected ............................ 13
2.5 Training and Capacity Building for HIV/AIDS Mainstreaming in Agriculture ......................................................... 15
2.6 Potential Role of MoA in Mitigating the Impact of HIV/AIDS ........... 16
2.7 Agricultural Extension Services Addressing HIV/AIDS in Kenya ................................................................. 18
2.8 Knowledge, Skills and Attitudes Required By Extension Staff to Mitigate Impacts of AIDS ................................................................. 20

**CHAPTER THREE** ................................................................. 23
3.0 Research design and methodology ........................................... 23
3.1 Introduction ....................................................................... 23
3.2 Research Area .................................................................... 23
3.3 Respondents and Selection Criteria ........................................ 25
3.4 Limitation of the Study ......................................................... 27
3.5 Methods of data processing ................................................... 28

**CHAPTER** ........................................................................... 29
4.0 RESULTS ........................................................................ 29
4.1 Introduction ....................................................................... 29
4.2 The Ministry of agriculture Training Programme .......................... 29
4.3 Relating Effects of HIV/AIDS on Agriculture Extension Work after the Trainings ......................................................... 31
4.4 Information Updating After the HIV/AIDS Trainings .................. 33
4.5 HIV/AIDS affected Households and Extension Services ............. 34
4.6 Effects of Communication on HIV/AIDS with Farmers on Extension Services ................................................................. 36
4.7 Targeting HIV/AIDS Affected Households .................................. 37
4.8 Efforts by Extension Staffs to improve food and nutrition security in Households affected by HIV/AIDS ................................................................. 38
4.9 Gaps in Knowledge Required By Extension Staffs to Successfully Deal With HIV/AIDS Affected Households ................................................................. 40

**Chapter Five** .................................................................... 42
5.0 Discussions ...................................................................... 42
5.1 Training to Improve the Knowledge of Extension Staffs on HIV/AIDS ................................................................. 42
5.2 Attitudes of Extension Staffs on HIV/AIDS Affected Households ................................................................. 43
5.3 Knowledge and Skills to Mitigate Impacts of HIV/AIDS ............. 44
5.4 Gaps in Competencies to Deal with HIV/AIDS ......................................................... 48
5.5 Institutional Factors Affecting HIV/AIDS Mainstreaming In Extension ............. 49

**Chapter 6** ......................................................................................................................... 51
6.0 Conclusions and Recommendation ........................................................................ 51

6.1 **Recommendation** ...................................................................................................... 52
References ............................................................................................................................... 54
Annex .................................................................................................................................... 56
CHAPTER ONE – INTRODUCTION

This research paper have been prepared towards the accomplishing a final thesis which forms part of the professional Masters of Development in Rural Development and AIDS held at Van Hall Larenstein, University of Applied Science, part of Wageningen University and Research Centre.

1.1 Impacts of HIV/AIDS on Agriculture in Kenya

Agriculture in Kenya employs around 80% of the population mostly in the rural area and consequently contributes 26% to the Gross Domestic Product (GDP) (MoA, 2006). In addition agriculture indirectly contributes 27% of the country’s GDP through manufacturing, distribution and service-related sectors. The Ministry of Agriculture is the leader in the agriculture and rural development sub-sector is hence crucial in the fight against poverty. The epidemic has affected the core of agriculture production through the death of persons in the age bracket 15-49 years. This has changed the clientele base of the extension service with emergence of child headed families and the elderly persons coming back in the agricultural production cycle.

According to the Kenya HIV/AIDS Data Booklet (NACC, 2005), there are about 1.3 million people in the country living with HIV/AIDS; it is also estimated out of the total people affected about one million are in the 15-49 years bracket. The pandemic thus is mostly affecting the most productive people who form the backbone of families, communities and businesses. This has had a great adverse effect on the economic development of the country. The effects of the HIV/AIDS pandemic on the agriculture sector which form the main economic activity in the rural area have huge impacts on the lives of the rural communities.

In Kenya as in most sub-Sahara African countries between 70-80% of the population earns a livelihood from agriculture and 60% of the food comes from subsistence farming (Topouzis, 2003). This means that majority of households in sub-Sahara Africa depend highly on subsistence agriculture as the main source of livelihood; these households also depend on human labor to perform agricultural tasks. Labor is affected when a household get affected by HIV/AIDS; there is repeated periods of illness; labor is diverted from agriculture to taking care of the sick. When death occurs in the household families have to bear funeral expenses; there is also disruption of intergenerational transfer of agricultural knowledge and skill. These translate into less land under cultivation, less labor-intensive crop production, less crop variety and less livestock production. The result is a loss of savings, assets and property in the affected households due increased medical and health expenditures, funeral expenses, and decreased income. These effects have resulted in reduced agricultural productivity; increased food and nutrition insecurity; and loss of livelihoods for the HIV/AIDS affected households.

Another effect of HIV/AIDS has been an increasing number of orphans. World wide the number of orphans due to AIDS has been on the rise. In Kenya there are an estimated 1 million children due to AIDS (NACC, 2005). There has been an increase in child headed households; grandparents have come back to farming in an effort to taking care of
orphans left behind. These categories of child headed households and elderly farmers have emerged as new clients for the MoA.

The HIV/AIDS epidemic has also had adverse effects on the MoA staffs. Morbidity and mortality among the extension staffs has seen an increase in staff to farmer ratio. These changes within the MoA and in the farming communities have affected the MoA service extension delivery. The ministry has being working with other collaborators such as the National AIDS Control Council (NACC) to try and respond to the challenges posed by the HIV/AIDS epidemic.

1.2 Responses to Mitigate the Impact of HIV/AIDS on Agriculture in Kenya

The NACC coordinates the multi-sectoral approach in the fight against the HIV/AIDS pandemic in Kenya. In 2001, the Ministry of Agriculture was among thirty three ministries which formed AIDS Control Units (ACUs) through the initiative of the NACC. The NACC provided the initial funding for the formation and equipping the AIDS Control Unit (ACU) and training of staff on mainstreaming HIV/AIDS in the agricultural sector. The trainings were to equip the staff with the capacity to steer the process of mainstreaming HIV/AIDS both internally and externally. Internal mainstreaming deals with addressing the way HIV/AIDS affect the staff of the Ministry; in external mainstreaming the goal was to look into how the HIV/AIDS pandemic was affecting the ministry’s clients the farmers and take measures to mitigate the impacts.

The ministry then formed eight provincial sub-ACUs and trained the focal points as Trainers of Trainers in mainstreaming of HIV/AIDS. The sub-ACUs were provided with funds allocated to the MoA by NACC through KADHREP to train the district focal persons and division extension staffs. The purpose of the training was geared towards creating awareness on HIV/AIDS. The expected results were behavior change among the staff; give them some insight of how the HIV/AIDS affect the agricultural sector and ultimately use some of the knowledge gained in their extension work.

The Ministry of Agriculture traditionally has been involved in poverty alleviation projects. Due to this the NACC has identified the ministry as a key player in the country’s effort to mitigate the impacts of HIV and AIDS. The Ministry has been putting measures towards HIV and AIDS mainstreaming through addressing it in the policy documents such as the National Agriculture and Livestock Extension Policy (NASEP) and the MoA strategic plan. The MoA has also adopted the Public sector HIV and AIDS Workplace Policy which was devised by the Directorate of Personnel Management (DPM). The National Agriculture and Livestock Extension Program (NALEP) which the country is implementing recognizes HIV and AIDS as an impeding factor in achieving the ministry objective of attaining food and nutrition security in Kenya.

The ministry expects all levels of its structure to undertake mainstreaming of HIV and AIDS. NACC as the major player in the multi-sectoral approach has given clear guidelines facilitate the process at provincial, district and divisional levels. The District Agricultural Officer has the mandate to ensure HIV/AIDS mainstreaming through initiating appropriate mitigation measures and rally stakeholders in addressing agricultural related interventions in the district and lower divisional levels (NACC, 2006).
The MoA extension staffs work through the Common Interest Groups (CIGs) approach in delivering extension services to the farmers. According NALEP (2006), during assessment of the its Phase 1 implementation; 57% farmer groups had activities related to prevention of HIV/AIDS; 40% were involved with HIV/AIDS awareness creation; 12% involved in home based care; and 6.9% in counseling of affected and infected persons. Only 8% were involved in nutrition programs and promotion of income generating activities for the affected and infected persons.

The vision of the ministry’s mitigation strategy is to implement activities on food and nutrition security which would improve the livelihoods of households affected by HIV/AIDS. However, the Ministry staff efforts cannot be classified as external mainstreaming; their efforts lean so much towards behavior change through partnering with such collaborators as the Ministry of Health and use of People Living with HIV and AIDS in their extension programs. One of the provinces in Kenya, Central Province will be the basis of study in assessing the effects of the trainings programme on providing extension staffs to address households affected by HIV/AIDS.

1.4 Problem Statement

The Ministry of Agriculture AIDS Control Unit (ACU) has been involved in steering the mainstreaming of HIV/AIDS in extension since its formation in 2001. Resources have been used for training 1985 extension staffs to provide them with capacity to address HIV/AIDS issues during their extension work. The ACU where the research was the head of the ACU when trainings were held is concerned that the trainings may have not give the extension staffs competencies required to address HIV/AIDS affected households in extension service provision.

1.5 Objective

The objective of the research is to contribute towards improvement of the Ministry of Agriculture HIV/AIDS training programme by providing an assessment to the competencies of the trained extension staffs in dealing with HIV/AIDS affected rural households.

1.6 Main Research Questions

To reach the above stated objective the following questions have been formulated to guide the research in assessing the competencies of the extension staffs in dealing with HIV/AIDS. For the research competencies have been divided in knowledge, skills and attitude.

What knowledge, skills and attitudes do the trained extension staffs have relevant to mitigate the impacts of AIDS?

Sub-Questions

1. What are the attitudes of the trained extension staffs towards working with members of HIV/AIDS affected households?
2. What efforts do trained extension staff put within an extension project to address households affected HIV/AIDS in terms of:
   • Ensuring they are targeted in extension interventions
   • Improving their nutrition and food security
   • Dealing with labor shortages
   • Promoting appropriate technologies
   • Income generating activities?
3. How have the instructions in the training attended contributed towards the ability of the extension staffs to work with HIV/AIDS affected rural households?
4. What are the gaps in knowledge, skills and attitudes between what the trained extension staffs have and what they need?

1.7 Definition of Concepts

In the research there will be concepts which will be used. This section will give these concepts perspective to assist providing direction for the research to be held later.

Mitigating the impacts of AIDS: Mitigating is providing an evolving answer to lessen the negative impacts of HIV/AIDS on affected individual and households (Muller, 2005).

Attitudes: attitudes are a stable system of beliefs concerning some object and resulting in an evaluation of that object. In surveys it is always assumed that superficial attitudes are a good guide to deeply held values or actual behavior (Abercrombie et al, 2004).

Skills: Skills are taken as the ability that a person has to do something well. Skills are gained by learning and practicing.

Knowledge: Knowledge is information and understanding about a subject a person has in his or her mind or is shared by all human beings.

Competency: Competence is the capability of a person or an organization to reach specific achievements. At the individual level competence is an integrated performance oriented capabilities, which consist of clusters of knowledge structures and also cognitive, interactive, effective and where necessary psychomotor capabilities, and attitudes and values, which are conditional to out tasks, solving problems and more generally, effective functioning in a certain profession, organization or role (Mulder, 2001).

Household: Households are composed of family members who live together, pool their resources and often share meals (Bruce and Yearley, 2006).

Mainstreaming HIV/AIDS: Mainstreaming HIV and AIDS externally is referred to as adopting an organization work in order to take into account susceptibility to HIV transmission and vulnerability to the impacts of AIDS with the target population. Mainstreaming AIDS internally is about changing organizational policy and practice in order to reduce the organization’s susceptibility to HIV infection and its vulnerability to the impacts of AIDS. This research will be dealing with external mainstreaming (Holden, 2004).

Multisectoral approach:
**Affected household:** these are households where one or more members is/are ill due to HIV infection or have died of AIDS. In this research household also taking care of orphans and sick members of the extended families are also included.

**Livelihood:** According to Ellis (2000) a livelihood comprises the assets (natural, physical, human, financial and social capitals, and the access to these (mediated by institutions and social relationship) that determine the living gained by the individual or household.

### 1.8 Conceptual Frame work

The conceptual framework presented below gives an illustration of the researchers thoughts in linking the HIV/AIDS trainings provided to the field extension staff to contributing to the improvement of livelihoods of HIV/AIDS affected households. The MoA is involved in mainstreaming HIV/AIDS into its core functions. This are indirect approaches to the fight against HIV/AIDS through; mitigating the impacts of the pandemic HIV/AIDS affected households to ensure improve food and nutrition security; analyze how HIV/AIDS pandemic is affecting the MoA service delivery and objectives; come up with a workplace policy to reduce the organization susceptibility to HIV and vulnerability to AIDS. Implementation of the process of mainstreaming in the MoA agriculture started with training of extension staffs country wide.

The trainings for the extension staffs on HIV/AIDS provided them with the basic knowledge on HIV/AIDS and prevention and care; some limited knowledge on external mainstreaming was covered on how the HIV/AIDS pandemic affect the agricultural sector. The knowledge on HIV/AIDS gained during the training would instill confidence among the extension staffs on how to introduce and deal with HIV/AIDS issues in the ongoing activities.

Extension staffs have a lot of experience and skills in implementing agricultural interventions related to poverty alleviation. Through their formal technical training, on job trainings and their work experience, the extension staffs have knowledge on appropriate technology for vulnerable households. These technologies which they have been promoting and implementing during extension service delivery are; labor saving technologies; low input crops; keeping of small livestock; income generating activities. The combination between their technical knowledge, work experience, the knowledge provided in the training on HIV/AIDS and the opportunities available within working in the project can translate into targeting the HIV/AIDS affected households. The extension staffs can use the skills acquired and HIV/AIDS training to design interventions and undertake activities which can mitigate the impacts of AIDS in the households affected by the HIV/AIDS epidemic. This would result in improved livelihoods for the HIV/AIDS afflicted households.
Figure 1: Conceptual Framework of the Research.
(Source: Author September 2008)
CHAPTER TWO - HIV/AIDS COMPETENCIES REQUIRED BY EXTENSION STAFFS

This section looks the ways the pandemic has affected the development organizations work. It also looks at the ways the development organizations can handle capacity building to accomplish the HIV/AIDS mainstreaming aspirations. Finally it also explores the competencies required of the extension staff to be able to handle mitigation of the effects of HIV/AIDS in the communities they are working in.

2.1 HIV/AIDS and Rural Development Organizations

Initially the HIV/AIDS pandemic was being handled from a medical perspective. Later it was realized that the pandemic has its adverse developmental implications. A multi-sectoral approach to dealing with the pandemic is advocated for to address to reduce the impacts it was having on development. This approach required all organizations dealing with development to mainstream HIV/AIDS into their core functions. This means the organizations staffs have to take on new roles where some have no capacity or proper understanding of this role.

Reorientation of the organization work and staff to create capacity to handle this new area of work was needed. Policies and strategies have been changed to accommodate the changes. According to Holden (2003), AIDS affected households may be excluded if a development agency fails to update their targeting strategies. However, according to the Sector Network Rural development, Africa (2002) there are still huge gaps in how to address HIV/AIDS in agriculture extension work: some have inadequate knowledge; others show no interest; and most do not know what to do. Due to these capacity gaps households affected with HIV/AIDS do not get extension services or may be they do not get what they need. Exclusion may arise where development staffs have a judgmental attitude towards people and households affected by HIV/AIDS (Holden, 2004). Rural development organizations must build extension staffs capacity to address changes in their work brought about by the HIV/AIDS. (Qamar, 2001)

2.2 Impact of HIV/AIDS on Agricultural Extension Services

Subsistence farmers in the developing world have mainly depended on government services for extension services. The HIV/AIDS epidemic has had a great tool on extension staffs; this has been through an increase mortality and morbidity due to the HIV/AIDS epidemic. Extension services delivery have been affected as; there is loss of skills and technical capacity in the ministry. Extension services are also disrupted when the staffs have to take care of sick family members family members; attend funerals of family members and colleagues. Those left have to bear the burden of more working terms of larger area and high number of farmer households to offer service. One effect is the increases in the workload of Ministry of Agriculture (MOA) staff that leads to severance of key linkages in the organization and service delivery chain and compromises the quality, scope and continuity of agricultural extension services (Nguthi, 2007). Since extension staff stay within the communities they work they also attend
funerals and hence reduced time for extension services. According to Brinkman and Westerdorp (2005) the workload of extension staffs has increased by 35% but the output is less; work is carried out with less efficiency; delayed and agricultural extension coverage has decreased by 26%. Could you give more examples and evidence of these statements?

The second effect is the impact that the disease has on depleting the pool of highly skilled and specialized personnel. During sickness they cannot effectively and efficiently provide services to the community and after death, it takes sometime before a replacement is made (NAADS, 2004).  Is this impact different than extension workers dying of other causes?  There is inadequate extension staff to adequately implement mitigation measure due to a high staff farmer ratio (ECA-SA, 2005). There is also a drain of MoA resources due to the direct/indirect costs of HIV/AIDS such as medical bills, life insurance claims, death gratuities and funeral expenses that are likely to result in reduced funds for service provision. You should come up with evidence. And make plausible that it is related to HIV AIDS and that it is different than impacts related to other diseases.

Over the years reduction of public extension staffs through has changed the extension approach from individual approach to use group approach. When HIV/AIDS enter a community there is changes which affect the extension service. Labor for farm operations is reduced as more able persons are involved in caring for the sick members of their families. Farmers are not able to attend extension related activities as they attend funerals brought about by increased mortality due to HIV/AIDS. These changes disrupt scheduled planning meetings such as Participatory Rural Appraisals (PRAs) and group meetings are not held as scheduled. Farmer trainings and setting up of demonstration plots are not attended by all the farmers. This means there implementation of workplans and attainment of target set cannot be accomplished. Adoption rate for technologies promoted by extension staffs goes low as the affected households divert the money to medical expenses low use of inputs such as fertilizers. Labor is diverted to taking care of the sick and farm operations such as planting for rain-fed crops are delayed; weeding is not done and harvesting is sometimes delayed.

There have also been a gradual change in the clientele base for extension with more widows headed household, orphan headed households and elderly people. There have also been changes of agricultural system. Subsistence farming mostly is mixed crops and livestock. Sale of livestock for medical and funeral expenses leaves farmers without a source for organic manure. As farming changes there are demands for income generating activities and technologies which can be used to mitigate the impact of AIDS. All these changes brought by HIV/AIDS in the farming communities bring in new competencies requirements for the extension staff.

### 2.3 Impact of HIV/AIDS on Households Affected

Extension service providers such as the MoA must understand well how the HIV/AIDS epidemic is affecting is the farming households. This would give the direction to designing interventions which Guerny (2002) should be focused at the; 1) farm system level and 2) farm-household system. This would also assist an organization to understand what competencies are required to mitigate HIV/AIDS.
Smallholder agriculture in sub-Saharan Africa relies almost exclusively on family labor. This labor often is the only productive resource the poor possess. This resource can be utilized either on the farm for food and cash production or off-farm through migration to town to look for work to supplement cash requirements. The rural farm-households are more and more dependent on off-farm sources of income; whether it is cash to buy inputs into the farm (seed, fertilizers, pesticides or equipment), improve the nutrition of the household or pay for school fees or medical costs (Guerny, 2002). Those who migrate are liable for exploitation and exposure to HIV infection. When migrants start getting sick they go back to the rural area where there is a better chance to get family and community support if not overstretched. According to Guerny (2002) this structural link between the farm-household and the outside world, established through the movement of household members, creates the channel for the flow of both cash and HIV.

![Diagram of household, farm, and off-farm activities]


When HIV/AIDS enter in a rural household the related morbidity and mortality have an adverse impact on the productive capacity of rural households. Absenteeism from work due to poor health as the disease progresses affects household income. The AIDS epidemic is having an enormous effect on households, which comes in various forms: increased medical and health expenditures, funeral expenses, and decreased income. The result is a loss of savings, assets and property in the affected households.

By attacking the able-bodied and active adolescents and adults, HIV/AIDS undermines the farm-household through the direct loss of labour for the farm and of time available for both farm and household tasks. In order to cope with this, the farm household has to reallocate both available labour and the time of the household members. In their study in Kenya Yamano and Jayne (2004) found that the death of a household head reduces net crop output by 68%. They also suggest it could be possible that poor households are less able to acquire the knowledge to acquire inputs, credit, and crop husbandry practices that might be lost with the death of a working age adult. The dynamics that unfold within AIDS afflicted and affected rural households poses a threat to the food security of such households or worsen an already food insecure situation (Muller, 2004). Members of households affected by HIV/AIDS do not attend consultation meetings/forums to give their needs. This means they do not participate on needs assessment stage of the project and may be excluded later (Holden, 2004).
2.4 Training and Capacity Building for HIV/AIDS Mainstreaming in Agriculture

Ideally every employee in extension work should have a thorough understanding of the relationship of HIV/AIDS and agriculture and be skilled to combine technical skills to come up with appropriate mitigation responses (Holden, 2004). It is often assumed that MoA professional staffs are capable of addressing the adverse effects of the epidemic on their work (NAADS, 2004). Even though MOA staff may be confronted with HIV concerns on a daily basis, they are constrained by lack of skills of how to respond to the epidemic, as it is not part of their formal education and training (Nguthi, 2007). The idea for mainstreaming HIV/AIDS is underdeveloped and there is little experience to learn from and copy (Holden, 2004). Training of the extension staffs is essential to ensure they understand their mandate and duties in working in communities where HIV/AIDS is a development issue. For training to be done, the senior management staffs need to be convinced; policies and strategies formulated to this effect; training to be undertaken systematically to ensure mainstreaming of HIV/AIDS is adapted in extension work. Training of extension staffs and having training resources ready for use are part of being prepared for HIV/AIDS mainstreaming (Holden, 2004).

Training on HIV/AIDS should be practical oriented with participants sharing knowledge and practices in their field of work. As an institution offering support to households affected by HIV/AIDS there is need to; provide services without stigmatizing the affected household. Barnett and Whitesides (2006), the challenge is to recognize diversity of HIV/AIDS impact, learn from local circumstances and aim to create large scale responses. Governments have great difficult in dealing with diversity as it requires constant learning capacity and institutional adaptation.

Table 1: Themes and activities for training for external mainstreaming of HIV/AIDS

<table>
<thead>
<tr>
<th>Theme</th>
<th>Activity</th>
</tr>
</thead>
</table>
| Understanding the link between development and AIDS | Analyzing case studies to reveal:  
  • The complex causes of susceptibility to HIV infection;  
  • The reinforcing cycle of causes and consequences;  
  • The link between gender and HIV/AIDS. |
| Understanding the meaning of external mainstreaming of HIV/AIDS | Using examples to explore the differences between AIDS work and mainstreaming HIV/AIDS. |
| Learning how to undertake external mainstreaming of HIV/AIDS | Understanding the core questions for external mainstreaming of HIV/AIDS.  
  Talking about the next step: undertaking community research, and modifying development programs. |


Those staff such as the extension staffs who deal with the client will be equipped with knowledge and right attitude towards people living with HIV/AIDS. A the process of
mainstreaming HIV/AIDS to be successful, efforts must be made to change extension staffs attitude and impress upon them that HIV/AIDS is not a health matter but a development issue (MoA-Uganda, 2002). At this point a need assessment exercise should be carried out to identify gaps in coupling HIV/AIDS training and their technical training. Training on such gaps such as; co-ordination and networking skills, effective communication for extension workers dealing with PLWHAs, knowledge of the policy framework, resource mobilization, advocacy and lobbying, and monitoring and evaluation. Training should then be offered through any existing structures such as the technical college curriculum, in-service training and refresher courses. Relevant manuals and IEC materials should be identified or developed for use in the field.

2.5 Potential Role of MoA in Mitigating the Impact of HIV/AIDS

According to Holden (2004) the Ministry of Agriculture as a development agent may be faced by a scenario where the AIDS affected households are being excluded from the project; among the young people there are low levels of knowledge about the condition; and the carers for people bedridden with AIDS are desperately in need of support. Holden (2004) advises an organization wishing to undertake external mainstreaming of HIV/AIDS to respond to the first need of the households affected with HIV/AIDS. The organization would then need to form partnership with specialized organization to deal with the other two. More explanation

Ideally, a structured approach should be adopted to ensure effectiveness of the external mainstreaming process. An organization should first adopt a participatory approach in coming up with a viable workplace policy and programme. During this initial period all staffs will be give have basic knowledge of HIV/AIDS; prevention; stigma and discrimination; cultural context and HIV/AIDS; basic counseling skills. De-stigmatization and breaking the taboo of talking about HIV/AIDS is a precondition for the fight against HIV/AIDS, internally and externally (SLE, 2003). Where development agencies do not notice, or confront discrimination against people with HIV/AIDS, their lack of action suggest such behavior as acceptable (Holden, 2004).
Fig. 3. Government organization response to the HIV/AIDS pandemic


To accomplish the mainstreaming of HIV/AIDS in the MoA, capacity building is required at all levels. Poor understanding of mainstreaming interventions into programmes to mitigate the impact of HIV/AIDS is an issue that hampers development and implementation of policies on HIV/AIDS mitigation (ECA-SA, 2005). From top management at the policy level to the field extension staffs at the community level different competencies needs are required policy makers and management at the top, down to field workers at the community level. Planning is crucial in developing ideas and strategies for how to mainstream HIV/AIDS within the extension work and how to monitor its effects (Holden, 2004).

Policies and programmes in the MoA need to be adjusted to ensure that process mainstreaming of HIV/AIDS is accomplished. Resources should be set aside for capacity building. Reviewing existing guidelines and tools in extension methodologies on how to target households affected by HIV/AIDS and adequately respond to improve their livelihoods. The extension staffs implementing the MoA projects should ensure the households affected by HIV/AIDS are targeted. Holden (2004) argues that extension staffs should be sensitive to the consequences of AIDS and the needs of the affected households. The extension staffs should have the competencies to utilize resources within the MoA and those of stakeholders involved in mitigating the impacts of AIDS. Activities targeting the HIV/AIDS affected households in agricultural interventions should result in;
• Improving their nutrition and food security
• Addressing labor shortages
• Promoting appropriate technologies
• Income generating activities

While working with groups of vulnerable people (NAADS, 2004) recommends for extension staffs to ensure the following;
• Increase their knowledge and skills in addressing and sharing the problems they are experiencing, some of them being a direct result of HIV/AIDS
• Increase their confidence and belief that they can manage or deal with their own problems
• Allow them to build a more acceptable group image and recognition in the community
• Try and make sure that the groups will be independent enough to continue after the extension staff no longer works so closely with them (sustainability of the self-help groups).

2.6 Agricultural Extension Services Addressing HIV/AIDS in Kenya

Agricultural Extension services provision in Kenya have been traditional been provided through the public sector. The approach has been basically a poverty alleviation initiative. The Ministry of Agriculture piloted the National Agricultural and Livestock Project (NALEP) phase one in 43 districts from 1999 and which ended in December 2006 (MoA & MoLFD, 2007). Phase two of NALEP covering of all the 108 districts of Kenya started in July 2007. The project is expected to end in 2011. The NALEP project uses the division as the unit of planning and implementing unit. This is aimed at bringing extension services planning and implementation closer to the clients the farmers. Extension provision is mainly through a focal area approach. In the phase 1 of NALEP the FA was a delineated area with approximately 400 farmers. In the new phase the focal area has been modified to cover an administrative division. The target number of farmers to be reach in a FA is 2000 to 6000. This is for areas with high rainfall like the Central Province, Kenya. Arid and Semi-arid areas the target is set at 800-2200 pastoralists per FA.

Due to the high number targeted by the FA, the main extension services delivery is through group approach. This is done through getting farmers into Common Interest Groups (CIGs). However, individual farmers targeting is also employed. Those individually targeted are progressive farmers who might require services such as formulation of specific farm plans. The other category is the very poor farmers and vulnerable households such as those affected by HIV/AIDS who might need special attention during project planning and implementation (MoA&MoLFD, 2007). According to Holden (2004), such rules which keep the groups together like regular attendance to meeting and contribution may mean AIDS affected members are excluded.

Planning for the project starts with the identification of the FA. A Broad Based Survey (BBS) is carried out to generate information for activity planning. The BBS is a modified Participatory Rural Appraisal (PRA). It incorporates use of secondary data such as previous PRAs and reports of activities carried out in the area either by the MoA or other
developmental actors. The BBS is carried out for eleven days; two days are dedicated to carrying out a Participatory Analysis of Poverty and Livelihood Dynamics (PAPOLD). The PAPOLD aims at mapping the resource poor and the vulnerable groups which include; men and women; children; youth; HIV/AIDS affected households; disabled and the elderly (MoA&MoLFD, 2007). The information generated by the PAPOLD is used to inform the MoA extension staffs and the various stakeholders collaborating in the FA while planning on services needed by these vulnerable farmers. Emphasis during implementation is to be given to all farmers who have been identified during the BBS using the PAPOLD methodology. The provinces have trained officers on PAPOLD to facilitate the process to enable all the extension staffs to use the tool during the carrying out of the BBS.

Training of the extension staffs at the divisional level has been identified as crucial to their ability to achieve results. Among the training offered to the extension staffs are; farming as a business; HIV/AIDS counseling and guidance; poverty diagnosis and targeting; human rights and governance.

After the BBS the HIV/AIDS affected households are encouraged to form Self Help Groups (SHGs). The SHGs are then networked with stakeholders dealing with HIV/AIDS in the area (MoA&MoLFD, 2008). These SHGs are then linked to organization which can offer them assistance such as farm inputs and materials to start small income generating activities. These organizations are Non-Governmental Organizations (NGOs), churches, government projects such as Njaa Marufuku Kenya and GTZ-PSDA. Through this type of assistance the extension staffs have mobilize resources which SHGs have used to implement activities such as; provision and installation of energy saving stoves; dairy goat keeping; beekeeping; growing of traditional vegetables; fish farming and setting up of kitchen gardens. Extension staffs in the division provide technical support in the implementation of these SHGs demanded activities.

The Promotion of Private Sector Development in Agriculture Project (GTZ-PSDA) a project in the MoA was implementing interventions to installing 45,000 stoves in rural households. This was done by first improving stove production technologies through capacity building of women groups. Through this project some People Living with HIV/AIDS (PLWHAs) groups have been trained to install the stoves as an income generating activity. The energy saving stoves and fireless cookers have reduced the burden of women in productive roles such as fetching firewood. In the NALEP budget there are allocations of some funds allocated for implementation of interventions aimed at mitigating the impacts of AIDS.

The MoA has invested heavily in training agricultural extension staffs to conduct AIDS education. This result in the staff getting involved with awareness creation, condom promotion and distribution, sexually transmitted diseases, attendance to voluntary counseling and testing (VCT), treatment and care, support to HIV-positive people and orphan support. However, Holden (2004) alludes that few extension staffs discuss AIDS or give out condoms, because they are too embarrassed, and they believe it is a matter of specialist health workers. The extension staffs are not well trained on behavior change work and hence are not comfortable dealing with HIV/AIDS issues. When extension engage in AIDS education the quality of their messages is not good. Another implication is the added work load may negatively affect their core work. Farmers can get bemused when extension staffs take on the approach of raising some awareness
about HIV/AIDS and safe sex (CARE, 2002). This may come up if farmers were expecting the extension staffs to be discussing farming.

2.7 Knowledge, Skills and Attitudes Required By Extension Staff to Mitigate Impacts of AIDS

Organizations that do not have HIV/AIDS as their main focus encounter challenges related to finding ways to deal with and adjust to the pandemic in a way that is congruent to their core business (A. Mulder, no date). For the MoA the challenge is how to change extension services to the reality of HIV/AIDS. Qamar (2001) argues that the agricultural extension organizations are not expected to medically involved in the fight against AIDS, but they can play an extremely role in preventing or at least minimizing the further spread of education by educating the farming communities. Due to the nature of activities such as extension, agricultural organizations have staffs that are very familiar how rural households attain their livelihoods. They also have a lot of experience in community mobilization in working on poverty alleviation initiatives.

The HIV/AIDS pandemic has changed the clientele base of extension works. Nowadays their target population has changed from able bodied farmers to include physically weak, sick, elderly persons, widows and orphans. Many extension workers in developing countries are not adequately train on HIV/AIDS during pre-service training and during their work. To be effective in assisting vulnerable groups such as households affected by HIV/AIDS to face the challenges they are facing food and nutrition security: the agricultural extension staffs need to be guided and trained to develop new competencies. These competencies would enable the extension staffs establish a new relationship with the changed clientele; they would need to come up with improved and innovative extension methods; facilitate and strengthen self help groups to provide immediate assistance and support to People Living with HIV/AIDS, widows and orphans.

Competencies are concerned with the results and achievements of an organization (Mulder, 2001). In mitigating the impacts of the pandemic an agricultural organization and its extension staffs need to gain AIDS competence. According to the American Leadership Initiative for AIDS (Reference) competence an organization gains AIDS competence when: i) It acknowledges the reality of AIDS, ii) act from its strength to respond, iii) reduces vulnerability and risks both for staff and clients iv) learn and share with others and v) attains its objective and potential. The competencies required to achieve the level of effectiveness in mitigating the negative impacts of the pandemic are:
<table>
<thead>
<tr>
<th>Core Competence</th>
<th>Knowledge</th>
<th>Skills</th>
<th>Attitudes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Knowledge on organization</td>
<td>• On the organization stand on fight against HIV/AIDS&lt;br&gt; • On HIV/AIDS affects extension work&lt;br&gt; • On effect of HIV/AIDS on the clients</td>
<td>• Can explain how HIV/AIDS is within MoA mandate and not only a health issue</td>
<td>• Acknowledge rights of PLWHAs in accessing service from the organization</td>
</tr>
<tr>
<td>organization goals</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Technical capability</td>
<td>• Can relate how his technical training can be applied in HIV/AIDS mitigation&lt;br&gt; • Can relate HIV/AIDS and food nutrition and food insecurity&lt;br&gt; • Can relate how extension intervention can mitigate impact of AIDS&lt;br&gt; • Basic facts on HIV/AIDS and prevention</td>
<td>• Promote appropriate technologies in PRAs&lt;br&gt; • Implement appropriate technology to mitigate impacts of AIDS</td>
<td>• Willing to try new approaches to mitigate impacts of AIDS in affected households</td>
</tr>
<tr>
<td>Programming</td>
<td>• Translate HIV/AIDS issues from program document to intervention activities in annual budgeting and workplan</td>
<td>• Plan for Interventions target improving HIV/AIDS affected households</td>
<td>• Uses project resources effectively&lt;br&gt; • Implement HIV/AIDS activities as per workplan</td>
</tr>
<tr>
<td>Professionalism</td>
<td>• Committed to continue learning on HIV/AIDS and agriculture</td>
<td>• Work with affected household without stigmatizing them</td>
<td>• Committed to the MoA goal of improving livelihoods of households affected by HIV/AIDS</td>
</tr>
<tr>
<td>Communication</td>
<td>• Have knowledge of importance effective communication in extension</td>
<td>• Able to communicate ideas to different stakeholders, HIV/AIDS affected persons and afflicted households</td>
<td>• Use appropriate language when talking on HIV/AIDS&lt;br&gt; • Able to listen to ideas of others and especially PLWHAs</td>
</tr>
<tr>
<td>Networking</td>
<td>• Aware of what other organizations are working on HIV/AIDS issues in the working area</td>
<td>• Resource mobilization from other organization&lt;br&gt; • Ability to work with other organization dealing with HIV/AIDS</td>
<td>• Keeps MoA objectives ahead of personal gains</td>
</tr>
<tr>
<td>Leadership</td>
<td>• Knowledge of needs of HIV/AIDS affected households</td>
<td>• Able to represent MoA in forums like CACCs effectively</td>
<td>• No fear to be associated with working within HIV/AIDS context&lt;br&gt; • Seizes opportunities to advance issues of PLWHAs</td>
</tr>
</tbody>
</table>
The competencies indicated in the table above are specific for extension officers who work at the district level. They reflect the fact that the extension staffs work closely with the frontline extension workers in dealing with households affected by HIV/AIDS. They need knowledge on basic facts on HIV/AIDS. This provides them with confidence while communicating and tackling HIV/AIDS intervention especially in areas where stigma and discrimination are high. Knowledge on how HIV/AIDS impact on the agricultural sector provide the with a opportunity to combine their technical knowledge to mainstream HIV/AIDS in their extension work. As rural development professional they need to have a clear understanding of the other organizations working on HIV/AIDS related interventions in their area of work. The Ministry of Agriculture has traditionally been involved in poverty alleviation initiative work. The extension staffs the right attitude so to create trust and confidence in their clients when dealing with HIV/AIDS. The staffs also need to be uphold the organization objectives while dealing with stakeholders. The staffs should be able to work in a field where a multisectoral approach is the norm. With the right knowledge, skills and attitude extension staffs will be able to; deliver on the MoA objective of mainstreaing HIV/AID in extension.
CHAPTER THREE – RESEARCH DESIGN AND METHODOLOGY

This chapter gives the profile of the area where the study was conducted. It also gives the criteria of selection of the area. The research methodology is also described here. The respondents and the criteria used in selecting them for the study form part of this chapter. The limitations of the study are given here to illustrate any possible drawbacks the researcher encountered and their implication for the results elaborated in chapter four. Finally, the method of data processing is given to show how the results were arrived at. The research project was carried out between the month of June 2008 and September 2008 (See Annex for the research plan).

3.1 Research Area

The research was carried out in Central Province. Central Province covers the area around Nyeri to the west of Mount Kenya. The province had 10 districts namely; Kiambu East, Kiambu West, Muranga North, Muranga South, Kirinyaga, Nyeri North, Nyeri South, Nyandarua, Thika and Gatundu. It should be noted that not all the district appear in the map below. The splitting of the districts was done at the end of 2007 and hence it is hard to find a map showing all the districts. The study was conducted in 8 districts of the province. There were no respondents drawn from two district i.e Nyandarua and Kirinyaga.

Central Province was chosen as the research area due to its closeness to Nairobi where some key informants were targeted. All the districts targeted in the study were also easily accessible. The HIV/AIDS prevalence in the study area has reduced from 7% to 5.7% in the last 3 years. Most of the farmers in the area are involved in subsistence crop and livestock farming. There was consideration that it has left many households affected by HIV/AIDS. With the sort of farming system the area was considered to check on the response of extension staffs in mitigating the impacts of the pandemic.
According to the 1999 census the population had a total of 3,724,159 people in an area of 13,191 km² (source; Central Bureau of Statistics, Kenya). According to the Welfare Monitoring Survey of 1997, the population living below poverty line in the province was about 39%; the food poor constitute 36% of the population; the hardest hit groups are the women, widows and orphans, and those living in marginal areas of the district (NCAPD, 2005). There is high migration of male to the other districts and towns in search of employment and business opportunities. The HIV/AIDS prevalence in the province in 2004 was estimated at 5.7% (NACC, 2005). The combination of HIV/AIDS and migration of the able bodied person from the district has implication on labor supply.

The Ministry of Agriculture has extension staffs in all the administrative units of the district. At the farming community level, extension staffs mobilize the farmers to form common interest groups. Common interest groups are made up of farmers who are either undertaking a common crop enterprise or are exploring a common agricultural income generating enterprise. Through these groups the extension staffs provide the farmers with training on improved crop production technologies; provide them with marketing information; promote agricultural related income generating activity and also explore with them new opportunities to increase their productivity. They provide extension services to small scale farmers.
Most of the households in the districts where the study was conducted depend on subsistence farming as a means of earning their livelihoods. The average farm size is small, 1.5 ha/farm; due to fragmentation of land holdings the farm sizes have become smaller through the years. In Murang’a North district rainfall is bimodal; there is a long rain period from mid-March to the end of May and a short rain period from October to mid-December. These two rain periods support two growing seasons. Crops grown in the district are maize, beans, bananas, sweet potatoes, mangoes, and avocados. Subsistence farming is complemented by dairy activities and cultivation of cash crops such as coffee and tea. Other types of livestock kept in the district dairy goats and local poultry.

The extension staffs are also required to address HIV/AIDS issues through agricultural related interventions. Some of the technologies they promote are energy saving technologies; growing of less labor intensive crops; keeping of small livestock and income generating activities. The extensions are also required to work with stakeholders in the sector towards providing resources to improve the livelihoods of those HIV/AIDS affected households.

The research comprised of an initial literature study on external mainstreaming of HIV and AIDS in agricultural extension and competencies needed by the extension staff to mitigate the impacts of AIDS in the affected household.

### 3.2 Respondents and Selection Criteria

#### a) District and District level

The study had 31 divisional extension staffs previously trained through the MoA HIV/AIDS programmes were interviewed as respondents. The information from this group was collected using a questionnaire. This number has been chosen as some of the trained staff could have move from the district during staff transfers held in 2005. The District Agricultural Officer and the District Gender and Home Management Officer were also interviewed as key informants using a semi-structured interview guide. In the district the DAO and DIGMO form part of the management team for all activities in the area. They will be key informants on how the trained staffs perform their duties. They also provide technical assistance and give direction to the field extension staffs; they have a supervisory role and they also get reports on how the staffs are performing in their work.

#### b) Farmers Level

Members of a Self Help Group (SHG) of PLWHAs (6 men and 8 women) were involved in a focused group discussion. The group has been working on various agricultural activities with the MoA extension staffs. The aim is to get a view on the field extension officers’ effort and performance at addressing households affected by HIV/AIDS. The extension staff at the location gave his views on how he has been working with the group. He also gave his experience in working with households affected by HIV/AIDS. One Focal Area Development Committee (FADC) comprising of 16 (7 women and 9 men) was interviewed using a semi-structured interview guide in a group discussion. They gave insight into how issues touching on HIV/AIDS were handled during the PRAs.
The extension staffs during the PRAs use a participatory methodology to target the vulnerable members during implementation of the Focal Area.

c) Provincial and Ministry of agriculture Headquarters

At the provincial level, the Provincial Gender and Home Management Officer (PIGMO) was interviewed. The office at the provincial level was involved in capacity building the district staffs in readiness for the training held for the divisional officers. The officer has a supervisory role for the DIGMOs in the districts under the province. The officer

At the ministry headquarters the Gender and HIV and AIDS programs officer will be interviewed; the officer is part of the project management; the project management team provide guideline for implementation of NALEP. The officer will shed light on the way the project has been designed to address HIV/AIDS; the officer is also involved in capacity building of extension staffs and will give the management views of the success of the Ministries efforts of addressing livelihoods of HIV/AIDS affected households.

d) Research tools

The data for this research was collected using three tools namely: Secondary data from previous research and publications: use of questionnaires both structured and unstructured: observation.

- Secondary Data collection

Secondary data was collected from literature obtained from text books, internet, articles and journals, reports from the ministry of Agriculture and other government offices and proceedings of workshops. The data collected assisted in coming up with the concepts and guided the research. The literature on competencies of extension staffs competencies seems to be relatively new and not much has been done.

- Use of questionnaire

A questionnaire was formulated to aid in collection of empirical data from the main respondents. The questionnaire was first pretested in one of the districts. Some questions were then reformulated to all the targeted respondents would understand them. The reports of trainings conducted on HIV/AIDS from 2005 were used to locate the names of the respondents. This was followed by a visit to the districts where the District Gender and Home Economics Officers (DIGMOs) were requested to check if the officers were still deployed in the area. Due to time limitation and distance required to travel from one district to the other, the DIGMO was requested to call the respondents to the district headquarter to fill the questionnaires. Some of the questionnaires were also distributed to respondents during a field day held in one of the district.

The semi-structured questionnaires were used to collect data from the various categories of key informants. These informants were; the District agricultural Officers and District Gender and Home Economic officers; the Focal Area Development Committee; the Self Help Group of People living With HIV/AIDS; the Provincial Gender and Home Economics Officer and the Officer in Charge Gender and HIV/AIDS at the
National Agriculture and Livestock Extension Programme. The researcher conducted face to face interviews with the individual officers and groups.

- **observation**

This tool was used to find out how extension officers were mainstreaming HIV/AIDS in their work. It also gave an insight into how the extension staffs efforts towards mitigating the impact of AIDS. The research attended one field day in one of the district the district. During questionnaire distribution the research also attended a monthly training meeting in one of the division. This assisted to give an insight to how those extension staffs trained on HIV/AIDS were passing on the message to those dealing directly with households affected by HIV/AIDS. During the interview with the SHG of PLWHAs the researcher was also able to observe some of the activities being carried out to improve the livelihoods of households affected by HIV/AIDS.

### 3.4 Methods of data processing

The data collected through questionnaire have been analyzed manually. The tables have been generated through the use of excel. For the data collected using semi-structured interviews transcription was done after each day of the interview. Though there was no use of any recording devise the opinions the key informants were reconstructed and some are used in the results and discussion sections.

### 3.5 Limitation of the Study

There was a reshuffle of District agricultural Officers (DAOs) and other district subject matter specialists. There were only two DAOs who could be interview as all the others were have never been in such position. All the other DAO were getting into the positions for the first time. Of the two to be interviewed; one was on annual leave; the other was going on transfer and was busy handing over the station. It required phoning them to get when they were free and in the office. The DAO proceeding on transfer could not have given the interview good thought. It was his last date in the station and hence was busy finalizing the handing over report. So what does this mean for your findings and conclusions?

Another limitation was that the extension staffs were busy starting the process of planning for implementation of the new years Focal Areas. One of the DIGMO was also involved in PAPOLD training at the Provincial headquarters. The DIGMO were of great assistance in getting the trained extension some who were generally reluctant to fill the questionnaires. So what does this mean for your findings and conclusions?

One of the DIGMO who was in an acting DAOs position had to remind some that she was using the files to get names of those who were trained. Some of the respondent could have felt they were being forced to fill the questionnaires. This could have implication on the responses they gave as some may have not given proper consideration while filling the questionnaire. Coming from the headquarters the officers could have perceived the information they gave was going to be used in to evaluate them on their performance for official purposes. This would have made some to respond
to the ideal situation rather than the reality of what they were doing. So what does this mean for your findings and conclusions?

For the extension staffs to fill in the questionnaires the DIGMOs had to phone them to come to the district headquarters. Some of them were called from their annual leave. This meant they had to be refunded their travel and also get money for their lunches. They could also have felt that we were interfering with their personal programmes. So what does this mean for your findings and conclusions?

My first reaction to all these limitations is that you choose the wrong period of the year to do these survey or that you should have choosen a different topic.

You should mention your position in the organization. You choose yourself where you want to put it, in what chapter etc.
CHAPTER FOUR - RESULTS

This chapter presents the findings of the respondents. It also integrates the views of the key informants who were interviewed using semi-structured questionnaires. More information on the focused group discussion with the Focal Area Development Committee can be found in the Annex (1).

4.1 The Ministry of Agriculture Training Programme

The respondents for the survey have worked for the Ministry of Agriculture for between 10 to 25 years. Their academic qualifications are; Diploma in Agriculture and Home Economics (7); Diploma in General agriculture (2); Bachelor of Science in General Agriculture (7); Diploma in General Agriculture (1); Diploma in Horticulture (3); Bachelor of Science in Agriculture and Home Economics (6); Bachelor of Science in Agribusiness Management (1); Bachelor of Science in Agricultural Engineering (1); Masters of Science in Food Science and Technology (1). The entire respondents have either a diploma or a degree in agricultural related topics. The respondent who had a master degree had done a Bachelors of Science degree in Agriculture and Home Economics. This means that almost half of respondents (14 out of 31) have a background of home economics training.

The respondents were deployed as follows: Divisional Agricultural Extension Officers (5); Divisional Gender and Home Economics Officers (11); Crop Production Officers (5); Horticultural Development Officers (2); Agribusiness Development Officers (2); Environment and Land Development Officers (2); Monitoring and Evaluation Officer (1); Extension and Training Officer (1). Almost all the respondent trained in home economics (11 out of 14) have been deployed as divisional home economics officers. The other three were had been given bigger role in working as the Divisional Agricultural Extension Officer. Due to the placement of the Gender and Home Economics Department at the ministry headquarters, all those officers charged with home economic duties at the lower levels are given the role to coordinate HIV/AIDS mainstreaming.

Table 2: Training Attended by the respondents

<table>
<thead>
<tr>
<th>Year</th>
<th>Training title</th>
<th>Days</th>
<th>No. of Respondents attended</th>
</tr>
</thead>
<tbody>
<tr>
<td>2004</td>
<td>Nutrition and HIV/AIDS</td>
<td>3</td>
<td>5</td>
</tr>
<tr>
<td>2005</td>
<td>Mainstreaming of HIV/AIDS in agriculture</td>
<td>3</td>
<td>22</td>
</tr>
<tr>
<td>2006</td>
<td>Nutrition and HIV/AIDS</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>2007</td>
<td>TOT Peer for educators</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>2008</td>
<td>Basic counseling</td>
<td>5</td>
<td>6</td>
</tr>
</tbody>
</table>

Source: Author September 2008

The survey shows that there are 4 types of HIV/AIDS trainings which have been conducted targeting extension staffs. The trainings are:

a) **Mainstreaming HIV/AIDS in Agriculture**

These trainings were carried out using funding from the National AIDS Control Council (NACC) under the KHADREP. The Provincial Sub-AIDS Control Units Coordinators were
trained as TOTs on HIV/AIDS mainstreaming in the MoA. After the TOTS the coordinators trained the district HIV/AIDS Focal persons for one week. The District Gender and Home Economics Officers are the designated HIV/AIDS Focal Persons. The District Focal Persons arranged for training of the divisional extension staffs. The divisional extension staffs were to train those working within the divisions and also provide extension services to address HIV/AIDS issues affecting farmers in the division.

The divisional extension staffs were generally trained for between three to five days. The training dwelled on: HIV/AIDS and nutrition; basic facts on HIV/AIDS; prevention and management of HIV/AIDS; mainstreaming of HIV/AIDS in the MoA; counseling, care and support for those infected and affected by HIV/AIDS. From the training time tables mainstreaming of HIV/AIDS was only allocated a two hour session. Basic facts on HIV/AIDS and the Nutrition aspects sessions for PLWHAs took the bulk of time in these trainings. The training also involved presentations by PLWHAs. Other than the PLWHAs most of the other trainers came from the Ministry of Agriculture.

This training was which was funded by NACC were supposed to create awareness on HIV/AIDS but give knowledge on the process of HIV/AIDS mainstreaming. Communication in HIV/AIDS and counseling skills were each accorded two hours in the training. These were given to ensure the extension staffs deal with PLWHAs who could either farmers or colleagues without stigmatizing them. Using PLWHAs who have been bold to have disclosed sero-status was aimed at changing the attitude of extension staff towards those affected. One of the DAO interviewed had this to say after attending one of the trainings: ‘The organizers brought in a PLWHA to talk to the group; I had not had such a close encounter with a HIV/AIDS infected person before the training.’

b) Basic Counseling Skills Training
These trainings were arranged by the AIDS Control Unit (ACU) through funding from the National Agriculture and Livestock Extension Programme (NALEP). The trainings were held for 5 days. The trainings were conducted by an external professional counseling organization. The target group was the District Gender and Home Management Officers. The aim was to equip them with basic counseling skills to deal with HIV/AIDS in the MoA workplace. The DIGMOs were also to pass the knowledge to those in the divisions and location during various training held at the district level.

The trainings covered mostly communication related topics such as: listening and attending skills: showing apathy and showing genuineness; dealing with loss and grief: values in counseling. The training gave the participants basic knowledge and skills in communicating with people in difficult situation such as posed by being HIV positive.

c) Nutrition and HIV/AIDS
These training were arranged by the Gender and Home Management for the District Gender and Home Economics Officers. The trained officers train those in the division on how to deal with nutrition education on HIV/AIDS from production to utilization. These Training of Trainers courses have been on going for the last three years. From the time table (See Annex) the Home Economics Branch has been engaging staffs from Kenyatta National Hospital (KNH) to be facilitators during the trainings. The sessions in the training cover topics on nutrition management of PLWHAs. Such topics are: nutrition care for people on Anti-retroviral Therapy (ART); nutrition and HIV/AIDS; nutrition management of HIV/AIDS related symptoms; management of drug-food interaction. The training gives Home Economic Officer knowledge on HIV/AIDS and nutrition.
d) Peer Educators training
A total of 200 peer educators from the whole country were trained through funding from the GTZ-PSDA program. Twenty extension staffs from district of Central Province were trained. Thirteen were from the MoA while the others from the Ministries of Livestock and Fisheries development and Ministry of cooperative and marketing Development. The training was targeting extension staffs other than the DIGMOs. The trained TOTS were to work with the DIGMO in training the divisional staffs. The main aim of these trainings was to create knowledge on basic fact on HIV/AIDS. Stigma reduction sessions in the training are provided to promote a positive attitude towards PLWHAs. The training also provides skills on communicating issue of sexuality and how promotes behavior change among the MoA staffs. Communication skills are also aimed at equipping extension staffs on how they can initiate HIV/AIDS related issues confidently with farmers on HIV/AIDS during their work.

Most of the training indicated above were initiated and planned for from the MoA headquarters. During the interview the Gender and HIV/AIDS Officer at the NALEP headquarters gave insight into how the MoA was planning for capacity building of extension staffs to handle issues on HIV/AIDS and extension. The divisions are the main planning units for project implementation. The divisions plan for all activities and resources required to deliver extension services to the farmers. The workplans include extension staff trainings and resources to carry them out.

Where capacity gaps are identified across many districts the headquarters organizes for Training of Trainers (TOTs) courses. TOTs courses which have been arranged in the past include; Counseling on HIV/AIDS; Gender and human Rights; mainstreaming of HIV/AIDS. After TOTs the trained officers are the expected to train extension staffs in their districts. However, there has been no effort in the ministry to carry out a training needs assessment to establish the capacity needs of the extension staffs in external mainstreaming of HIV/AIDS. There are no manuals or guidelines developed to assist the organizers of the HIV/AIDS training in the districts. Another extension staff was of this opinion: ‘The trainings are done just to for giving numbers to the targets to fulfill the performance contract for the financial year. They are of low quality and they are not agricultural oriented.’

4.2 Knowledge on Effects of HIV/AIDS on Effects of HIV/AIDS Adoption of Agricultural Technologies

During the survey the respondents were asked their view on how the HIV/AIDS epidemic was affecting adoption of technologies. All them were of the opinion that HIV/AIDS was affecting adoption of the technologies they were promoting. The extension staffs gave the reason for the decrease in adoption rate as:

- The households spent a lot of time in caring for the sick;
- They used most of their resources to purchase medicines.

They were of the opinion this could be reversed through; promoting simple and appropriate technologies; they understood the needs of the households and tune their interventions to suit them; they households were more receptive as they needed to improve their food and nutrition situation. They felt also that this affected the food and
nutrition status of households affected by HIV/AIDS. All the respondents seem to be knowledgeable on the effects of HIV/AIDS on adoption of agricultural technologies.

The extension staffs responded that the households needed to be assisted to acquire technologies from research stations such as improve cassava cutting and sweet potatoes. One of the extension staff at the division who were in the Monthly Training Session was of this opinion: ‘It is important to give extension messages but the PLWHAs need some inputs such as the cassava cutting, then we can also teach them how to make cassava crisps which they can sell’. what do you conclude in terms of competences, knowledge attitude skills?

4.3 Extension staff working Within a Multi-sectoral Approach

The respondents were asked their views of how HIV/AIDS issues such as stigma and discrimination they encountered during extension work should be addressed. Almost all (30 out of 31) agreed that there was a need to involve other development professional in extension work. The National Agricultural Sector Extension Policy (NASEP) in Kenya promotes the involvement of stakeholders in agricultural development activities. This applies from the National Level down to grass root level. This came as a realization of the need to approach extension in a holistic manner and that all rural development organization could pool their resources to improve the livelihoods of the farming communities. The Kenya National HIV/AIDS Strategic Plan (KNASP), 2005 advocates for a multi-sectoral approach in dealing with HIV/AIDS.

The respondents explained that different rural development professionals have specialized have different knowledge and skills which are important in addressing HIV/AIDS epidemic. These professionals such as the health professionals can be used to address issue of HIV/AIDS like training on Home Base Care (HBC) which the extension staffs cannot handle during their work. The respondents were clear on the mandate of the Ministry of Health in dealing with HIV/AIDS. In their responses they are clear on the mandate of the Ministry of Agriculture in terms of; food production and nutrition; poverty reduction and income generating activities. Some of the extension staff also recognizes their closeness to the farming and more so to households affected by HIV/AIDS. They said they were better placed to understand issue affecting farmers’ and hence organize with relevant collaborators on how to address them. One woman in the field day had this to say on being in agricultural related group: ‘The extension staff in my area one time brought a public health officer who trained our group on Home Base care (HBC). This training really assisted my family when my daughter got sick with HIV/AIDS’.

During some of the activities the extension staffs indicated that they invite PLWHAs to train farmers. Some PLWHAs have been trained in their support groups by medical personnel and various NGOs dealing with HIV/AIDS. The PLWHAs who are invited through the NGOs are invited to talk on: stigma and discrimination; practical aspects of management for PLWHAs. One the use of PLWHAs in training one of the extension staff in the monthly training session said; ‘We invited PLWHAs who are more knowledgeable on the practical health aspect of HIV/AIDS and nutrition to train the farmers. We also gain knowledge during these trainings. They are ahead of us in counseling skills, nutrition and talking on HIV/AIDS’.
Most of the respondents were aware of organizations and groups dealing with HIV/AIDS direct and indirect AIDS work in their geographical areas of work. These organizations are: local and international Non-Governmental organizations; Faith Based Organization (FBOs); the Ministry of Health. The respondents gave activities carried by the NGO as; HIV/AIDS awareness creation; identification of vulnerable groups; training farmer groups on appropriate technologies for agricultural production such as kitchen gardening; promotion and installation of energy saving stoves; provide food to orphans and vulnerable children; provide inputs for farming and income generating activities to those affected by HIV/AIDS. The FBOs operated health facilities; provide material support; farm inputs; provide training facilities such as meeting halls; resources for training those affected by HIV/AIDS. To implement agricultural related activities the NGOs and FBOs invite the agricultural to train farmers and for other field activities.

Only a few of the respondents were aware of Constituency AIDS Control Committee (CACC) and what activities it carries in the divisions. The DAEO interview during the monthly training session had this to say on CACC: 'I am not aware of our involvement in the Constituency AIDS Control Committees (CACCs). I heard we are supposed to be members but I have not taken the step to go to the meeting.'

4.4 Information Updating After the HIV/AIDS Trainings

During the study the extension staffs indicated various sources of information on HIV/AIDS they access to update their knowledge. These sources were: newspapers, internet, magazines, television, reference materials from the MoA, materials from the Ministry of Health. I assume different sources for different kind of information. Others indicated getting information during various agricultural shows and while participating in the World AIDS Day. Some also seek information from the District Gender and Home Economics Officer (DIGMO). One indicated getting information from the AIDS Control Unit (ACU) in the MoA headquarters while another extension staff had contacts with the Constituency AIDS Control Committee (CACC).

Some of the respondents (12 out of 31) indicated they have never made effort to update their knowledge on HIV/AIDS from any of the sources indicated above. Some were of the opinion that the DIGMO should give them updated information on HIV/AIDS especially on changing trend on HIV/AIDS nutrition management from time to time. One of the DAO said the district received books and video cassettes on HIV/AIDS in 2005 from the ACU for use during training. On the use of the video cassettes the DAO said: ‘They have not been use for training as we do not have a television and video.’

What can you conclude? (The staff do not read documents and may not be fully aware of how they can collaborate with them)-networking skills

The DAOs interviewed said they ensures all the divisions have copies of the policy documents, strategic plans and other project documents needed for planning and implementation of the agricultural development projects. However one DAO was of the opinion that: ‘The staffs are not fully aware of what is in the policies having on HIV/AIDS and hence most don’t know what to do’.

The two DAOs, the DIGMOs and even the DAEO interviewed were not aware of the mandate set for the MoA by the NACC in the decentralized structures. They have never
seen or read the NACC the guidelines of field operations (NACC, 2006). Both the DAO interviewed had not involved in activities of the District AIDS Committee (DAC). One of the DAO said: ‘I have never attended any District AIDS Committee meeting. It seems DAC is inactive in this district. Mostly I delegate the issues of HIV/AIDS to the DIGMO. I am not aware of our involvement in the Constituency AIDS Control Committees (CACCs)’.

What does this mean for your research question?

4.5 HIV/AIDS affected Households and Extension Services

The majority of the extension workers surveyed, about 75.2 percent (23 out of 31), were of the opinion that there was need to take special attention in ensuring the HH affected by the HIV/AIDS epidemic. They suggested that the HIV/AIDS affected households need different interventions in terms of

- Low cost technologies;
- Labour saving technologies;
- Income generating activities;
- Knowledge of production and utilization of highly nutritious foods.

On the other hand it is essential to note that 24.8 percent (8 out of 31) the respondents did not recognize this need for targeting the HIV/AIDS affected households differently. These respondents were of the opinion that promoting different technologies for the HIV/AIDS affected households would increase stigma and discrimination among the farming communities. They also said that the whole community is always affected and hence they advocate for promotion of the same technologies to all the farming households.

What does this mean for competence building?

During the interview with the FADC one of the participants said; ‘The poor and vulnerable were not addressed during the planning of the Focal Area and in the two years the project was been implemented. The HIV/AIDS and generally the vulnerable cannot form a Common Interest Group (CIG)’. This happened despite the extension staffs and other stakeholders conducted use the PAPOLD methodology during the PRA/BBS to identify the vulnerable members in the community during the Participatory Rural Appraisal (PRA). According to the extension staff who worked in the area among the vulnerable group identified was households affected by HIV/AIDS.

Most of the extension staffs (27 out of 31) agreed that working with households affected by HIV/AIDS is part of their duties. The other (4 out of 31) respondents were of the opinion that it was extra work and not relevant to their jobs. The four indicated that the HIV/AIDS issues were for the Divisional Home Economics Officers to handle.

To check how the staff were mainstreaming HIV/AIDS in extension projects, were asked to give an approximation assessment on how many times they put effort to handle HIV/AIDS issues in their work. From table 3 below, (13 out 31) 42% of the respondents dealt with HIV/AIDS related issues most of the time during their daily work. However, (18 out of 31) 58% responded that it was only sometimes they incorporated HIV/AIDS in extension service delivery. The extension related activities where they have opportunity to deal with HIV/AIDS issue were;

- Field days;
• Carrying out Participatory Rapid Appraisals;
• Staff meetings and trainings;
• Farmer trainings.

Table 3: Times extension staffs handle HIV/AIDS in extension work

<table>
<thead>
<tr>
<th>Times staff integrate HIV/AIDS in extension activities</th>
<th>Frequency N=31</th>
<th>percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Not often</td>
<td>6</td>
<td>19.4</td>
</tr>
<tr>
<td>Often</td>
<td>12</td>
<td>38.7</td>
</tr>
<tr>
<td>Most of the time</td>
<td>7</td>
<td>22.6</td>
</tr>
<tr>
<td>All the time</td>
<td>6</td>
<td>19.4</td>
</tr>
<tr>
<td>Total</td>
<td>31</td>
<td>100</td>
</tr>
</tbody>
</table>

Source: Author September 2008

Reasons cited by the respondents for the low rating were; the Focal Area implementation is very involving; HIV/AIDS is still a sensitive topic to handle. Only 1 out of the 6 who gave the lowest assessment had indicated it was not part of her work. The extension staffs who gave this rating (0-25) were deployed as Environment and Land Development Officer (2), Agribusiness (1), Divisional Agricultural Extension officers (2). Only one of these was deployed as Divisional Home Economics Officer. Another reason they gave was that it was difficult to get information on the households affected by HIV/AIDS. One of the staff was of the opinion that it was only possible to work with affected households or groups of PLWHAs who have come out openly. NALEP does not adequately address the households affected by HIV/AIDS. No facilitation to deal with the HIV/AIDS affected households.

Look at my other comments I gave you before.

One of the respondents was of the opinion that the some of the extension staffs were still shy about talking HIV/AIDS with farmers. Another wrote that most of the staffs are embarrassed to talk HIV/AIDS especially with older farmers. This can be seen from Box 1 when the extension staffs opted not to replace the PLWHAs they working with at the MoA stand and also not to display the HIV/AIDS posters in the field day.

Box 1. HIV/AIDS Activities in a field day
During the district field day a women self help group (SHG) was displaying various energy saving technologies, various food items for PLWHAs and income generating activities (batiks and bead work products). One of the extension staff trained as a peer educator was to be at the station. She was supposed to explain how extension was working with groups of PLWHAs to mitigate the impacts of AIDS. She was not at her station when then researcher visited and talked to the women group members.

The two days event has become an annual event with the District Stakeholders Forum taking a very active part. The preparations take about three to four months. A total of 45 exhibitors were in the field day. A total number of 5000 farmers and 2000 school going children from all over the district attended the field day. The District Agricultural Office wanted to invite the Ministry of Health to have a VCT on those 2 days but this did not happen. Missing also was any other stakeholders dealing with HIV/AIDS in the district. The PLWHAs women group was slotted initially to display alongside the extension staffs working at district agricultural stand. However, their space was occupied by a company displaying value addition equipments and another exhibitor displaying herbal product. The poster depicting the efforts of the MoA in the fight against HIV/AIDS was not displayed on the walls as the space was replaced by the agribusiness posters.
The extension staffs that were trained on HIV/AIDS were not directly linking the message they were giving on HIV/AIDS management. There were leaflets on HIV/AIDS behavior change from the Ministry of Health but they got finished early in the first day.

During the unstructured interview with the division staffs attending the Monthly Training Session (MTS) the officer initially were not comfortable to discuss their involvement with working with PLWHAs. One of the extension staff opened up and said: ‘It is hard to start direct communication with a person who is sick? We fear because we are not well equipped to deal with HIV/AIDS’. They also disclosed that they did not have things like farm inputs to give the PLWHAs. However, they later admitted to working with a group in PLWHAs supported by a Community Based Organization (CBO) in one of the Focal area.

According to one of the DAO some of the trained extension staffs are very enthusiastic in dealing with HIV/AIDS. ‘One of the DAEOs trained on Counseling is very active in training the other extension staffs on how to deal with HIV/AIDS affected households’. He felt the attitude of the staff towards affected households is good as he had observed during supervision. He had never received complains of extension staff mistreating PLWHAs. However one of the incoming District Home Economics Officer could not believe it was possible to have a successful Self Help group (SHG) of PLWHAs.

4.6 Effects of Communication on HIV/AIDS with Farmers on Extension Services

During the survey (21 out of 31) 67 percent indicated that they had no difficulty when discussing HIV/AIDS with farmers during their work. At the same time 32.3 percent (10 out of 31) indicated they found it not easy to initiate HIV/AIDS talk during their work. The MoA has identified HIV/AIDS as a factor affecting delivery of services to the farmers. During PRAs/BBS the extension staffs and collaborator identify vulnerable groups which include households affected by HIV/AIDS. Implementation procedures require the extension staffs to train the elected FADC members for three days. Half a day is dedicated to sensitize the FADC on HIV/AIDS issues. In the trainings the staffs invite health specialists to talk on health aspects of HIV/AIDS. The extension staffs stimulate discussions around issues affecting households affected by HIV/AIDS identified in the PAPOLD exercise during the PRAs/BBS such as; decreasing land under cultivation; changes in crops being neglected; food security and nutrition status.

Some of the respondents (7 out of 31) attributed the training attended as having made it easy to communicate and effectively work with HIV/AIDS affected households. Two of the seven with this opinion had only started dealing with HIV/AIDS affected households after the training. They reasons they gave for the change are; the training gave them confidence to talk on basic fact of HIV/AIDS; change in attitude towards PLWHAs; realization that HIV/AIDS was part of the mandate of the MoA.

Despite the training attended, some of the respondents (2 out of 31) indicated they shied away from discussing anything related to HIV/AIDS in their work. The two were deployed one as a Divisional Crops officer while the other was deployed as the Environment and Lands development Officer. They had indicated in another question that talking
HIV/AIDS was not part of their work. This made it difficult for them to work with households affected by HIV/AIDS. One of the divisional extension staff in the monthly training session summed this up when he said: 'It is hard to start direct communication with a person who is sick. We fear because we are not well equipped to deal with HIV/AIDS'.

Due to stigma associated with HIV/AIDS, it can be difficult for extension staffs to discuss issues of HIV/AIDS with farmers. Some of the communities even reject the services of an extension agent. In the Focal Area in Muranga North the chairperson said: ‘The man from Muranga South district who used to visit the PLWHAs and distribute food and clothes in the lower area of the focal area here was stoned the other day. He had to change the motor bike he use and even the clothes he used to wear’.

### 4.7 Targeting HIV/AIDS Affected Households

<table>
<thead>
<tr>
<th>Response</th>
<th>Frequency N=31</th>
<th>percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Have dealt with HIV/AIDS affected households before training</td>
<td>18</td>
<td>58.1</td>
</tr>
<tr>
<td>Have not dealt with HIV/AIDS affected household before training</td>
<td>13</td>
<td>41.9</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>31</strong></td>
<td><strong>100</strong></td>
</tr>
<tr>
<td>Have dealt with HIV/AIDS affected households after the training</td>
<td>27</td>
<td>87.1</td>
</tr>
<tr>
<td>Have not deal with HIV/AIDS affected households after the training</td>
<td>4</td>
<td>12.9</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>31</strong></td>
<td><strong>100</strong></td>
</tr>
</tbody>
</table>

From the survey it is evident the extension staffs have been targeting and working with HIV/AIDS affected households even before the training. After the trainings there is an increase in the number of staff working with HIV/AIDS affected households. Various ways of targeting the households were given. Some of the extension staffs (6 out of 31) gave an indication that they target them purposively after they were identified during the PAPOLD held during PRAs/BBS. During the PRAs/BBS the extension staffs responded that they promote opportunities that are useful for resource poor and vulnerable groups.

Other indicated the PLWHAs are introduced to them by collaborators like the health workers; the Constituency AIDS Control Council (CACC); through the churches. Most of those introduced to extension staffs by various collaborators are already in support groups and getting some support from these organizations. When the collaborators supply farm inputs such as seeds to the support groups they mostly use the MoA extension staffs to train and implement the agricultural related interventions. A few (4 out of 31) of the trained extension staffs responded that they did not try to target HIV/AIDS households during extension. The four are of the opinion that the NGOs, CBOs, CBOs and churches were in a better place to target the PLWHAS as they provide them with inputs. Interesting to note the FEWs do not own the process and they seem to be working for a CBO. This may due to the fact that the CBO gives the farmers inputs so the FEWs fell they have done nothing even when involved in training the groups.
4.8 Efforts by Extension staffs to improve food and nutrition security in Households affected by HIV/AIDS

This part looks at extension staffs how extension staffs combine their technical knowledge and skills in addressing food and nutrition security for households affected by HIV/AIDS. Table 5 present main activities promoted by extension staff.

Table 5: Activities Promoted by the Extension Staffs

<table>
<thead>
<tr>
<th>Activity Promoted</th>
<th>Frequency</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Kitchen gardens, growing of traditional vegetables and keeping of small stocks</td>
<td>24</td>
<td>77.4</td>
</tr>
<tr>
<td>Production of mushrooms for home use and sale</td>
<td>1</td>
<td>3.2</td>
</tr>
<tr>
<td>Income generating activities such as bead work and tie and dye cloths</td>
<td>2</td>
<td>6.5</td>
</tr>
<tr>
<td>Setting up of Communal vegetable garden irrigation drip kits</td>
<td>1</td>
<td>3.2</td>
</tr>
<tr>
<td>Survey and come up with appropriate intervention</td>
<td>1</td>
<td>3.2</td>
</tr>
<tr>
<td>Provide subsidized farm inputs to PLWHAs</td>
<td>2</td>
<td>6.5</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>31</strong></td>
<td><strong>100</strong></td>
</tr>
</tbody>
</table>

Source: Author September 2008

From table 5 the results of the survey show that most of the extension staffs promoted activities towards improving nutrition status households affected by HIV/AIDS. The crops grown in the kitchen gardens were; amaranths both for grain and vegetable; black night shade. ; though some said they did not work with households affected by HIV/AIDS earlier. They also said they promote keeping of small livestock such as rabbits, local chicken and dairy goats. Most of these activities are also reflected in Box 1. The income generating activities are also some of which can be seen reflected in Box 2 where a group of PLWHAs was exhibiting in a field day. Some of the respondents (3 out of 31) were of varying ideas. These ideas reflect their deployment in their work area.

Box 2: An extension staff experience working with PLWHAs
Joseph has worked as a frontline extension staff for the last 29 years. During the stakeholders meeting in the FA he was working in, it was realized HIV/AIDS was a problem in the area. Through the Divisional Agricultural Extension Officer (DAEO) and the Ministry of Health representative in the stakeholder forum he was trained by the Ministry of Health on Guidance and Counseling on HIV/AIDS in 2002. In the focal area he started working with the youth on awareness creation. In 2003 they got funding (Kshs. 302,000/=) from CACC which they purchased a television, video, cassettes which they used for training both in churches and schools. They extended the training to cover the whole location.

In 2006 when he was started working in Kiru Location he started by taking an inventory of all the agricultural based groups in the area. There were 16 groups which came to the meeting. Two groups among the 16 were made up of PLWHAs. Most of the members of the two PLWHAs groups were widows and widowers. He used the experience gained in the working with the youth groups and explored with the leaders of the two groups of possible activities they could undertake with him. They needed an intervention which could not make their condition worse. The main
activity carried out later has been on nutrition education. This has been done in kitchen gardens which each group member has near their houses. The extension staff has reintroduced traditional vegetable growing such as amaranths and black night shade. The training involves both the production and utilization of the foods promoted.

Working with the divisional agricultural and livestock extension staffs and the groups he wrote proposal and forwarded them proposal to Njaa Marufuku through the District Livestock office. One of the group was funded with Kshs. 120,000/= which they used to purchase a buck and 20 ewes; building of a buck house and demonstration house for the ewes and kids. Due to the results achieved by the group the group has been targeted for further funding through the MoA budget for the financial year 2008/2009. He intends to use the fund to introduce new varieties of sweet potatoes which have vitamins A and E. He has started training the groups on multi-storey kitchen gardens. He has planned to set up demonstration of the multi-storey kitchen garden to show the group its benefits in producing more crops and using less water. This would give a total of 200 plants in a sack. He has plans to start a local chicken improvement project with the group when he gets the funds.

He feels training being given to the frontline extension workers is inadequate. The HIV/AIDS is given on 30 minutes to one hour during the one day training they get as part of NALEP capacity building/monthly. The training should be for two days. He feels the extension staffs have the appropriate technologies through pre-service training and on job training like the multi-storey kitchen garden is with all extension staff which was trained on in 2000. The motivation/attitude of staff needs to be worked on if the staffs have to mitigate the impacts of AIDS in the households affected by HIV/AIDS. He feels the extension staffs are not as good in giving behavior change messages compared with the public health specialists.

During the interview with the PIGMO she had to say of her experience during field supervision; ‘In the reports the most of the extension staffs give report to the offices but when you go on the ground not much is happening.’ However she confirmed gave what she finds where responses on households have been activities with extension staffs as; use of low labour technologies; growing of mushrooms; spices such as garlic; grain amaranths; kitchen gardens with traditional vegetables and spices which are immunity boosters; income generating activities; kitchen fish ponds producing tilapia and mudfish; rabbit keeping. This information on the activities being carried out by the extension staffs with households affected by HIV/AIDS was also collaborated by the gender and HIV/AIDS Officer from the headquarters office.
On the competencies of divisional extension staffs the officer from the national office said; ‘I can say the extension staffs have information on HIV/AIDS but they generally lack skills to integrate the knowledge in their every day work. The staffs are not fully competent to deal adequately with HIV/AIDS affected households. Some extension staffs are not well equipped to work with stakeholders effectively so as to get material support for the HIV/AIDS affected households.’

I think with each paragraph you should explain how that topic relates to your research question. Now we get a long list of topics and it is easy to lose sight on the aim of including these topics.

### 4.9 Gaps in Knowledge Required By Extension Staffs to Successfully Deal With HIV/AIDS Affected Households

During the study the extension staffs were asked to rate the three knowledge or skills they would require they required to effectively mainstream HIV/AIDS in their work. Their three most rated choices were; effective communication in working with PLWHAs; linking HIV/AIDS and extension; counseling skills. Effective communication how is this defined? was ranked highly with reasons given as; it was essential to deliver extension messages without stigmatizing or discrimination; most of the extension staffs are still ashamed of talking about HIV/AIDS; communicating issues of HIV/AIDS with confidence would assist break the barrier while interacting with PLWHAs. Counseling skills are essential as the extension staffs are closer to the farmers than any other service providers. Counseling skills would enable extension staffs assist PLWHAs deal with self stigma; accept their situation and come out to access services to improve their livelihoods. Is this your opinion or that of the interviewed. How would it relate to mainstreaming? Knowledge on how to linking HIV/AIDS and extension received many responses.
Most of the trained extension staffs claimed the training is inadequate to allow them adequately deal with issues relevant to the households affected with HIV/AIDS. They would like the FEWs in their area to be trained as they are the ones directly dealing with the farmers. One of the respondent indicated that the trainings did not have case studies which could have served to inform the extension staffs on how mainstreaming of HIV/AIDS is done. Most of the extension staffs have no ideas on what to do after conducting PAPOLD. They are not trained specially on HIV/AIDS and agriculture. They are not fully equipped with skills to deal with HIV/AIDS. Such skills are such counseling which is vital to enable them address households affected by HIV/AIDS. They lack adequate knowledge on HIV/AIDS with the farmers.

Concluding remarks
Give a brief summary of this chapter
CHAPTER FIVE - DISCUSSIONS

This chapter is a discussion of what was found in the survey with the extension staffs. These discussions also include the findings from the key informants and group discussions held during the research these findings you have to include in chapter 4 and not here. Discussions are based on information and findings provided in the previous chapters. You can not introduce new findings in this chapter. Observation done during field days and general discussion with extension staff are also included. Finding from what others have said are included to assist answer the research question.

5.1 Training to Improve the Knowledge of Extension Staffs on HIV/AIDS

Based on the results it is evident the MoA have taken a step forward in trying to provide extension staffs with knowledge on HIV/AIDS. The trainings have been arranged mainly from the headquarters. The training on nutrition and HIV/AIDS is essential as it gave the extension staffs knowledge on how to address food and nutrition security for the household affected by HIV/AIDS. Training on mainstreaming dwelled so much on; facts about HIV/AIDS; counseling, care and support for those infected and affected by HIV/AIDS. The contents are good for internal mainstreaming HIV/AIDS because they would help fight stigma in the workplace, reduce the susceptibility of the staffs to HIV, and promote discussions around HIV/AIDS among the staffs. Arming the extension staffs with basic knowledge about HIV/AIDS is also useful in cases where they encounter questions about HIV/AIDS from their clients. It gives the extension staffs confidence to initiate HIV/AIDS dialogue with farmers and other stakeholders.

Mainstreaming HIV/AIDS in agriculture during the training was accorded only two hours. This part of the training lacks the use of case studies. One of the respondents recommended use of case studies in trainings. This would at least given the extension staffs a basis from where to start in dealing with households affected by HIV/AIDS. The training in the MoA for HIV/AIDS was not regulated as no training needs assessments was done for competencies lacking in extension staffs. There were also no guidelines to ensure that the training address adequately the capacity gaps in the extension staffs. According to Liles and Mustian (2004) a well design training program is essential to ensure that extension staffs develop programs which that are technically sound, conveniently delivered, economically valuable and customer focused.

Another important finding in the survey was that some of the extension staffs think the training were not adequate for them to be able to target household affected by HIV/AIDS because they were not explained well how to carry out mainstream HIV/AIDS in agriculture. The officer working with the Self Help Group (SHG) of PLWHAs said the Ministry of Health officers did better training than the Home Economics officers. From such suggestions most of the trained extension might be only be dwelling more on health aspects of the HIV/AIDS epidemic. In Topousiz (2003) it was found that in most countries undertaking multi-sectoral responses that included MoAs, response measures to HIV/AIDS within MoAs have been largely health-dominated.

MoA-Uganda (2002) has recommended that training is for extension staffs is the first step if mainstreaming of HIV/AIDS in agriculture is successful. This would give extension
staffs confidence to introduce and deal with HIV/AIDS issues in the ongoing activities. According to their recommendation the topics to be emphasized are:

- HIV/AIDS communication and dissemination techniques
- Communication and interpersonal skills
- HIV/AIDS Control and Prevention
- Opportunistic infections, and simple management
- Basic counseling techniques and psychosocial support
- Mobilization skills
- Nutritional issues for PLWHA
- Blood testing procedures and concept of protected sex.

According to Topouzis (2003), it is often assumed that MoA professionals are capable of addressing the adverse effects of the epidemic on their work. It seems that the training sessions give the knowledge and skills to distinguish between direct AIDS work and indirect AIDS work.

5.2 Attitudes of Extension Staffs on HIV/AIDS Affected Households

From the results it is can be said that extension staffs recognizes that dealing with HIV/AIDS is part of the MoA mandate and not only for Ministry of Health. They also recognize that in mainstreaming HIV/AIDS they need to work with other development professional in their area of work. This is in line with the multi-sectoral approach being advocated in the fight against HIV/AIDS. This approach asks for all development organizations to mainstream HIV/AIDS in their core functions. This is echoed by MoA-Uganda (2002) by stating that in mainstreaming HIV/AIDS into agricultural extension there was a need to attitude change of agricultural extension staffs. This was on impressing on them that HIV/AIDS is not a health matter, but a development issue.

The findings reveal that extension staff clearly the attitude to HIV/AIDS households has improved after the trainings. Some of the extension staffs who were not targeting households are now able to initiate dialogue on HIV/AIDS and work with affected households. They are able to clearly recognize the right of the households affected by HIV/AIDS to the service they offer. They are also ready to use their closeness to the farming community to address these households. They are sensitive to the fact that members of households affected by HIV/AIDS may need extra encouragement to participate in development projects and even undertake activities agreed between them and the extension staffs.
NAADS (2004) advises the extension worker should be sensitive when working with HIV/AIDS affected families. This is because these families are already disadvantaged by their poverty and often by the fact that HIV/AIDS is still considered shameful in some communities.

Though they are confronted with stigma which can be very strong within the rural communities most of the extension staffs are not ashamed to be associated with working with households affected by HIV/AIDS. The extension staffs make efforts in various forums to talk on issues on HIV/AIDS among themselves and with farmers. This is during;

- Field days
- Carrying out of PRAs
- Farmer training such as with the Focal Area Development Committee
- Staff meetings

The findings also point to the fact HIV/AIDS issues are still not highly prioritized in some activities. I do not know you base your statement on what??

A case comes to mind where the extension put the PLWHAs group to the periphery during the field days (See Box 1). This can be attributed to the fact that the MoA is so much focused to commercialization of agriculture and the PLWHAs activities might not fit into the theme of the field day.

The finding reveals that some extension staffs are still uncomfortable to discuss their involvement with working with PLWHAS. Though they working with households affected by HIV/AIDS, the fact that the groups are formed by other stakeholders the extension staff do not consider it part of the MoA work. They feel that they have not done much since they are not the one that provides materials and inputs required by the households affected by HIV/AIDS. What does this imply for your research question?

5.3 Knowledge and Skills to Mitigate Impacts of HIV/AIDS

You do not assess and discuss the findings in relation to skills and knowledge!!! Draw conclusions using these concepts. State your own opinion on these issues!!! And why are you not including attitude??

Maybe you refer to the scheme your presented above in chapte 2 I think on the required knowledge, attitude and skills.

Traditionally the MoA has been involved in poverty alleviation initiatives in the rural communities. The MoA has also adopted a human approach?? What is this?? to provision of extension services. During implementation of projects it has been realized that the poor and vulnerable groups do not participate in project activities. Holden (2004) suggests that there should be a shift from focus from increasing production rate using ‘high tech’ and high status methods to ......................... when dealing with vulnerable groups. Due to stigma associated with HIV/AIDS the affected households are not represented in planning and implementation of projects. Being a public service provider, the MoA has an obligation to provide services to all the farmers. However, some special attention is required to reach the vulnerable in the communities. The finds on the various activities carried by the extension are given in the below.

- Ensuring they are targeted in extension interventions
The finds shows that for those staffs trained on the PAPOLD tool are using it try and identify the vulnerable groups during the PRAs/BBS. This exercise is carried out by the extension staffs, community leaders and stakeholders working in the area. In the PRAs/BBS the extension staffs display and promote technologies relevant to households affected with HIV/AIDS. From the findings it is evident that issues of HIV/AIDS are not prioritized during the formulation of the Community Action Plans (CAPs).

From the interviews with the FADC, the extension staffs carry out the PAPOLD as per the work plan. However, there is no further effort to assist the vulnerable to form Self Help Groups (SHG). The extension staffs do not did not even try to compliment the efforts of one of the FADC when she brought a group of PLWHAs together. The vulnerable groups are not networked with any organization which can provide them with much need assistance. This could maybe the staff do not identify the appropriate stakeholders to work with them during the planning and carrying out the PRA/BBS exercise. Qumar (2003) argues that to move fast there is need to move fast and with collaboration with other relevant institutions to properly respond to respond to the increasing impact of HIV/AIDS on the overall farming situation.

From the finding most of the extension staffs concentrate a lot on the Common Interest Groups (CIGs) undertaking commercial orientated activities. These CIGs are able to demand for intervention. Results of these are seen in the FADC in terms of the activities they have been undertaking such as; growing of improved tissue culture bananas; improvement of milk production; marketing of milk; marketing of avocados; networking with various production and marketing bodies (Annex 1). For improving the livelihoods the staffs do not even use the funds allocated for demonstrations to promote appropriate technologies for these groups. How does this relate to your research question??

It is evident from the findings that most of the PLWHAs SHGs the extension are working with are those already formed by the efforts of other organizations working with HIV/AIDS affected households. These organizations are; churches; Non-Governmental organizations; and Community Based Organizations. These organizations have resources to provide the households affected by HIV/AIDS with farm inputs and more training. The extension staffs are not in such a position and complain of even no facilitation and allocations to deal with groups if the identify them. Due to this situation the staff might not put a lot of effort to form the SHGs. One of the extension staff even wondered if they can be able to form a self help group of PLWHAs. And this is something limiting multi sectoral approach? And how does it relate to your research question?

Another finding from the results is that the extension staffs are involved in fighting stigma and discrimination in the farming communities. This is important so as to ensure the communities accommodate the PLWHAs in the development issues. This would allow the PLWHAs to be identified easily and targeted within a project.

- Improving their nutrition and food security
In the finding there is evident that the extension staffs are aware of intervention that can improve the nutrition and food security in households affected by HIV/AIDS. This is through:

- Setting up kitchen gardens;
- Keeping of small livestock such as dairy goats; rabbits; local chicken;
- Growing of traditional vegetables which require less inputs and management;
- Growing of crops such as sweet potatoes that require less labor.

Are these interventions assessed critically in terms of labour and cash requirements?

It is also evident from the results that the extension staffs are involved in nutrition education when they are training group of PLWHAs. The extensions mostly involved in this activity are the home economic staffs that have been trained on the subject on HIV/AIDS and nutrition. This is seen from the PLWHAs group who were displaying foods they were growing and processing for both their use and selling. The same intervention messages were also displayed in the MoA stand at the field day.

From the finds of the field extension worker working with divisional extension staff and collaborators (Box 1) there are groups benefiting in improving their household food and nutrition security. This can also be said of the group of PLWHAs exhibiting in the field day (Box 2). The PIGMO and the Gender and HIV/AIDS officer from NALEP also gave of finding such groups in the field during supervision.

Though almost of all the respondents show knowledge of what is needed to alleviate the problem of food and nutrition security in households not all have put this into use in addressing households affected with HIV/AIDS. Is this a questions of lack of skills or not having the right attitude?? The findings show some were shy or either uncomfortable thus attitude problem to working with these households. The PIGMO summed it up by saying that extension staff can even give reports that they dealt with the groups but nothing can found in the field during supervision.

- **Promoting appropriate technologies to deal with labor shortages**

The HIV/AIDS have adverse effects on the small scale farmers who depend so much on manual labor to do all their operations. The farming household may abandon the crops they are growing and opt to grow crops requiring less labor. Qumar (2003) gives an example of Malawi where HIV/AIDS affected household abandoned growing and post-harvest processing of tobacco and started growing crops like cassava and sweet potatoes, which require less manual labor. To address the HIV/AIDS affected households effectively, extension staffs need to have the knowledge of low labor technologies and skills to put in practice these technologies to benefit the targeted clients.

The findings from the research show that most of the extension staffs have knowledge on labor saving technologies. These technologies which the respondents propose for dealing with declining labor situation for households those affected by HIV/AIDS are;

- Setting up kitchen gardens;
- Keeping of small livestock such as dairy goats; rabbits; local chicken;
• Growing of traditional vegetables which require less inputs and management;
• Growing of crops such as sweet potatoes that require less labor.

These technologies can be seen in Box 1 where the extension staffs have promoted and implemented most of the technologies stated above. The extension staffs in this example how knowledge and skills gained through experience working with resource poor rural household can be applied to deal with HIV/AIDS households.

The findings also reflect that mostly the interventions to deal with labor shortage are promoted in field days and during carrying out of the PRAs/BBS. Since the MoA does not give inputs the extension staffs are not keen to form SHGs for the PLWHAs. The extension staffs all complain of the heavy workload involved in implementing a Focal Area (FA) for a period of one year. One of the DAOs interviewed summed this when he said: ‘By the time we are through with studying the FA and start the actual project activities implementation it is time to move to another area’

• Income generating activities

Findings from the survey show that extension staffs promote various incomes generating activities for the households affected by HIV/AIDS in their area of work. The income generating activities identified in the finds are; bead work; tie and dye cloth making; making of liquid soap; nurseries; selling and installing of energy saving stoves.

The households affected by HIV/AIDS have increased requirements for money to deal with medical traveling and medical expenses. At the same time their productivity is decreasing as labor availability from both the sick and those who reduce their working time to take care of the sick. These households are in need of simple technologies which can generate for the much needed income.

From the research finding there is no indication of the extension staffs networking any group with microcredit facility provider. Also there are only a few of the extension staffs who showed they have an idea of what the Constituency AIDS Control Committee with the Community Development Organizations (CBOs). The CACC have been funding CBOs to assist groups of PLWHAs to initiate and undertake activities for income generating activities.

The CACC provide funding of up to Kshs. 350,000 to each group. At the district level funding of up to Kshs. 2,000,000 are availed to CBOs. DAOs, DIGMOs and the DAEO are not actively in these two public bodies. Divisional extension staffs can assist the groups with writing proposal and assist get the SHGs they have formed to get funding. The findings in Box 2 illustrate how extension staffs can assist groups of PLWHAs to get funding and implement activities which can improve their livelihoods.

Analyse this more in terms of knowledge, skills and attitude. If you present it like this it is very hard to understand the linkage with your research question.
5.4 Gaps in Competencies to Deal with HIV/AIDS

Skills to deal with HIV/AIDS

The findings have revealed that the extension staffs felt that they lacked skills in effective communication while working with PLWHAs. According to Brinkman and Westendorp (2005), dealing with HIV/AIDS by extension staffs has increased the need for good communication skills. Due to stigma associated with HIV/AIDS, it can be difficult for extension staffs to discuss issues of HIV/AIDS with farmers. Some of the communities even reject the services of an extension agent.

Another of the skills the extension staffs feel they require is counseling skills. The MoA training programme has been conducting one week basic counseling skills. A one week training on counseling does not make one a fully fledged counselor. The training only gives an extension staff some communication skills like listening and showing empathy? Sympathy? to people living with HIV/AIDS. Brinkman and Westendorp (2005) have the same view when they put it that the counseling needed by rural development profession could mean better facilitation and communication skills. And what do you think yourself???

From the finding the extension staffs have identified lack of skills in addressing the needs of the households affected by HIV/AIDS in their extension work. Based on your findings and what you think MoA should do, I expect from you also an analysis of the gaps in knowledge, skills and attitude!!!!!!!!!!! There are technical knowledge with the extension staffs which the staffs have been promoting in various in the field days, shows and farmer trainings. This can be attributed to the fact that the training they have undergone did not equip well to be able to apply the technical knowledge in addressing the households affected by HIV/AIDS. Some of the training like the peer education was mostly focused on behavior change and not mainstreaming of HIV/AIDS in agriculture. Thus building the wrong competencies???

I think you should state clearer your position on what the MoA should do on mainstreaming and what requirements are necessary. You need to express your opinions on competence building, competences required, and how far the MoA has come and what needs to be done!

Knowledge to Work within an HIV/AIDS Context

The extension staffs also identified they need knowledge of how to link HIV/AIDS and extension work. It is the same here: give your opinion as well. Analyse what you think are gaps in knowledge, state clearly what you think is necessary. Compare your opinion with what the extension staff has identified are needs for knowledge. Mainstreaming HIV/AIDS is a new area for most of the extension workers. In the results some also complained that session on mainstreaming of HIV/AIDS in agriculture was too short. They also suggested the use of case studies in future training. Not being able to link HIV/AIDS and extension work maybe has been the biggest problem when the divisional and district extension staffs are requesting for funds in the annual workplan and budget. Most of them still request money to conduct training on behavior change. This might be a problem when they come to defend their budgets at the financial meetings.
Another big gap identified by whom, based on what evidence?? is on the knowledge on effects of HIV/AIDS on Household livelihoods.

5.5 Institutional Factors Affecting HIV/AIDS Mainstreaming In Extension is this new information. How does this relate to your conceptual framework?? You have not talked about institutional factors affecting mainstreaming before. So explain, and introduce things in chapter 1 and/or 2.

Policies and Performance Contract on HIV/AIDS

The DAOs confirmed the district does not specifically plan for extension staff capacity building on HIV/AIDS during annual work planning and budgeting. One of the DIGMOs interviewed said the following workplan and budgeting for HIV/AIDS: ‘The budget for HIV/AIDS mainstreaming is always put in the budget annex. We don’t get funds to train the other extension staffs or arrange tours where they can see a good practice of mainstreaming. We don’t get even funding for demonstration on kitchen gardens.’

Resource allocation of resources for all agricultural extension activities are dictated by the MoA Strategic Plan-2006-2010. The document does not recognize mainstreaming of HIV/AIDS in agriculture. This sounds contradictory to what you wrote in chapter 1 or 2 about the policies of MoA. The insert in the plan read as such: develop prevention and control measures for HIV/AIDS. The strategies adopted in the plan are: strengthening of the ACU; strengthen links with the National AIDS Control Council (NACC). The activities allocate resources over the five years planning period are Kshs. 5,000,000 for training five senior staff and Kshs.2,000,000 for staff sensitization on HIV/AIDS. How do you analyse this and what does it mean for competence building?

Staffs in the MoA have to sign performance contracts at the start of each financial year. The contracts set targets for activities too be achieved by key offices from the permanent secretary upto the divisional agricultural extension officers. The performance contract for the PS sets the overall targets for the MoA. On the issues of HIV/AIDS the performance contract for the financial year 2007/2008 had the following insert:

The Ministry will undertake the following;
- Counseling of staff on HIV/AIDS
- Condom use promotion
- Behavior change communication for vulnerable groups
- Submit quarterly reports to the National AIDS Control Council (NACC)

Give your reflection and analysis on this.

The performance contract is the cascaded through to the PDA, DAO and the DAEOs. In one of the districts the performance contract between the DAO and DAEOs read as follows; HIV/AIDS Behavior Change: The DAEO will continue with sensitization of staff on the need of behavior change. Not clear, what should be the change in behaviour, based on what? This is a directly extracted from what the DAO signs with the
PDA. At the district level the DAOs give the DIGMOs the responsibility for implementing and attaining the target set for in the contract. At the division it is the Divisional Home Economics Officer as the focal person on HIV/AIDS to who is charged with attaining the targets set.

Performance contracts are used to gauge the output of the staffs both at the middle of the financial year and the end of the year. As seen above, it is only at the PS level where vulnerable groups are mentioned. The activity target for these groups is only on behavior change. There appears to be no recognition of the efforts the extension staffs are doing in mitigating the impact of AIDS in affected households.

Again, now new findings or information in this chapter, only discussions!
CHAPTER SIX - CONCLUSIONS AND RECOMMENDATION

6.1 Conclusions
The extension staffs are putting some efforts in contributing to the fight on HIV/AIDS through provision extension services to the farming communities. There exists technical knowledge within the MoA which can be used to address households affected by HIV/AIDS. This knowledge is in terms of; labor saving; income generating activities such as bead work. The extension staffs have done this by promoting technologies in field days and farmer trainings. However, they have not adequately reached the target groups who are the households affected by HIV/AIDS. I have not seen evidence of this statement!

I check in this chapter each statement whether it is supported by evidence in the previous chapters. Try to answer the research sub questions and the major research question. And see whether the answers are living up to the expressed research objective. In the rural area stigma associated with HIV/AIDS is still very high. To assist the extension staffs target the vulnerable groups who include households affected by HIV/AIDS the MoA has introduce the use of PAPOLD during PRAs/BBS. After identification of these groups the extension staffs seem not to take further action in addressing the needs of these households.

Although MoA extension staffs have a lot of experience in mobilizing farmers to form groups they have not managed to bring the PLWHAs into Self Help Groups (SHGs). Where the extension staffs have found or been introduced to groups of PLWHAs they have been able to use their technical knowledge to improve their food and nutrition security. They are not able to network them with organization offering assistance to those affected by HIV/AIDS.

With the time allocated to implement a project in a FA the extension are not able to target HIV/AIDS affected households in groups or individually effectively. The extension staffs are mainly engaged with Common Interested Groups (CIGs) which are able to demand their services and also capable of implementing recommendations provided by them.

The HIV/AIDS related trainings have given extension staffs some confidence to talk about HIV/AIDS with the farmers. Due to the nature of most of the trainings which dealt mostly on basic knowledge HIV/AIDS, the extension staffs seem to be engaged in behavior change.

The extension staffs may have the relevant technologies essential for improving the livelihoods of households affected by HIV/AIDS. However, lack of appropriate communication skills can hamper the delivery of intervention. The training on HIV/AIDS awareness which is part of the MoA organization workplace policy and programme can are useful in giving staffs the courage to discuss HIV/AIDS with clients. Communication is essential to make sure the HIV/AIDS affected households are able to give their view on their needs.

Though the extension staffs have agricultural technical knowledge, they are not well motivated to deal with households affected by HIV/AIDS. Their work efforts in dealing
with HIV/AIDS affected households are not recognized in the policies and the annual performance contracts.

The MoA has been traditionally involved in poverty alleviation initiative. This means extension staffs have experience in working with resource poor farmers. There is need to harness this opportunity to address the households affected by HIV/AIDS. Some SHGs of people living with HIV/AIDS are benefiting from staffs that are showing how extension staffs may combine their technical and work experience to improve livelihoods of households affected by HIV/AIDS.

6.1 Recommendation

There is a need for the management to understand the concept and process of external mainstreaming of HIV/AIDS. Where do you write that management does not understand external mainstreaming???? The MoA need to fully take why do you say that currently they do not talk on fully their mandate??? on its mandate in the multi-sectoral approach in mitigating the impacts of the AIDS pandemic. The policies, strategic plans, the performance contracts should be made explicit to what is supposed to be achieved in this area. The MoA should formulate a strategic plan on how to deal with mainstreaming of HIV/AIDS in it core activities. This it can do by borrowing from countries where other ministries of agriculture have formulated such strategies and are successfully implementing them.

To successfully implement the process the management then need to commit resources by adjusting budgets to cater for staff capacity competence?? building. The MoA should provide funds for extension staff to implement activities geared towards improving the livelihoods of households affected by HIV/AIDS. You have not talked about budget allocated for competence building so far. How than can you make this recommendation??

To ensure that the capacity building provide the required competencies in the extension staffs the following are recommended; recommendations are based on conclusions. Conclusions are based on the findings of your study. I have the feeling that below you present a lot of recommendations related to issues that you have NOT discussed in the main text. And you pulling it much broader than only competence building!!!!!!!!!!!!

A conclusion that you could draw is that the MoA defines external mainstreaming as impact mitigation at household level with a focus on food and nutrition security. You can argue that this might not give the expected results set for the mainstreaming. Thus a recommendation could be that the MoA needs to reconsider its definition and focus of mainstreaming.

1. The MoA need to strengthen the headquarters ACU through reappointment of staff attached to the unit. A technical committee comprising staff from all the five departments in the MoA and the staff working in the ACU should be formed. The technical committee members should then be trained adequately on mainstreaming HIV/AIDS.
2. The MoA should take an inventory of what and how the extension staffs understand and are implementing activities toward mainstreaming HIV/AIDS in their work.
3. Training needs assessment of what the extension staffs require to successfully undertake activities targeting households affected by HIV/AIDS.
There is need to formulate a comprehensive training programme for extension staffs. Those planning for the training programme should not only use the results of the needs assessment but also ensure there is full participation of the extension staffs working at the lower levels. How can a needs assessment give good outcomes when many of the staff do not understand properly what is meant by mainstreaming? You might get identified training needs that have nothing to do with mainstreaming! Do not leave everything to the staff, state your own position (after all you are the expert by now) and based on that come with conclusions and recommendations.

4. The eight Provincial Sub-ACUs should be revived and strengthened by re-appointing staff and training them on mainstreaming of HIV/AIDS. At the district level focal persons should be reappointed and retrained. All the DAOs should be trained on HIV/AIDS mainstreaming and held accountable in ensuring the focal persons get both material and technical support from the other staff at the district level.

5. The Provincial Sub-ACUs and the focal persons should form core teams which should be charged with training division extension staffs on Mainstreaming HIV/AIDS in agriculture.

6. The trainings for extension staffs should be practical oriented to give the extension staff clear insight of how to handle households affected by HIV/AIDS. This can be achieved by use of case studies of situation where mainstreaming of HIV/AIDS has been successfully implemented. To promote information sharing staffs that are having success in working with HIV/AIDS should be incorporated in the trainings as facilitators. During the organizers should schedule a visit to the focal area where such an extension staff is working.

7. The MoA should come up with guidelines on mainstreaming HIV/AIDS in agriculture extension for the extension staffs to supplement what they learn during the trainings. There are many toolkits on HIV/AIDS developed by organizations such as FAO and OXFAM from where those formulating the guidelines can borrow ideas for mainstreaming.

8. Finally the ACU should work towards setting up a sector working group. The working group would comprise stakeholders working on HIV/AIDS in rural development.
References


CARE, 2002. Poverty, vulnerability, and HIV/AIDS mainstreaming in Lesotho; Livelihoods Recovery Through Agriculture Program (LRAP) and Secure the Child (STC).


MoA & MoLFD, 2008.


Topouzis, D., 2003. Addressing the impact of HIV/AIDS on ministries of agriculture: focus on eastern and southern Africa. Rome


# Annex 1

## Plan for the Research and Study

<table>
<thead>
<tr>
<th>Activity</th>
<th>Dates assigned</th>
<th>Remarks</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Travel to Nairobi</td>
<td>13-07-2008</td>
<td>To arrive on 13-07-2008.</td>
</tr>
<tr>
<td>2. Visit MoA headquarters</td>
<td>15-07-2008</td>
<td>Set the interview dates with the interviewees. *Interview ACU member.</td>
</tr>
<tr>
<td>3. Visit Muranga North District Headquarters</td>
<td>16-07-2008</td>
<td>To set the dates for the district headquarters interviews. Establish contact with the divisional heads through the DAO.</td>
</tr>
<tr>
<td>4. Interviews at the district and division headquarters</td>
<td>17 July 2008 to 30 July 2008</td>
<td>The extension staff at the district headquarters and division headquarters.</td>
</tr>
<tr>
<td>5. Focus Group discussion</td>
<td>31 July 2008</td>
<td>To interview one groups of PLWHA to get their views on extension services in the area.</td>
</tr>
<tr>
<td>5. Interviews at the headquarters</td>
<td>1 August 2008</td>
<td>MoA and project key informants</td>
</tr>
<tr>
<td>6. Data analysis and writing of draft report</td>
<td>4 August 2008 to 13 August 2008</td>
<td>Editing, Coding and submit first draft</td>
</tr>
<tr>
<td>7. Report writing</td>
<td>14 August 2008 to 22 August 2008</td>
<td>Revising report as per supervisors inputs</td>
</tr>
<tr>
<td>8. Travel back to Wageningen</td>
<td>24 August 2008</td>
<td>To arrive on 24 August 2008</td>
</tr>
<tr>
<td>9. Hand in First draft</td>
<td>15 September 2008</td>
<td>Other procedure to be set with consultation with the supervisor.</td>
</tr>
</tbody>
</table>
Annex 2: Focused Group KIRU PLWHAs Self help Group

Introduction

This section captures information from focused discussions with a group of persons living with HIV/AIDS. The discussion with the PLWHAs gives insight to interventions done by extension staffs. The group gives their feeling to the attitudes and the skills of extension staff in addressing households affected by HIV/AIDS. The section captures a the story how a Field Extension Worker (FEW) working with divisional extension staffs who have assisted households affected with HIV/AIDS improve their livelihoods through agricultural based interventions. The team was able to mobilize resources from within the Ministry of Agriculture and other stakeholders in accomplishing the intervention they targeted for the PLWHAs Self Help Group (SHG).

The PLWHAs Self Help Group (13 women and 7 men) was started in 2003. The group started engaging with Ministry of agriculture three years ago. This was during the planning and implementation of the Focal Area. During the period they have been engaged with the MoA extension staffs each of the members has established a kitchen garden near their houses. Crops grown in the kitchen gardens are traditional vegetables such as amaranths and black night shade, onions and carrots.

The women member said were very happy as they were not buying the food. Kitchen gardens are saving money as they are not purchasing vegetables which they used to purchase daily. The women members showed their gratitude for the kitchen garden intervention said: ‘We no longer have to buy things like onions and vegetables since we put up the kitchen gardens. We are able now to afford to buy other commodities needed in their households such as sugar and soap’. The Field Extension Worker and the extensions staff at the division were in the process of promoting and introducing to the group the multi-story kitchen gardens. The multi-storey kitchen garden need less water and is easy to manage especially for the PLWHAs.

The groups’ dairy goat project was initially planned for funding through the GTZ-PSDA. When funding got delayed the extension staff assisted the PLWHAs group to write a proposal to Njaa Marufuku Kenya (NMK). NMK is a project within the Ministry of Agriculture. The group got Kshs. 120,000/= from the project which they used to purchase a German Alpine buck. The money was also used to buy each of the 20 members a local goat. The goats have already given birth with most of them getting twins. The extension staffs helped the group to be registered with the Dairy Goat Association of Kenya (DGAK).

‘We will now be able to pay even dowry from the sale of the off springs of these dairy goats. It is just like having some savings in the bank. The other community members are now bringing their goats to our buck so as to improve their goats’. This was the comments of the owner of the compound where the group was meeting as he proudly displayed the Dairy Goat Association of Kenya ear tag on one of his dairy goats. A one goat with the tag usually cost Kshs. 10,000/= which is six times more than the price of a local goat of the same age. The group is satisfied with the results of the interventions. They get goat milk which is nutritious and manure for the kitchen gardens. The dairy goats give birth twice per year and twining hence are a saving which the can use for educating children and dowry. This is good as it diversify their livelihood assets.
The group is involved in selling and installation of energy saving stoves in the area. The extension staff working with the divisional and district counterparts was able to get the start up capital. Starting a tree nursery was not good; it involved carrying water; required technologies which did not a lot of digging and physical work as they did not have a lot of energy. He identified with them a soft job of selling stove liners which could save cost of fuel wood by 50%. The group each also got a boost of Ksh. 10,000/= to increase their stock of stoves. He organized with the District GTZ-PSDA coordinator to supply the groups with 50 liners and also provide them with storage in his small office. On market days the group members would take a few stoves to the market. After selling the stoves they could replenish the stock from the store.

He also arranged for the group to be trained through the District Home Economics officer on installation of the stoves. The training took five days. This boosted their income as they were being paid for the installation. It also helped them fight stigma and discrimination as the proved to the community of their hard work despite the HIV/AIDS status. To manage the groups finances the extension staff arranged for 5 days group dynamics training. The groups were also given training for 5 days on agribusiness so they could explore other income generating activities.

On the work they have done with the agricultural extension staffs they were unanimous with their chairperson who concluded by saying; ‘We cannot let our friend to be taken from us. We have gained a lot of agricultural skills. He has done a lot for us. We are now better off since he started working with us. There has been no stigma or discrimination from the extension staffs, the district and divisional officers or the extension service providers they bring to the group. All have been encouraging and assisting them to have hope’.

The group felt that they still needed guidance on how to diversify the crops and livestock technologies such as passion fruits, tree tomatoes and local chicken improvement. They felt PLWHAs need to be assisted in creating confidence so as to be able to get their rights in situations of demand driven extension service provision. They appreciated lack of extra extension staff hence need for group approach.
Appendix 3

Permission to use

In presenting this research project in partial fulfillment of the requirements for a Postgraduate Degree, I have agreed that the Library of this university may make it freely available for inspection. I further agree that permission for copying of this research project in any manner, in whole or in part, for scholarly purposes may be granted by Larenstein Director of Research. It is understood that any copying or publication or use of this project or parts thereafter for financial gain shall not be allowed without my written permission. It is also understood that due recognition shall be given to me and to the University in any scholarly use which may be made of any material in my research project.

Request for permission to copy or make other use of material in this research project in whole or part should be addressed to:

Director of Research
Larenstein University of Applied Science
P. O. Box 9001
6880 GB Velp
The Netherlands
Fax: 31 26 3615287
E-mail: Research@larenstein.nl