Experience points to the fact that the majority of the clientele were slightly older. These findings indicate that relatively youthful functionaries were carrying out agricultural extension. However, extension workers qualification had generally been found to be below degree level.

A cross examination of the ages of the farmers revealed that the ages for farmers also ranged between 25 to over 60 years with the highest concentration around 40-45 years; Table 2 below shows all the tabulations. Based on these results, it was observed that the majority of respondents were still below 45 years with a lot of energy and desire to learn and improve their farming enterprises. The findings also showed that the staffs were young, recently graduated, and hence able to cope up with the pressure of work and quick to learn and adopt new extension approaches.

**Table 2: Ages of farmers in years**

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Valid</td>
<td></td>
<td></td>
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</tr>
<tr>
<td>25-30</td>
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<td>3.8</td>
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</tr>
<tr>
<td>30-35</td>
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<td>11.5</td>
<td>11.5</td>
<td>15.4</td>
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<tr>
<td>35-40</td>
<td>3</td>
<td>11.5</td>
<td>11.5</td>
<td>26.9</td>
</tr>
<tr>
<td>40-45</td>
<td>8</td>
<td>30.8</td>
<td>30.8</td>
<td>57.7</td>
</tr>
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<td>45-50</td>
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<td>15.4</td>
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<td>50-55</td>
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<td>15.4</td>
<td>15.4</td>
<td>88.5</td>
</tr>
<tr>
<td>55-60</td>
<td>2</td>
<td>7.7</td>
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<td>96.2</td>
</tr>
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<td>above 60 years</td>
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</tr>
<tr>
<td>Total</td>
<td>26</td>
<td>100.0</td>
<td>100.0</td>
<td></td>
</tr>
</tbody>
</table>

**5.2.2 Education level of staff**

An analysis of the education levels of staff as shown in Table 3 indicates that about 73.1 percent were Certificate holders while 23.1 percent were Diploma holders with only about 3.8 percent of the respondents being Degree holders. This shows that the majority of the extension staffs in Mpika were certificate holders trained at Zambia College of
Agriculture, Mpika or Monze. Therefore, this validated the need to assess the curriculum in Communication skills at Zambia College of Agriculture in Mpika.

The National Agriculture Policy (2004) observed that amongst the factors attributed to the unsatisfactory performance of agriculture in Zambia, was the limited number and loss of trained and experienced agricultural human resource. Despite past and present investment in agricultural training, the present scenario indicates that supply from Agriculture Training Institution (ATIs) did not meet the critical mass of the human resource base required for sustainable agricultural development. It was therefore important to ensure that training was relevant, systematic, coordinated and demand driven and that there was efficient and effective utilization of trained personnel in both the public and private sector.

The overall objective of the agricultural training sub-sector is to ensure that a critical mass of suitable and adequately trained human resource was produced so as to meet the needs of both the public and private sectors in a liberalized agricultural sector. Among the objectives of the Policy are to ensure that quality and relevant agricultural training was provided through curriculum reform and development of teaching resources. The policy also seeks to institute a mechanism for monitoring and evaluation of agricultural training activities.

Table 3: Education levels of staff

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
</tr>
</thead>
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<tr>
<td>Valid Bachelors degree</td>
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<td>3.8</td>
<td>3.8</td>
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<tr>
<td>Diploma</td>
<td>6</td>
<td>23.1</td>
<td>23.1</td>
<td>26.9</td>
</tr>
<tr>
<td>Certificate</td>
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<tr>
<td>Total</td>
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<td></td>
</tr>
</tbody>
</table>

The findings pertaining to the experiences of agricultural extension workers are presented in Table 4 below.
Table 4: Distribution of respondents (staff) by years of experience

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
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<td>Valid</td>
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<tr>
<td>less than 5</td>
<td>15</td>
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<td>57.7</td>
</tr>
<tr>
<td>years</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5-10</td>
<td>2</td>
<td>7.7</td>
<td>7.7</td>
<td>65.4</td>
</tr>
<tr>
<td>10-15</td>
<td>4</td>
<td>15.4</td>
<td>15.4</td>
<td>80.8</td>
</tr>
<tr>
<td>15-20</td>
<td>2</td>
<td>7.7</td>
<td>7.7</td>
<td>88.5</td>
</tr>
<tr>
<td>20-25</td>
<td>3</td>
<td>11.5</td>
<td>11.5</td>
<td>100.0</td>
</tr>
<tr>
<td>Total</td>
<td>26</td>
<td>100.0</td>
<td>100.0</td>
<td></td>
</tr>
</tbody>
</table>

The findings indicated that 57.7 percent of the staff had worked for less than 5 years; about 7.7 percent had worked for less than 10 years while 15.4 percent had worked for up to 15 years; and only about 7.7 percent having worked for 20 years while a further 11.5 percent had worked for more than 20 years. When compared with the number of years the farmers had been at their farms, the figures shows that 58.5 percent had been at the farms between 5-10 years, while 26.5 percent had settled for about 11-15 years. About 15.4 percent had been longer enough in contrast to 11.5 percent who had settled for less than 5 years; see Table 5 for further elaboration.

Table 5: Number of years for farmers having been at the farm

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
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<td>Valid</td>
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<tr>
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<tr>
<td>years</td>
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<tr>
<td>between 5 and 10 years</td>
<td>10</td>
<td>38.5</td>
<td>38.5</td>
<td>50.0</td>
</tr>
<tr>
<td>11-15 years</td>
<td>7</td>
<td>26.9</td>
<td>26.9</td>
<td>76.9</td>
</tr>
<tr>
<td>16 to 20 years</td>
<td>2</td>
<td>7.7</td>
<td>7.7</td>
<td>84.6</td>
</tr>
<tr>
<td>more than 21 years</td>
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<td>15.4</td>
<td>15.4</td>
<td>100.0</td>
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<td>Total</td>
<td>26</td>
<td>100.0</td>
<td>100.0</td>
<td></td>
</tr>
</tbody>
</table>
While agricultural extension work at the grass root level had generally been in the hands of moderately experienced personnel, most of the farmers had been at their farms for almost the same period. These findings when considered along with those on ages distribution, experience and how long the farmers had settled at their respective farms clearly indicated that agricultural extension clientele in Mpika were served by relatively youthful staffs who were yet to gain more experience.

Generally, agricultural extension workers ought to function in a manner that is conceptualised along two perspectives: operational functioning and intellectual functioning. Operational functioning occurs when they engage in observable activities, while intellectual functioning takes place when been grounded by certain thought processes. The level of education and experience possessed were likely to have a bearing on both perspectives, as they were central to analyzing extension workers way of thinking, feeling and acting while on the job. In this context, their relatively low level of training and moderate level of experience put agricultural extension workers in relative disadvantage operationally and intellectually when it came to functioning in their increasingly complex work milieu.

5.3 KNOWLEDGE ON PARTICIPATORY COMMUNICATION BY FIELD AND DISTRICT STAFF
This aspect was considered vital in knowing the changes that were needed in the programme presentation on participatory communication. Series of questions were asked such as “how do you define a community? What is the importance of community participation? What are the various modes of community participation? What are the advantages of the use of participatory communication? The challenges they had encountered and what changes they would wish to see in ASP programming and presentation”.

Knowledge on the definition of a community and the importance of community participation was good. They defined a community as:
"A group of people living together in an area with objectives being achieved together for a common good."

"A group of people living together in a particular area regardless of their interests or status."

"A setup of individuals or families residing within the same area."

"Or people living in a recognized locality."

While others defined a community as:

"A gathering of people living in the same environment with common interests."

"a group of people who live together in biological relationships or as mixed tribes so long they are working together in development."

In almost all the respondents, they had better level of understanding on the importance of community participation in agriculture as exhibited by the quality of responses. They said that community participation enhanced ownership, togetherness and it gave chance to members to contribute towards sustainable development. Others felt that since the communities were the ones affected, then it was important that they were involved in all activities targeted.

**5.4 MODES OF COMMUNITY PARTICIPATION**

Both the district and field staff identified four main modes of community participation. Out of the 26 respondents, 38.5 percent indicated that the local communities were involved through cooperation, 3.3 percent through consultation. To some respondents (7.7 %), the community participated through collaboration; about 7.7 percent mentioned co-learning, with 38.8 percent of the respondents stating that the communities were involved in collective action.

This means that there was greater appreciation of the importance of involving the community in participating in all activities at all levels of the planning and implementation stages. When asked to state some of the greatest advantages of participatory communication, they gave the following responses as presented in the table below:
Table 6: Analysis on importance of participatory communication

- “Rural people tend to open up”
- “A lot of issues are aired out and makes it easy to understand what is talked about”
- “It leads to empowerment”
- “Communities are free to involve themselves in development activities”
- “Ideas and information are shared/exchanged among participants and their ideas are respected”
- “Common understanding of issues”
- “Prioritizes issues on what is needed first”
- “Farmers are able to identify core problems and then provide own possible solutions and this leads to sustainability and ownership”
- “New ideas are easily transmitted and accepted through this method”
- “Development is easily enhanced”
- “It creates room for dialogue and collective decision making”
- “Improved collaboration between staff and farmers”
- “Increased knowledge on farming”
- “Motivation of farmers by presence of staff”.

However, the staff pointed out that although there were many advantages on the use of participatory approaches as shown in the table above, they observed that they had faced many challenges with the use of the approach.

They observed that some households still regarded field facilitators as reservoir of solutions to all their economic problems so they tended to be over expectant and as such, this made it difficult for some farmers to participate as they felt that facilitators knew everything. This was normal considering that the farmers were still served by the same field officers who used to tell them what to do under a different extension approach.
A low literacy level among farmers was another factor affecting the documentation of action plans of farmer's enterprises. This confirms the findings on the various sources of information were books and magazines had 3.8 percent of the respondents using them. Some respondents stated that there were times when it was difficult to agree on issues with the use of the approach. They felt that the process of facilitation took a lot of time to arrive at collective conclusion and development and at times influential figures in the community dominated the meetings. They recommended for skill among the officers on the use of participatory tools, which some CEO's/facilitators were not using well or not using at all. The respondents further noted that with the dependency syndrome among the farmers, changing their attitudes was not easy. In order to ensure effective utilization of the participatory approaches, it called for more resources for follow-ups and evaluation if this was going to lead to empowerment and subsequently sustainability of the field activities. However, the respondents felt that lack of transport, low and erratic funding levels by government and support entities hampered this.

Government funding to agriculture extension work did not reflect commitment to the said agriculture policy. The overall Agriculture Policy in Zambia is to facilitate and support the development of a sustainable and competitive agricultural sector that assures food security at national and household levels and maximises the sector's contribution to Gross Domestic Product (GDP) (NAP, 2004)

The policy will be realised through the following specific priority objectives:

1) To ensure national and household food security through an all-year round production and post-harvest management of adequate supplies of basic foodstuffs at competitive costs,

2) To contribute to sustainable industrial development by providing locally produced agro-based raw materials,

3) To increase agricultural exports thereby enhancing the sector's contribution to the National Balance of Payments,

4) To generate income and employment through increased agriculture production and productivity and
5) To ensure that the existing agricultural resource base is maintained and improved upon.

Therefore in order to meet the above set objectives, requires financial commitment to the agricultural sector. However, there was little money allocated to support extension work in Mpika District. The District received on average Fifteen Million (K15, 000,000) Kwacha per month which had to be shared among Ten sections of the Ministry of Agriculture and Cooperatives. Sometimes the District went without funding for more three months especially towards the end of the year and before the next budgets were approved by Parliament. While an analysis on funding for ASP showed that, the programme was receiving on average fifty million kwacha (K50, 000,000) per month to support its field activities.

The project was very strong and active as they had steady flow of funds, which supported field backstopping and trainings. The challenge was that once the funds were exhausted and the programme ended, the farmers would be left idle and end up been re-assigned to the very government extension workers with very erratic funding. In addition, trainings/research, which were important complements of extension, also suffered from poor funding implying further weaknesses of sources of knowledge for effective agriculture extension.

The messages from the above findings are very clear. In order to change the attitudes of the farmers and make them take the drivers seat in finding solutions to their problems, there would be need for continued follow-ups on field activities and this calls for improved transport situation and adequate funding to Ministry of Agriculture and Cooperatives.

When asked to make recommendations on the changes that they needed to see if any at Programme level, most respondents stated that the presentation of the Programme was fine, though some proposed enhanced facilitation of linkages to financial providers or provision of soft loans as start up capital. They said this should be targeted at helping
those in level 5 to improve their businesses. They said the recoveries could be used as revolving funds in the communities. Others still felt the Programme needed to give loans to viable farmers. While others felt there was need to accommodate the farmer’s ideas that they could work best in the areas, and reduce on paper work as this was making them spend more time as opposed to helping farmers.

These findings raise several pertinent issues as regards better ways to help farmers improve their business enterprises. While trainings had helped farmers participate in problem identification, Action Planning and implementation of activities, the capacity of the small-scale farmers to improve their income and food security remained a great challenge. This shows that the facilitators/CEO still had not yet appreciated the ASP principle of not giving loans to farmers.

5.5 ASP COMMUNICATION APPROACH
This was very important as the approach helped to understand the strategies the programme was using among the target groups, and how these had influenced them. An understanding of the ASP target groups and programme components laid the ground for the study.

5.5.1 ASP Target Group
Agriculture Support Programme has both primary and secondary target groups. The primary target groups include small-scale farming households in the selected areas spread over 4 provinces and 20 districts. As earlier alluded to, in Mpika District, the programme was working in 15 agricultural camps and targeting 2500 households in both phases.

While the “secondary” target group consists of stakeholders from local authorities (e.g. MACO agricultural extension staff, Councils and District Development Coordinating Committee) as well as the ‘private sector’ (support entities involved in input supply, extension, marketing, processing, transport, finances, insurance etc) that provide important services to farmers in answer to their needs to develop their businesses (commercialize agricultural production). Agriculture Support Programme interventions
were targeted at developing and strengthening this ‘secondary’ target group only as far as they had a direct relevance to the development of the farmers.

5.5.2 Programme components

ASP has five Programme components, integrated in the ASP facilitation cycle process, complimenting, and overlapping with each other. The five programme components are:

- **Entrepreneurship and business development:** The objective is to develop a critical mass of self-confident and emerging entrepreneurs with adequate female-headed households representation developed who identify and sustainably exploit business opportunities mainly on their farm.

- **Land, seed, crop and livestock development:** The objective is to develop an increased and sustained production and productivity from crop, livestock and non-traditional enterprises based on environmentally sound management of the natural resource base.

- **Infrastructure:** The objective is to develop a better market access and conditions for sustainable development and economic diversification improved through better community based infrastructure.

- **Improved service delivery of support entities:** The objective is improved service delivery and outreach through increasing the capacity among relevant entities supporting farmers and cooperatives.

- **Monitoring information and learning system (MILS):** The objective is to ensure an adequate and structured system provided for planning, implementation, monitoring, documentation, management and dissemination of lessons and experiences.

The assumption was that accomplishing each of the individual component objectives would generate the achievement of the two-programme objectives namely increased income and improved food and nutrition security.
5.5.3 ASP Approach and methodology
The Agriculture Support Programme seeks to build on concepts of demand-driven, participatory processes and integrated rural development with the focus of empowering the small-scale farmer/potential entrepreneur to function in a competitive market.

5.5.4 The facilitation cycle
The main ‘engine’ for the Programme is the facilitation cycle, which is illustrated in fig. 2 below. The facilitation cycle shows the various steps followed by the facilitators in the field when interacting with farmers.

Under the ASP facilitation, farmers were encouraged to form Interest groups (IG’s) with fellow farmers (preferably nearby) who had the same business interests. Farmers were facilitated through these IGs and individually, to take advantage of the local natural resource base by identifying and exploiting local economic opportunities in response to the prevailing and emerging market situation on sustainable bases.

Through this facilitation process, farmers training needs were identified, while appropriate technical business and management trainings were made available by the programme through facilitation of linkages to existing relevant training providers. Each household made Action Plans for various enterprises and consolidated it into one plan with all its enterprises. These plans were broken down per month and followed up by an ASP Facilitator/CEO at least once every six weeks with each household individually for a period of three-agricultural seasons. The outcome of the facilitation process was expected to be an increased number of rural household who were food secure and running sustainable, profitable or expanding and diversifying their rural agricultural related business.
THE ASP FACILITATION CYCLE

Step 1
Selection of target areas (according to set criteria)

Step 2
Awareness creation and initial community organisation

Step 3
Opportunity identification (including diagnosis of farming systems and production opportunities)

Step 4
Needs assessment

Step 5
Action planning

Step 6
Resources mobilisation

Step 7
Implementation, (including participatory monitoring)

Step 8
Evaluation

Food Security

Income Generation

Participatory Approach
Commercial Perspective
Good Governance
Transparency
Environment
Gender Perspective
HIV/AIDS Awareness

Infra-structure Funds
Agri-business and marketing
Access to improved seeds
Land crop and livestock husbandry training and promotion
Access to financial services

Capacity building and training
Linkages and networking
5.5.5 Impact of ASP programmes on the targeted beneficiaries

When asked whether farmers belonged to an Interest Group, 96.2 percent agreed that they did with only 3.8 percent stating that they did not belong to any. The farmers indicated that their commonest agricultural enterprises they were involved in were legumes, cereals, horticulture, livestock and savings.

According to the results of the study, about 15.4 percent of the farmers belonged to cereals and livestock IG, while livestock/horticulture and savings accounted for 11.5 percent of the responses. Farmers who belonged to legumes, livestock, and livestock/cereals/beekeeping constituted 7.7 percent. The rest of the farmers (3.8%) belonged to a combination of other IG’s.

This showed that the major enterprises that the farmers where engaged in were cereals and livestock and the facilitation of “Farming as a Business” was therefore tailored to meeting the challenges that these IG’s encountered in trying to achieve their set visions; refer to Table 7 for more details.

Table 7: Interest Groups
Table 9 shows the types of visions that farmers had set. Out of the 26 farmers, 42.3 percent set building an iron-roofed house as their major focus, while 15.4 percent and 11.5 percent set educating children and buying work oxen respectively. As for the rest of the farmers, their visions ranged from outgrowing, buying sprinklers for irrigation to building grocery, shop or increasing food security.

When asked as to whether they had achieved their set visions, 53.8 percent said they had not yet but were working towards achieving them, while 46.2 percent said they had achieved their set visions. The issue of setting visions was one area the programme had created impact as it had changed the perception of farmers as they now took farming as a business and maintained the necessary documentations. Further, with the noted significant rate of achievement of the visions shows the new direction of farming and that there was need for continued facilitation on how to set visions, as those facilitated by the programme were short term and had to be met within the programme’s life span.

In an interview with the District Agricultural Coordinator, he noted that the setting of visions by farmers was the greatest lesson he had learnt as it had changed the focus of farmers in the selection of farming enterprises that could give them more profit based on enterprises gross margin analysis.

When asked about the importance of having a vision, the farmers stated that it was important to have a vision and they provided an array of reasons on the importance of visions. The table below shows a summary of farmers’ responses while table 9 tabulates the vision set by farmers.

<table>
<thead>
<tr>
<th>Table 8: Responses from farmers on importance of having a vision</th>
</tr>
</thead>
<tbody>
<tr>
<td>‘A pillar to tell you what you have achieved’</td>
</tr>
<tr>
<td>‘It drives what you are going to do’</td>
</tr>
<tr>
<td>‘you become focused’</td>
</tr>
<tr>
<td>‘Driving force in development’</td>
</tr>
<tr>
<td>‘it makes me see that i am developing’</td>
</tr>
<tr>
<td>‘it gives direction’</td>
</tr>
<tr>
<td>‘It is a guide, pride and monitoring tool’</td>
</tr>
</tbody>
</table>
Table 9: Types of vision set by farmers

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Valid</td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. outgrowing</td>
<td>1</td>
<td>3.8</td>
<td>3.8</td>
<td>3.8</td>
</tr>
<tr>
<td>2. build a</td>
<td>1</td>
<td>3.8</td>
<td>3.8</td>
<td>7.7</td>
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<tr>
<td>grocery</td>
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<td></td>
</tr>
<tr>
<td>3. digging</td>
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</tr>
<tr>
<td>well</td>
<td></td>
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<td></td>
</tr>
<tr>
<td>4. build a</td>
<td>11</td>
<td>42.3</td>
<td>42.3</td>
<td>53.8</td>
</tr>
<tr>
<td>house</td>
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</tr>
<tr>
<td>5. oxen/solar</td>
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<td>3.8</td>
<td>3.8</td>
<td>57.7</td>
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<tr>
<td>panel</td>
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<td></td>
</tr>
<tr>
<td>6. buy work</td>
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<td>11.5</td>
<td>11.5</td>
<td>69.2</td>
</tr>
<tr>
<td>oxen</td>
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<td>7. increase</td>
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<td>food</td>
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</tr>
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<td>at household</td>
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</tr>
<tr>
<td>level</td>
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</tr>
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<td>76.9</td>
</tr>
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<td>9. build a</td>
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<td>3.8</td>
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<td>butchery</td>
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<tr>
<td>10. educate</td>
<td>4</td>
<td>15.4</td>
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<td>96.2</td>
</tr>
<tr>
<td>children</td>
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<td>11. buy</td>
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<td>sprinklers</td>
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</tbody>
</table>

According to the respondents, family members and extension officers/facilitators were ranked highly (26.9%) on those helping them to achieve their visions. The table below shows that family members on their own had played a key role. While in areas where Community Development workers were present, 23.1 percent of the respondents indicated that the Officers had worked in collaboration with the farmers. This showed
that the household approach that the programme was promoting to ensure sustainability of the activities was bearing fruit.

While there was significant progress on the household approach, the farmers still faced a number of challenges, which made it difficult for them to be food secure and have income in their households.

Table 10: Collaborating partners in realization of visions

<table>
<thead>
<tr>
<th>Valid</th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. other family members</td>
<td>3</td>
<td>11.5</td>
<td>11.5</td>
<td>11.5</td>
</tr>
<tr>
<td>2. extension/ facilitators</td>
<td>2</td>
<td>7.7</td>
<td>7.7</td>
<td>19.2</td>
</tr>
<tr>
<td>3. family members and Extension/ Facilitators</td>
<td>7</td>
<td>26.9</td>
<td>26.9</td>
<td>46.2</td>
</tr>
<tr>
<td>4. community development workers and Extension/ Facilitators</td>
<td>1</td>
<td>3.8</td>
<td>3.8</td>
<td>50.0</td>
</tr>
<tr>
<td>5. family members, community development workers and Extension/</td>
<td>6</td>
<td>23.1</td>
<td>23.1</td>
<td>73.1</td>
</tr>
<tr>
<td>6. family, farmers, community development workers and Extension/</td>
<td>1</td>
<td>3.8</td>
<td>3.8</td>
<td>76.9</td>
</tr>
<tr>
<td>7. family, farmers, and Extension/ Facilitators</td>
<td>6</td>
<td>23.1</td>
<td>23.1</td>
<td>100.0</td>
</tr>
<tr>
<td>Total</td>
<td>26</td>
<td>100.0</td>
<td>100.0</td>
<td></td>
</tr>
</tbody>
</table>
5.5.6 Perception of respondents on ASP approaches

There was consensus among the respondents on the importance of participatory communication that ASP was using. Without exception, all the respondents viewed the Programme as aiming to equip farmers with skills that would enable them to sustain themselves in their farming enterprises but observed that with too many activities that the CEO/Facilitator was expected to do, contact between farmers was reduced. The Zambia National Farmers Union (ZNFU) also stated that the activities done by farmers were not linked to their immediate objectives and therefore proposed streamlining and reduction on programme components.

The ZNFU Business Manager further observed that attitudinal change among farmers, staff and stakeholders takes a longer period and that 2 years was a short period to expect farmers to be self-sufficient in food and income. He further observed that while the programme was good, the programme was too expectant to make significant impact over a shorter period.

He proposed a relationship between what farmers were already doing and programme activities in order to enhance adoption and as such, he proposed for a KAP survey before the programme finally phased out.

The programme had however varied effects on the staff. Among 69.2 percent of the respondents, the induction-training workshops conducted by ASP on the use of participatory approaches in facilitating rural development had helped them become better facilitators. While 23.1 percent of the respondents felt that, the trainings had not affected their performance in the field. However, the staff stated that because of these trainings, they were able to facilitate farming as a business and were helping farmers to plan activities, which would help them address their own problems. The table below helps to see and understand the impact of the approaches on the staff.
Table 11: Whether training affected performance in the field

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Valid</td>
<td>Yes</td>
<td>18</td>
<td>69.2</td>
<td>69.2</td>
</tr>
<tr>
<td>No</td>
<td></td>
<td>6</td>
<td>23.1</td>
<td>92.3</td>
</tr>
<tr>
<td>No response</td>
<td>2</td>
<td>7.7</td>
<td>7.7</td>
<td>100.0</td>
</tr>
<tr>
<td>Total</td>
<td></td>
<td>26</td>
<td>100.0</td>
<td></td>
</tr>
</tbody>
</table>

The results of the study showed that ASP had made significant benefits to individual men and women who were participating in the Programme.

However, the District Coordinators (DC’s) noted that there were still gaps among the Subject-Matter Specialists on the use and understanding of the approaches. They noted that the quality of work by SMS was still questionable and that even the attitudinal change was still a problem.

5.6 CURRICULUM

Out of the 26 respondents (Staff) in the study, they stated that the curriculum could easily accommodate teaching of participatory communication. In view of this, views on sufficiency of the curriculum at ZCA and other training institutions the staff had done their studies from were sought.

The majority of the respondents indicated that the trainings in extension methodology or sociology were sufficient while others indicated that there were still some gaps. Therefore, the respondents when requested to make suggestions on how to improve the curriculum on communication skills in the advent of the change of the paradigm, proposed among others things the inclusion of practicals in extension training. Others proposed conducting refresher courses for the staff while at the same time providing reference materials to learning institutions to improve on the aspect of extension/sociology.
In respect to the trainers/instructors, the general feeling among the respondents was the need for feedback from the field on the challenges that the graduates were facing if training was to be responsive to the demands of the industry. According to the lecturer in communication skills at ZCA, he indicated that there had not been much influence from ASP on teaching of communication skills apart from the students getting industrial attachment to the organisation.

5.7 COMMUNICATION STRATEGIES

5.7.1 Channel mix used by staff in the field

Regarding the channel mix used by extension staff, the commonest ones were interpersonal and focused group discussions representing about 61.5 percent while print materials amounted to about 38.5 percent. These channels were more effective in ensuring change of attitude and adoption of any innovation. With the use of these approaches, the figures in Table 12 attest to their usage.

<table>
<thead>
<tr>
<th>Table 12: Channel mix used in the field</th>
</tr>
</thead>
<tbody>
<tr>
<td>Frequency</td>
</tr>
<tr>
<td>Valid Print material</td>
</tr>
<tr>
<td>Interpersonal &amp; group communication</td>
</tr>
<tr>
<td>Total</td>
</tr>
</tbody>
</table>

5.7.2 Sources of agriculture information

Table 13 below shows the various sources of information that the farmers were using in agriculture. From the 26 respondents, the chief sources were through radios (15.4%), agriculture shows and magazines (7.7 %). A combination of Television, newspapers and books contributed about 3.8 percent. In contrast, 11.5 percent were not sure of the sources of information used. These sources were besides the interaction with the field staff. Table 13 below shows all the tabulations.
As evidenced from Table 14 below, about 19.23 percent of the farmers faced problems of finances, market, poor road network and late delivery of inputs. These findings could be attributed to the assumption that farmers depended on Fertilizer Support Programme for the supply of inputs and Food Reserve Agency for the purchase of their produce that at times were late in delivering inputs and times not efficient in paying farmers for the produce as was the case in the 2005/2006 agricultural season.

### Table 14: Major problems faced by farmers

<table>
<thead>
<tr>
<th>Problem Description</th>
<th>Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td>Finances to by agriculture inputs</td>
<td>3.85%</td>
</tr>
<tr>
<td>Market for agriculture produce</td>
<td>3.85%</td>
</tr>
<tr>
<td>Late delivery of inputs</td>
<td>7.69%</td>
</tr>
<tr>
<td>Finances, poor road network, late delivery of inputs</td>
<td>19.23%</td>
</tr>
<tr>
<td>Market and poor road network</td>
<td>11.54%</td>
</tr>
<tr>
<td>Market and late delivery of inputs</td>
<td>11.54%</td>
</tr>
</tbody>
</table>

#### 5.9 COLLABORATION AMONG STAKEHOLDERS

When asked whether the respondents were collaborating with organisations dealing in community development, all the respondents stated that they were collaborating. The organisations mentioned were Agriculture Support Programme (ASP), Ministry of Agriculture and Cooperatives (MACO), Ministry of Community Development (MCD), North Luangwa Community Conservation Development Project (NLCCDP), Micro-Bankers Trust (MBT), Ministry of Health (MoH) and Development Aid from People to
People (DAPP). The study also learnt that while collaboration was there, it was however not strong and there was also duplication of efforts. The weak linkages made the collaboration of extension activities almost impossible.

The Credit Promoter from Micro-Bankers Trust stated that the NGO’s Forum only met twice the whole of last year. This he attributed to lack of proper district policy on coordination among stakeholders. He proposed strengthened linkages if there was to be continuity of activities undertaken by various organisations.

NLCCDP, World Vision and ASP also echoed the sentiments raised by MBT about poor collaboration. They felt that while the presence of a number of NGO’s was a good thing for the farmers, the fact that these stakeholders were not collaborating, was creating a threat to the development of the households. They felt that the poor coordination among NGOs was going to lead to ‘dependency syndrome’ among farmers and thereby killing their visions. The table below shows organisations working with farmers in Mpika District.

**Table 15: Organisations working with the farmers in agriculture development**

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Valid</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. MACO, MCD, ASP, NLC CDP, MBT</td>
<td>3</td>
<td>11.5</td>
<td>11.5</td>
<td>11.5</td>
</tr>
<tr>
<td>2. MACO, MCD, ASP</td>
<td>6</td>
<td>23.1</td>
<td>23.1</td>
<td>34.6</td>
</tr>
<tr>
<td>3. MACO, MCD, MoH, ASP</td>
<td>4</td>
<td>15.4</td>
<td>15.4</td>
<td>50.0</td>
</tr>
<tr>
<td>4. MACO, MCD, ASP, MBT</td>
<td>3</td>
<td>11.5</td>
<td>11.5</td>
<td>61.5</td>
</tr>
<tr>
<td>5. MACO, ASP</td>
<td>8</td>
<td>30.8</td>
<td>30.8</td>
<td>92.3</td>
</tr>
<tr>
<td>6. MACO, ASP, WV, DAPP</td>
<td>1</td>
<td>3.8</td>
<td>3.8</td>
<td>96.2</td>
</tr>
<tr>
<td>7. MACO, WV, ASP, DAPP, ADC</td>
<td>1</td>
<td>3.8</td>
<td>3.8</td>
<td>100.0</td>
</tr>
<tr>
<td>Total</td>
<td>26</td>
<td>100.0</td>
<td>100.0</td>
<td></td>
</tr>
</tbody>
</table>

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6.0 ASP STRUCTURE AND REPORTING FORMAT

A Team Leader supported by a Deputy Team Leader (DTL) heads ASP. Under the DTL are eight Subject-Matter Specialists (SMS). At field level, eight Facilitation Team Leaders support the Team Leader. The FTL’s based in four ASP provinces are managing between two to three districts.

Two or three ASP District Coordinators who are in charge of five camps each manage each district. The DC’s work either through the MACO camp extension officers or own facilitators. A team of SMS’s from MACO support the DC’s in backstopping and supervision.

Reports and plans are originated by frontline staff (CEO, own facilitators) monthly to input into the quarterly and annual reports or plans. These plans/activities should be in line with the ASP log frame.

In order to ensure effective performance, the programme emphasises good communication skills among the reporting officers. Thus, effective communication was sinequanon to any good Monitoring and Evaluation system.

6.1 Importance of communication in ASP

The programme defines communication as a process of transferring information between two or more persons and hence appropriate communication was vital in ensuring that information was transmitted between sender and receiver.

Types of communication

Oral communication: This is a means of transferring messages through the spoken word. It may be face-to-face or uses of device like a phone.

Written communication: This is the process of transmitting information through a written word such as a report, letter, circular etc.
This form of communication facilitated effective transfer of information from the sender to the receiver. Written communication had several advantages such as:

- The receiver could read the message several times to understand it.
- The writer had time to think before initiating communication process.

6.2 The role of communication in ASP

The communication that takes place in the ASP was important as it enabled the organisation carry out the following tasks:

- **Planning Programme Activities**
  Planning involves layout in a logical manner a schedule matching available resources with activities carried out in a given period,

- **Monitoring Programme Activities**
  Monitoring is the regular collection and management of data that relate to the predefined target values for the indicators in the log frame. Monitoring is a continuous management process and is done throughout the implementation phase of the programme,

- **Evaluating the Programme**
  Evaluation is a periodic process of assessing the monitoring data and information within the project to check whether the programme was performing according to the set standards and objectives.
  The data collected was used to evaluate the performance of the programme at all stages.

6.3 Reporting Progress on Programme Activities and Performance

The District Coordinators and FTL were responsible for reporting the progress of the programme on a quarterly basis to ASP Management Unit (MU). The reports contained information outlining the impacts, processes, effects, and impact of the programme. Specifically, Monitoring and Evaluation (M&E) was used to ascertain the performance, efficiency and impact of the programme.
As already alluded to on the tasks performed by the programme, the issue of monitoring and evaluation was very important. When asked about the measures put in place to monitor the activities and quality of work provided by each category, both farmers and staff mentioned backstopping of field activities. ASP defines backstopping as a process of mutual support between superior and subordinate levels in an organisation in order to uphold, sustain and champion the objectives of the organization. While the measures might defer between ASP and MACO, but what did come out clearly was that the farmers and staff were backstoped on a monthly basis to get the level of understanding and interpretation of ASP key themes.

6.4 Monthly Review and Quarterly Meetings
These meetings were held every month and quarter for two days to review activities carried out in the month or quarter and taking note of the challenges encountered and lessons learnt and later plan a way forward.

These meetings were also a forum to conduct microtrainings to staff in order to improve their efficiency in the field. Reports presented during these meetings were from the camps Extension Officers/Facilitators, the backstopping reports by SMS and others who included the Facilitation Team Leader, Field Business Coordinator and even District Coordinators. During these meetings, the levels of understanding of the programme by the staff were assessed in order to know the areas of focus during backstopping.
CHAPTER 6

6.0 DISCUSSION

6.1 OVERVIEW

The major findings of the study were presented in chapter five. In this chapter the findings are discussed with reference to other research findings with a view to compare results and be able, to make conclusions that support the objectives set. The discussion however will not cover all aspects of the findings but rather focus on some issues considered very important on the role of participatory communication in agriculture.

6.2 Knowledge on participatory communication

Knowledge, Attitude and Practices (KAP) studies done in different parts of the world, revealed quite significant evidence on the importance of participatory communication. Studies done in Malawi among district-level workers and the community on malaria control recorded significant impact with the use of participatory approaches (www.liv.ac.uk/lstm/majorprogs/malaria/output).

Through the participatory processes, district-level workers became more open to listening to community members. There was more respect shown for the knowledge and perceptions of community members rather than assumptions made that these people had little knowledge. District-level workers improved their communication skills, which included having a non-judgmental attitude, showing patience, establishing rapport, demonstrating equality and respect, actively listening and probing to ensure a deep understanding. District-level workers had improved skills including team working, participatory decision-making and understanding local ideas for solving health problems. They found these useful in their everyday work such as case-finding activities, and counseling clients.

The results of the study carried out at the Agriculture Support Programme, Mpika, also revealed adequate knowledge and appreciation on the use of participatory approaches by the farmers and staff. According to the findings of the study, the approach promoted
togetherness among community members and enhanced ownership of the activities in the communities.

6.2.1 Constraints faced by staff in the use of participatory approach

The greatest challenge in malaria control programme in Malawi was the slow attitudinal change among district-level workers. Some found it hard to relinquish the power that comes from the status and respect accorded to health workers and other government workers. While the study in Mpika found that, the attitudinal challenge was on both the farmers and staff. The existing perceptions of the community as passive recipients of government services still existed. The community members often perceived district-level workers, Camp extension officers and Facilitators as educators.

6.3 Communication Strategies used by ASP

Nowadays in rural development, it is common to talk about media categories which are taken to include broadcast (television and especially radio), group (video, tape-slides, sound film-strips, audio-cassettes, overhead projections, flip-charts, posters, pamphlets, and leaflets; as well as traditional folk media such as puppets and live-theatre may be included), and Interpersonal channels (community leaders, contact farmers, extension workers). Delivery strategies are ranked in terms of complexity, from interpersonal communication through radio and television broadcasting, and group media, to multi-channel campaigns. This ranking also subsumes the notion that each strategy is made more effective by incorporating, that which precedes it. Radio broadcasts, for example, have much more impact if backstopped with authoritative, village based interpersonal sources, and group media can benefit from both radio and interpersonal communication support.

These variations in media categories are true of the results obtained in Mpika district in which both farmers and staff showed variations in sources of information on agriculture or communication channel used by the staff. The study revealed that farmers got information about agriculture through interpersonal communication, radios (15.4%), agriculture shows (7.7%), pamphlets, magazines, newspapers, books and posters, while
some respondents got information through television. However, 84.6 percent of the farmers indicated that they did not have radio listening groups to share information, which they got from the radios. At the same time, a significant number indicated that they did not have radios.

According to UNICEF (1993), the potential for use of mass media to reach the people in the rural areas was limited by the fact that less than a third of households in rural areas possess a radio and newspapers do not reach most of them. This could be the reason for the low responses on the use of newspapers, television and magazines as sources of information among the respondents in Mpika.

However, the channel mix used by the staff included mainly print materials, interpersonal and group communication. Posters and flip charts were used especially during trainings. While there was no response on use of radio in communication of messages, it remained as one of the most powerful tools that covers larger areas at the same time and could supplement interpersonal messages.

A study done by Adhikarya and Posamentier (1987) for example, indicated the impact of campaign using radio. They documented the results of a rat control campaign in Bangladesh during 1983 that raised the adoption of rat control practices among targeted wheat farmers from 10 to 32%, resulting in an average harvest gain of 54 kg/hectare in treated fields. Perhaps the best-known campaign, however, was that associated with the "Masagana 99" project in the Philippines during 1973 that catapulted the country toward adopting high yielding rice cultivation. "Masagana" translates as bountiful harvest with "99" referring to the project objective of achieving 99 sacks (50 kilos per sack) of unmilled rice per hectare.

The project was built around three main elements: 1) availability of high yielding seeds, fertilisers, and a simplified 16-step cultivation process; 2) credit assistance; and 3) a multi-channel mass information campaign extending over three months. The channel mix
included radio broadcasting, a variety of print (bulletins, newspaper stories and posters), and intensively trained farm technologists in the 16 step methodology of rice production.

During the media intensive portion of the campaign, radio was used to provide: a) motivation (jingles and spot messages were broadcast up to 20 times per day); b) information (daily 30 minute farm programme); and c) instruction (short courses were offered through the existing Farmers' University of the Air; registrants received printed materials to use with the broadcasts). In addition, television was used to kick off the campaign and to report on its progress. After completion of the campaign, the daily farm programmes provided follow-up reinforcement.

A final example was a FAO supported campaign carried out in Sierra Leone during 1984 (Coldevin, 1986). Following a baseline survey which assessed information levels, perceived information needs, and media access among a sampling of the intended farmer target audience, an information campaign was built around the urgent priority to expand rice production through increased cultivation of swamp farms. The two-month campaign, which was carried out by the Agricultural Communication Unit, involved a mix of dedicated radio broadcasts and village based slide-tape presentations, supplemented by posters and pamphlets. Extension workers fielded questions during the group media presentations.

Post-campaign results showed that, on average, farmers involved in the exercise had increased their knowledge levels by almost 60% over baseline scores. The highest gains were noted among solely dry land, or non-rice farmers whose after-campaign scores were three times higher (307%) than baseline levels. There was also a significant, positive shift in their declared intention to develop a swamp rice operation.

An additional interesting finding was that, overall, farmers who tuned in regularly to the campaign radio broadcasts exhibited almost twice the amount of information gained when compared with sporadic listeners. Perhaps most important, the project aptly demonstrated the ability of a regularly functioning, agricultural media unit to carry out an
effective multi-channel communication campaign based upon expressed information needs of the target audience.

The Agriculture Support Programme at the start conducted a baseline survey in which at the end they wanted to ensure that about 80 percent of the farmers were food secure. This appears a daunting task considering the levels of farmers in the area. If the programme had not focused on all programme components, significant impact would have been recorded (chapter 5 p 57 & 58).

The most difficult, and at the same time one of the most important of all activities in the communication support process, was the target audience analysis (KAP or knowledge-attitudes practices indices; literacy levels; access to, use of, and preferred communication channels) since this served both production and training objectives. At the outset, it set the baseline for establishing "success indicators" and later validation of the project's achievements. It also provides valuable guidelines for initial production and pre-testing of materials in terms of print and visual literacy levels; the choice of medium or media combination that was likely to produce the best results; and the identification of weak levels of knowledge, negative attitudes, and inappropriate practices.

6.4 Positioning of Social Product

Kotler and Roberto (1989) define social marketing as a strategy for changing behaviour. Social marketing encompasses the best elements of the traditional approaches to social change in an integrated planning and action framework and utilizes advances in communication technology and marketing skills. It seeks to influence social behaviours not to benefit the marketer, but to benefit the target audience and the general society."

This technique has been used extensively in international health programs, especially for contraceptives and oral rehydration therapy (ORT), and was being used with more frequency in the United States for such diverse topics such as drug abuse, heart disease and organ donation.
Kotler and Roberto (ibid) stated that the change from an adverse idea or behaviour or adoption of new ideas was the goal of social marketing. The ideas and behaviours were the products to be marketed. Social marketing utilizes concepts of market segmentation, consumer research, product concept development and testing, directed communication, facilitation, incentives and change theory to maximize the target adopters' response. The sponsoring agency pursues the change goals in the belief that they would contribute to the individual's or societies best interests.

ASP used the social marketing approach in facilitating “Farming as a Business” in which farmers were encouraged to set objectives for their enterprises that could assist them achieve their set vision. The ASP facilitation cycle aims at ensuring that farmers changed their traditional way of conducting farming and view it as a business that required setting objectives, drawing action plans, resources mobilization and conducting market research before venturing into any enterprise. The focus was to ensure that farmers were food secure and had income. The programme focused on interpreting and incorporating the six key themes as the field officers facilitated the farming as a business concept. The six key themes are participatory approaches, commercial perspective, good governance, transparence, environment, gender perspective and HIV/AIDS awareness.

The planning process, setting of visions took into account the market mix. The facilitation cycle was an important tool of ensuring that farmers participated in diagnosing the farming systems in their areas and helped in identifying opportunities present in their areas, which could be exploited by the farmers. The assumption was that once farmers went through the eight steps of the cycle expected to take about two seasons or so, then they would have been able to stand on their own.

Similar models though more elaborate and targeted at addressing specific problems than the ASP participatory approach were used by FAO (see Adhikarya, 1994). The "Strategic Extension Campaign" (SEC) was a methodology that emphasized the importance of people's participation (i.e., intended beneficiaries such as field extension workers and small farmers) in strategic planning, systematic management, and field implementation of
agricultural extension and training programmes. Its extension strategies and messages were specifically developed and tailored based on the results of a participatory problem identification process on the causes or reasons of farmers' non-adoption, or inappropriate practices, of a given recommended agricultural technology or innovation. The SEC technology transfer and application approach was needs based, demand-driven, and had a problem-solving orientation.

The SEC programme followed a systems-approach which starts with farmers' Knowledge, Attitude and Practice (KAP) survey whose results were used as planning inputs and benchmark/baseline for summative evaluation purposes. In addition, a series of practical and participatory approach workshops were conducted to train extension personnel, subject-matter specialists, trainers and farmer leaders together on the skills of extension programme planning, strategy development, message design & positioning, multi-media materials development, pre-testing and production, as well as management planning, implementation, monitoring, and evaluation.

ASP also conducted a week or two weeks induction workshops to orient/train extension/facilitators, subject-matter specialists on the use of the participatory tools. The Programme staff viewed the ASP approach as alternatives to the conventional extension system and that the backstoppers were expected to change their approaches. While there could be similarities as shown in the strategies used by ASP and FAO, unlike ASP, FAO Strategic Extension Campaign was not an alternative to the conventional extension programmes or activity. SEC was and is, and should be, an integral part of the programme of an agriculture extension system.

It is this understanding, which is missing from the ASP approach. The effectiveness and efficiency of such a service could be increased due to ASP's emphasis on its problem solving orientation, participatory planning approach; extension personnel training, extension management meetings, monitoring and evaluation procedures done during monthly reviews meeting. The extension personnel should support Ministry of
Agriculture policies, strategies and priority programme since it operates in the auspices of the Ministry of Agriculture and Cooperatives.

Empirical evaluation studies (using information recall and impact surveys, focus group interviews and management monitoring surveys) of strategic extension campaign methods was applied to specific FAO-supported extension activities. The studies conducted in Bangladesh and Malaysia (on rat control), Thailand (on pest surveillance system), Malaysia (on weed management), Zambia (on maize production), Malawi, Jamaica, and Morocco (on population education), etc. reported positive changes in farmers' knowledge, attitudes and practices vis-à-vis the recommended technologies as well as significant economic benefits.

http://www.fao.org/docrep/u8955e/u8955e02.htm#1.2.5.%20problem%20solving%20orientation

6.5 Challenges faced by farmers
The ASP had positioned the concept of “Farming as a Business” but as found out by the researcher that the target adopters were facing challenges of finances, poor road network, late delivery of inputs and market for their produce possess a danger to behaviour change. As pointed out by Kotler, social change campaigns and social marketing were not simply tools to accomplish social change but present a new ideology, or mindset on the assimilation, which can prepare the ground for widespread and more effective social change. Therefore, it requires the need to address the major problems faced by farmers as these could hinder the change of attitude by target adopters. The four “P’s” in social marketing need addressing in order for a product to be positioned (http://www.social-marketing.com).

6.6 Sustainability of the ASP approaches
In a paper presented at the 10th APEID International Conference in Bangkok, Thailand, Chapman and Austin (2006) noted that one of the most perplexing concerns confronting development specialists working in the “education” sector was the sustainability of externally sponsored project activities and outcomes, once external funding ended. They noted that too often, when international assistance ends, the activities initiated on the
ground also die with little left to show for the effort. Yet, a key challenge in assessing sustainability is the diversity of views about what should be sustained.

A critical mass of well-educated staff is a prerequisite for effective development of innovation and their dissemination to farmers. While the findings indicated that 73.1 percent of the respondents were certificate holders, these frontline staffs lived with the farmers and were in contact with them and this made the farmer's participation easy. However, an analysis of the staffing positions in the Programme showed that out of the 15 camps the Programme was operating in, eight camps were under ASP facilitators while the remainder seven camps were under the Ministry of Agriculture and Cooperatives. Therefore, the issue at hand was how they would ensure that the good lessons developed in these eight camps would be followed as the programme ended, as there would be no staff in these areas.

In addition, ASP adopted a structure that placed emphasis on community participation in the activities done at camp level by having a camp committee in each camp as the overall organ. The role of the Camp Committee (CC) was to act as the overall body responsible for all agricultural activities in the camp. They were also to be responsible for approving action plans for the camp presented to them by the Extension Officer or facilitator. This approach is an ideal one as it made the Camp Officers maintains close contact with the farmers and the farmers participating in activities done in their areas. The structure of Interest Group, Farmer Group and Camp Committee appeared to be very good; however, it placed little emphasis on follow-up to the individual household, which was the center of production.

As observed from the target groups and Programme components, the programme became too big to manage within the five years life span of the project. It had too many components, which made it difficult to develop and strengthen the secondary target group. The Agriculture Support Programme when evaluated from the basis of its size could be said to be a parallel programme to that of the Ministry of Agriculture and thereby expecting impact within a short time span was difficult to realise.
The greatest challenge for the programme was how to ensure sustainability of the approaches that it started as ASP phases out by the end of the year. As earlier alluded to, MACO staff indicated that the district had both periods with an abundance of funds and periods with shortage of funds. The output of innovations did not seem to depend on the amount of funds available. Considering these comments, since the use of participatory communication required continuous follow-ups and interaction, then there was need to ensure that as the Programme phases out, mechanisms of ensuring continuity of activities for a longer period were developed.

Dempster (1998) define sustainability as the ability of an activity or system to persist. The heightened attention of international development assistance organisations to sustainability was, in part, an offshoot of the increased focus on outcome-based funding in development assistance work. Outcomes must be evident and they must remain long enough to have an impact. The lack of sustainable impact was widely seen as a key threat to continued flow of international development assistance (Picard and Garrity 1997).

However, one of the challenges in assessing sustainability was the diversity of views about what should be sustained. Research on sustainability tended to cluster on four general frameworks (described by Nkansa and Chapman 2006):

**Economic models of sustainability:** From the economic perspective, a project was sustainable if recipients continued to experience the intended economic benefits even after economic inputs had ceased. In the economic model, sustainability was understood as the ability of a programme to be financially self-sufficient and maintained its service levels after external funding ended (Center of Excellence for Sustainability 2001; Harris 2000; International Planned Parenthood Federation 1996: 1). To the extent that the continuous flow of benefits was inhibited, the project was considered unsustainable (Dahl 1995; Daniels 2000; Jimenez & Sawada 1998).

**Socio-political models:** The socio-political model, then, was essentially about knowledge, power and the transfer of skills (Bhat, Cheria and Edwin 1999; Harris 2000; Picard and Garrity 1997). From a socio-political perspective, sustainability involved the
transfer of guiding interpretations, structures, and capacities from initial project implementers to subsequent generations of activity managers (see Dahl, 1995).

**Ecological models:** From the ecological perspective, sustainability was concerned with the survival of individuals and cultures (Harris 2000). While the economic model emphasised the use of resources in efficient and productive ways, the ecological model focused on preserving resources for future generations (Harris 2000). Within the ecological perspective, sustainability required that people understood the dynamics of natural systems and how their current decisions and behaviour influence the productivity of future societies.

**Innovation-diffusion models:** The innovation-diffusion models developed by Rogers (1995) and Fullan (2001) posit that sustainability depended on community acceptance of the values and mechanisms associated with the innovation. A project was sustained when those involved in it came to feel ownership of it and keep it operating. Hence, sustainability depended on the participation and ownership of key constituents in the programmes that planners wanted to have sustained (Rogers 1995). Rogers suggested that sustainability was most likely to occur when an innovation was consistent with the community’s values, when it was a collective-participatory effort, when dissemination was through social processes, when norms, beliefs, values were compatible, and when there was effective leadership.

Chapman and Quijada (2006) observed that sustainability within USAID projects was seldom if ever defined. Hence, it was not clear whether the goal was that (a) specific organisational structures (Farmer Groups, Interest Groups and Camp Committees) established by a project remained after the funding ended, (b) capacity of participants increased, regardless of the fate of particular structures, or (c) the overall economic health of a country improved due to the aggregate impact of donor assistance. These are also the big questions about the sustainability of ASP structures.

A review of project documentation indicated that, typically, most USAID projects assessed sustainability in terms of the extent that specific activities and structures created during the project were likely to persist beyond the life of the funding. The main constraints
were the availability of local funding to pick up costs, but weak management capacity of
government and lack of clear ownership of project activities were also cited. The ASP
staff on the capacity of MACO also pointed out these constraints. While, this could be
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human resources according to the role that it plays in agriculture development.

Communication patterns within communities: Nkansa and Chapman’s initial
assumption was that communities could be defined largely by their geographic
boundaries. However, communities do not speak with one voice. The ability of
communities to communicate across these differences was an important factor in the
eventual ability of communities to sustain the structures and benefits provided by
externally funded development activities.

Findings of this study indicated that, while good planning, transparency, resources,
participation, community skills and community valuing of education may all be important
components of effective reform, long term sustainability, at least in this project, was
heavily dependent on effective local leadership and social cohesion (Nkansa and
Chapman 2006). The other factors proposed in the synthesis model of sustainability were
subsumed under leadership. Leadership can be developed and social cohesion can be
fostered. However, both often require a longer-term timeframe and more patience than
donors are sometimes willing (or able) to accommodate. The move of many international
development organisations (including USAID) and other donor-funded programmes like
ASP toward outcomes based planning and evaluation, often within rather strict project
time requirements was often at odds with the need to build local leadership capacity and
cohesion.

Sustainability, from this view, is most appropriately assessed over the long term, and in
terms of the subsequent behaviour of participants rather than in terms of organisational
structures.
6.7 Lessons Learned using Participatory Communication

Firstly, and although not a new theme, building human capacity takes time, usually much more than provided for in a typical five year project. Balit (1988) notes that the most successful of FAO's projects with a communication for development component have had a running time of seven to ten years. Benor and Cleaver (1989) go even further when suggesting that support to extension systems should be designed with a long-term perspective (15 years at least). As they sceptically conclude, "The continent of Africa is littered with five-year projects, abandoned on 'completion' by farmers" (p. 2). This was the area of concern considering that while ASP was for five years, the Programme was undertaken into two phases of three and two agricultural seasons respectively.

While there could be short-term impact created as shown where farmers had been organised in Interest Groups and that the farmers had appreciated the importance of setting visions. These beliefs can also be interpreted as facts but what needs to be noted is that community members do not want to say anything contrary to the programmes as they have many expectations. While the study did not assess the impact of the process on community skills and capacities, this would be useful to understand the benefits of participatory projects in agriculture.

According to Rogers (1983), several factors determined the rate of adoption. The use of participatory tools and the concept of taking “Farming as a Business” was an idea, practice, or object that was perceived as new by an individual or other unit of adoption. Rogers noted that time dimension was involved in diffusion in three ways. First, time was involved in the innovation-decision process. The innovation-decision process was the mental process through which an individual (or other decision-making unit) passed through from first knowledge of an innovation to forming an attitude toward the innovation, to a decision to adopt or reject, to implementation of the new idea, and to confirmation of this decision. Therefore, it is a fallacy to think that within two or three seasons all the households the Programme was working with would have decreased uncertainty about an innovations and expected to become food secure and have generated income to stand on their own.
As Rogers and Shoemaker (1971) pointed out, an innovation may be rejected during any
stage of the adoption process and it is this rejection, which should be considered when
designing messages, and period for the community development programmes which have
a communication for development component.

6.8 Extension Support Materials and Training
According to the findings of the study in Mpika, the curriculum was significant in
according the teaching of participatory communication. The findings by Adhikarya
(1987) on the lack of relevant and practical extension and training materials to support
field activities of their extension workers was also found to be the situation at
ZCA,Mpika. The respondents suggested inclusion of practical skills in extension at
training institutions and having refresher courses for the staff while at the same time
providing reference materials in extension to the training institutions. This was so as the
main channel mix, the extension workers relied on primarily was their inter-personal
communication skills, and thus their time and/or presence during farmers' meeting were
not utilised as effectively and efficiently as it should be.

Providing specifically designed and relevant extension/training support materials to
extension workers would not only facilitate their tasks and reduce their heavy workload,
but could also ensure a certain degree of quality control in the delivery of technical
information or extension message contents. Experience had shown that extension
workers' motivation, enthusiasm, confidence, and credibility would increase if given
relevant and attractive multi-media support materials, which they could use to improve
the effectiveness of their extension and training work.

6.9 Collaboration among stakeholders
The findings of the study in Mpika revealed that while collaboration among stakeholders
was taking place, the linkages between partners in Mpika were weak. As a result, there
was duplication of efforts. The weak linkages made the coordination of extension
activities almost impossible. As Ramirez (2004) postulate, the multi stakeholder analysis
could be used which is a general analytical framework for examining the differences in
interests and power relations among stakeholders, with a view to identifying who was affected and who could influence current patterns of natural resource management.

7.0 The limits to collaboration

Perhaps the most intractable yet critical challenge in the pursuit of collaboration in community development was to engage the most powerful stakeholders in analysis of the causes and alternatives to conflict. Although in many settings, marginalised groups must be empowered to undertake problem analysis and formulate strategies for negotiation, change would only come about if the powerful were moved to act on the causes of marginalisation, inequity, and mismanagement. The conditions, and related pressures, needed to accomplish this movement were not well understood and rarely studied. In short, how do you get the lion to sit at the table with the lamb (Thomas et al. 1996)?

Research by Scott (1987, 1990) suggests that sources of power were nearly always available to marginal stakeholders, if only as an undercurrent or "hidden transcript."

In response to a very articulate proposition, dead silence can at times, make an equally forceful point. The challenge is to enhance the capacity of marginal groups to use their power effectively to engage the overtly powerful in meaningful negotiation. It is this challenge that tests the limits of collaborative approaches to community development and shows why real collaboration is so difficult.
CHAPTER 7

7.0 CONCLUSION AND RECOMMENDATIONS

7.1 OVERVIEW
In line with the objectives of the study and drawing on the results presented in chapter 5, the present chapter presents general results in relation to all the issues discussed in the foregone chapter. The chapter also presents proposals for recommended strategies on areas that need consideration by both the Ministry of Agriculture and Cooperatives (MACO) and the Agriculture Support Programme (ASP) in Mpika.

7.2 CONCLUSION AND LESSONS LEARNT
One of the key challenges faced by rural development programmes is the need to address poverty alleviation and economic growth while maintaining sustainability in an integrated manner. Fighting land degradation and desertification, halting deforestation, promoting proper management of water resources, protecting biodiversity and adoption of recommendations in agriculture require the active participation of rural communities through communication processes. For many years though, the use of participatory communication approaches were mostly pronounced in health were people participated in fighting diseases as a way of behavioural change. Whilst in agriculture, the emphasis had been on adoption of recommendations from research through the extension personnel representing a top down approach.

However, following the failure of the modernisation approach, there was a shift in extension paradigm from the top down approach to participatory nature. This was in the realisation of alternatives that Communication for Development offers. Its participatory approaches facilitate the dialogue and exchange of knowledge and information and increases the community knowledge base (both indigenous and modern), promote agricultural practices that were compatible with the environment, and develop awareness in policy makers, authorities and service providers.
Furthermore, participatory communication approaches can bring together different stakeholders and groups into conversation with each other, and enable the poorest and most marginalised have a powerful/influential voice in the decision and activities concerning access and sustainable use of natural resources. The results of the study revealed that the communities were involved in diagnosing their farming systems and based on action reflection action (ARA), they were able to choose the enterprises that they were involved. As a result, trainings were demand driven and based on the felt needs of the community and arrived at through needs assessments.

People’s participation in directing the course of their own development are central tenets in both the United Nations Millennium Development Goals (MDGs) and National Poverty Reductions Strategy Plans (PRSPs). The issue of equal access to knowledge and information is becoming one of the key aspects of sustainable development. Several development agencies seek to narrow the gap between the information rich and information poor, and to provide a framework of co-operation in developing common strategies, methods and tools for building a just and free information environment and to broaden the access to information and to communication technologies at the community level.

One such organisation incorporating participatory perspective in its approaches with the target groups is the Agriculture Support Programme (ASP). The study on the role of participatory communication in agriculture indicated that ASP had contributed to the knowledge and ability of many farmers and staff to plan, monitor and evaluate agriculture activities in their respective areas. With the facilitation of farming as a business, farmers were able to make action plans for each enterprise. This helped farmers become focused in trying to achieve their set visions. The follow-ups to the farmers alluded to earlier were based on these plans, as it was the basis of assessing farmers progress in achieving the planned activities. The importance of planning was also central to the staff as they followed up field activities. The study revealed that field staff submitted monthly workplans to the district office in line with their annual workplans and based on the needs identified in the field.
Therefore backstopping from the district to the camps aimed at providing support to the field was based on these workplans. Hence, as the staff backstoped field activities, farmers had to sign in their diaries as proof that they were visited and this was the basis for payment of claims.

The facilitation manual also provided useful information on the use of participatory tools. While the monthly review and planning meetings provided opportunities to exchange information, share experiences, and experiment and refine new management approaches and techniques.

The programmes most significant effects at the individual level were in the realm of motivation to improve planning and accountability through the setting of visions and short-term enterprise objectives to their enterprises. For example, the farmers set among other visions out-growing, buying of sprinklers and building iron roofed houses. This emphasis has continued helping farmers in mobilising resources. These goals’ setting has helped farmers in mapping out a series of steps to get there. By setting and achieving goals, one will use the time more productively, perform better and more efficiently than ever before and with every goal he achieves, his self-confidence will increase, motivating him to aim even higher.

As earlier alluded to, ASP consistently used highly participatory approaches in planning, implementing, reviewing and evaluating its activities. There were also lessons learnt for designing and management of capacity development programmes. While both phases of the programme had a logical framework to guide actions towards short-term and long-term goals, the underlying assumption linking the programme activities to a chain of expected outcomes remained vague.

In the present era of declining aid budgets, development programmes were under pressure to demonstrate their impacts. One problem was that impact meant quite different things to different people. This was the greatest challenge facing development organisations in ensuring sustainability of activities. While the ASP was using MACO
staff in backstopping its activities, the fact that MACO had not agreed on which of the approaches it would continue using means that sustainability of structures set up by the programme were not guaranteed. In addition, apart from financial sustainability, transport situation posed a challenge to follow-ups of field activities.

The study also found that the major constraints to the use of participatory methods and tools were the domineering attitudes and behaviour of many development workers, as at times they tended to impose their thoughts on the farmers against the principles of participation. Planning, Monitoring & Evaluation (PM&E) tools are not magic bullets, and their effectiveness depended largely on the attitudes and skills of those who used them. The researcher also learnt that there was lack of comprehensive training materials at training institution level that were aimed at strengthening the attitudes and behaviours of development workers, which were required for the effective use of participatory tools and methods. As pointed out by other researchers in development communication, change of attitude takes a lot time as opposed to five years targeted by the ASP in both phases.

Therefore, pulling from the reviewed literature, the researcher has presented a trend towards incorporating both the “vertical” (diffusion) approach to development communications and the more participatory perspective into a syncretic solution that involves information transfer, empowerment, and participatory communication. However, as exemplified in the survey, this trend is not yet complete and the pendulum is still heavily on the side of participatory development communication.

### 7.3 RECOMMENDATIONS

Based on the analysis of the findings and discussions as presented in chapters five and six, the researcher makes the following recommendations:

- Curriculum reforms in agriculture training institutions can make much difference in the lives of farmers. Similarly, good instructional materials can significantly improve the delivery of good recommendations to farmers. For that matter, the researcher recommends the establishment of a Curriculum Policy Committee at
ZCA to be responsible for curriculum reforms in line with the changes in extension approaches which focuses on development communication with an emphasis on participatory communication.

- Training initiatives should focus on collaborative learning in Communication Development, encouraging experiential, value-based, culturally sensitive training in Participatory Communication Development and fostering a community of practice across the regions.

- In order for participatory communication to be effective, it needs budgetary and political support from decision-makers in development organizations. In order to secure this support, those advocating for participatory communication need to be both effective in executing their programmes, and effective in communicating results that can be understood by those in charge – most of whom demand quantifiable evidence of impact.

- As stated earlier, an efficient supervisory and management system is a prerequisite for quality assurance in agriculture. The study therefore emphasized the need to review the organizational structure at camp level to ensure greater efficiency. The roles of key actors in the various divisions of MACO and ASP need to be clarified and their accountability emphasised. To ensure the availability of information and its accessibility, a Management Information System should be set up in the District Agricultural Coordinators Office and ASP. As stated by the DACO, the use of MACO staff for backstopping, training, and even having camps under the Ministry was a safeguard to ensure sustainability. This relationship should be enhanced by having a common trust and understanding the roles each partner was to play.

- Information and consultation mechanisms should be set up to ensure coordinated action among NGOs and other stakeholders at district level in community development. This forum will also help in exchanging experiences in the field.
• Development Communication can achieve relevant impacts and sustainability if adequately incorporated in national development policies and building on already existing experiences and capacities. Therefore, there is need to ensure that communication development and participatory approaches are mainstreamed into national policies, district and field level for sustainable development.

• Over the years, several communication centers and systems have been established to deliver services and provide technical assistance both at national as well as regional level. However, the economic sustainability has often been the weak point of their activities. Therefore the researcher recommends that ASP puts up sustainability means especially in terms of finances and transport so that there will be continued follow-ups to the farmers to assess the impact even when the programme will have ended. In this case, ASP should consider having PM&E desk in each district to ensure that the learning process continued. However, there would be need to agree on the organisational structure, its objectives and the role it will be playing.

• Based on the findings on the ASP components and the logical framework, the researcher recommends streamlining of activities as opposed to running or undertaking almost all activities done by the Ministry. Impact can be created by selecting on a few activities and then designing messages/training materials that would be used to address the shortfalls identified. What needs to be noted is the importance of indigenous knowledge and the need to harness that if there will be sustainability with the use of participatory communication. However, the experience as at now in the field was that there was no clear understanding of participatory approaches such that field officers had tended to spend too much time on issues which could be addressed if farmers were provided with technical knowledge. Participatory approaches should not stand on there own but should be backed with other forms of media such as printed materials.
• The capacity for participatory development among district-level workers should be developed through long-term processes. This requires attitudinal change and skills development through trainings and practical applications. Therefore, the study recommends that subsequent programmes be run with one group for a longer period as opposed to two or three agricultural seasons because the adoption levels among farmers differed due to several factors.

• As observed from the study, no documentation had been done at MACO district level on the lessons that they had learnt with the use of the participatory approaches in agriculture. Therefore, the researcher recommends that MACO institute a steering committee that should put the experiences together and be able to make recommendations to the Ministry and even training institutions on the experiences in the field. Many good lessons had been experienced in the district, but as long as they were not documented at district level, it would be like a waste of resources and time.

The study also proposes a need to revise the focus of facilitation if the vision of taking farming as a business is to be realised. At the heart of the Programme was the farming a business concept and hence trainings and facilitations should be focused at ensuring that this was realised and hence there was need for the District Coordinators and Field Business Coordinator to take a lead. There is also need to enhance linkages of the farmers to service providers if the problems that the farmers’ were faced with could be addressed.
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