Hindrances to the Growth of Youth Led Micro and Small Agri-Businesses in Kenya

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Abstract

Micro and Small Enterprises have been identified as the engine for economic growth and technological innovations in developing countries. Consequently, the Kenyan government has put in place interventions geared towards improving the business environment through appropriate policy frameworks. However, the MSE sector continues to be dodged with myriad of constraints which include; lack of appropriate technology, access to market information, credit, business management skills, rigid legal and regulatory framework, among others.

The study focused on Determining forms of investment in technology prevalent amongst youth led micro and small agri-businesses, Investigating effect of investment in technology to youth led micro and small agri-businesses’ performance and Discovering challenges faced by micro and small agri-businesses in applying emerging technologies to get competitive advantage and sustained productivity. A descriptive research design was used to carry out the study. Stratified random sampling technique was employed to select the sample. An interview guide was the main instrument for collecting data. Data was analyzed using the SPSS software.

From the study, three main discoveries came to the limelight. First, our youths have no problem working in agri-businesses if that’s where they see their future prospects contrary to our common belief that youths are lazy and would only opt for white collar jobs. Secondly, people including our educated youths fear technology. Finally, adults do not take youth requests seriously even when youths are paying for land and premises rent; a situation which leaves our youths frustrated and therefore not knowing whom to turn to for the services. Among key recommendations from the study are that youth led micro and small agri-businesses need to be
provided with adequate finances, relevant tools and equipment and frequent refresher courses to upgrade their business skills.

**Key words:** Youth, micro and small enterprises (msem), agri-businesses


1. **INTRODUCTION AND RESEARCH OBJECTIVES**

The foregoing is a research project conducted in Makueni district and whose aim was to find out whether the Kenyan youth are making use of their acquired technology to improve quality of their products and thus enhance their agri-business competitiveness. Technology has been identified as an enabler of economic growth as well as a means through which SMEs can gain competitiveness through creativity and innovativeness.

**Statement of the problem**

Youths are innovative, enthusiastic, vibrant and optimistic. If given a chance, they are capable of transferring their acquired technologies into business enterprises and drive Kenya towards achieving its vision 2030. However things are different. Youths are not employed. They are not starting own enterprises to create jobs for themselves and for others. Even the already started MSES are closing up within their first two years after start up (Nelson, 1986).

**Study objectives**

The study focused on the following objectives

a. Determining forms of investment in technology prevalent amongst youth led micro and small agri-businesses
b. Investigating effect of investment in technology to youth led micro and small agri-businesses’ performance.

b. Discovering challenges faced by micro and small agri-businesses in applying emerging technologies to get competitive advantage and sustained productivity

**Definition of terms**

This study used the following concepts.
Micro and small enterprises (MSEs) A micro or small enterprise is an undertaking, which employs between 1 and 20 employees, with capital investment of not more than kshs 30 million. Operational and administrative management lies in the hands of one to three persons who usually make major decisions.

Technology According to Van Dijk (2001), Technology may be seen as a resource that can be useful if adapted by firms to improve their efficiency and factor productivity. This study used the same definition.

Appropriate technology Is defined as the technology that is suitable to the needs of an MSE operating in the labour intensive, low-skill spheres and using local materials and resources

2. THEORETICAL BACKGROUND AND INFORMING LITERATURE REVIEW

The Kenyan youth
A Kenyan Youth has been defined as one aged between 15 – 30 years. The youth in Kenya, who number about 9.1 million, account for about 32% of the population. They form 60% of the total labour force but many of them have not been absorbed in the job market owing to the country's high unemployment level (GOK, 2006). Youths are innovative, enthusiastic, vibrant and optimistic. If given a chance, they are capable of transferring their acquired technologies into business enterprises and drive Kenya towards achieving its vision 2030.

Micro and small enterprises (MSES)
The economic recovery strategy for wealth and employment creation recognizes the great role that MSE sector play in wealth generation, employment creation and poverty reduction (GOK, 2003). The strategy paper goes on to state that the sector contributes about 18% GDP and plays a critical role in easing foreign exchange constraint, in penetrating new markets and in stimulating growth and development particularly in the rural areas. The sector also acts as the seed bed for entrepreneurial pursuits and complements the process of adjustment in large enterprises by bringing backward and forward linkages for products and services previously not available in the market.

In Kenya, much of existing technology is insufficient and cannot produce goods of a quality or type that enables them to break into new, expanding or more demanding markets. This is because
choosing a technology requires specific skills and knowledge that MSEs just do not have (Buainain, 2004). The Kenyan’s sessional papers No. 2 of 1992 and 2005 clearly summarize the problem of technology in Kenya as follows.

“MSEs have restricted levels of technology, in-appropriate technology and inadequate institutional capacity to support adaptation and absorption of modern technological skills. Such enterprises suffer from lack of information on existing technologies and are exposed to a weak environment that hampers coordination and transfer of technology. They have no way of gauging appropriateness of technology. In addition, there is a wide gap between the suppliers of technology and the end users of technology products.” (GOK, 2003). Effective transfer of technology is therefore not taking place in the country because decisions relating to cost aspects rest with multinational corporations” (GOK, 1982).

**Technology**

The purpose of technology is to improve productivity of enterprises, and enhance the quality of goods produced by enterprises to help them withstand local and international competition (ILO/UNDP, 2000). Technology transfer can be defined as the process that allows techniques, knowledge as well as products and management practices to flow from one entity to another (Moyi and Njiraini, 2005). Formal means of technology transfer include acquisition of capital equipments and machinery through trade, licensing and/ or franchising agreements. Informal technology transfer mainly occurs via technology-spillovers such as demonstration, imitation effects, competition, printed information, observations during visits to foreign plants and so on.

Successful business operation depends on the ability to complete; the ability to compete depends largely on the quality of the product (Lyman & Grubellini, 1975). This will therefore require that an entrepreneurial organization works towards product/service improvement on a continuous basis. This will, in turn, call for managerial talent that is capable of harnessing organizational resources – human, material, physical and informational resources- efficiently and effectively toward meeting the organizations objectives and goals. Most organizations objectives are to make profit; which is partly realized through the provision of competitive and quality products/services.
3. RESEARCH METHODOLOGY

Research design
The study used both qualitative and quantitative research designs which were descriptive in nature; Qualitative data was manually analyzed using the researcher’s insight and research skills to bring out the main themes.

Data Analysis
Graphical analysis as well as descriptive statistics of the variables was used in the study and which conforms to Gall and Borg (1989) observations that “descriptive studies by nature emphasis interpretation”. Data was collected using a predominantly 5 point likert type scale. The choices were coded and so also were the questions to facilitate analysis.

4. RESEARCH FINDINGS AND DISCUSSIONS

Introduction
This chapter examined the research objectives formulated in relation to the findings obtained. Conclusions and recommendations were subsequently given being based on information generated from the analysis of the questionnaire.

Summary of the findings

Family Background
From the findings, majority of entrepreneurs were aged 21 to 25 years (38.8%), single (52.4%) and with zero to one child (71.8%). They had trade test professional qualification (45.6%) and 3 to 4 years of working experience (39%). These findings agree very well with our expectations that youths are either single or have just gone into family life. They have therefore very little or no resources; an assertion shared by the Ministry of youth affairs and sports in their draft strategic plan (GOK, 2006).

Major investment in technology
The study revealed that 54% of all businesses had training as their major investment in technology, 28% in equipment, 16% in franchise and 2% on others. These findings tend to strengthen Ikiara’s and UNIDO’s assertion that education and on job training are drivers of adoption, survival and growth amongst enterprises and economies (Ikiara et al, 2005; UNIDO,
Likewise, the results also compare fairly well with Biggs et al (1995) and Gichira (1999) that firms in Africa have not invested much since they are young and small and that most of their investment in technology is in training. This means that these businesses are not able to reap much from emerging technologies as they have invested in only one form, training. Figures 1 below shows entrepreneurs’ major investment in technology.

![Major Investment in Technology](image)

**Fig1 Major Investment in Technology and their frequencies.**

**Effect of Technology Adoption on Business Performance**

**Record Keeping**

The study revealed that 48% of respondents were of the opinion that technology helps them very much in calculating their profits as well as keeping their business records. Forty-three per cent (43%) responded that technology assists them fairly well, 6% said it has not been of much help while only 3% said it does not at all assist them. These results confirm Gichira (2002) findings that technology helps MSES achieve effectiveness of financial assistance, strengthens communication channels and helps in marketing. They also concur with Buainainn (2002) assertion that appropriate technology helps SMES to operate in low-skill spheres with local
materials and resources. Equally, Biggs et al (1995) states that high technology firms which have invested in research and development, foreign technical licenses and technical assistance contracts have higher productivity than lower technology firms. He also contends that investment in technology adds about 25% to value added (Biggs, 1995). These findings show that technology is of paramount importance in enhancing MSEs technical documentation and business record keeping.

Marketing

When asked the extent to which technology is addressing problems of lack of market, most respondents (38%) indicated fairly well, 29% of respondents said technology was of much help in addressing their marketing problems, 27% said it was not of much help while 6% were of the opinion that technology was either not of help or were non committal. This information is represented in fig. 4.4 and seemed to concur very well with a number of scholars as follows; Albu (1997) and Maskell (1999) indicated that one way of achieving and maintaining competitiveness in a market oriented environment is to be able to create, distribute and exploit knowledge faster than competitors. In turn, this depends on cost advantages, innovations and continuous improvement of products and services; they claimed (Albu, 1997; Maskell and Malmberg, 1999). Biggs et al (1995) suggested that investment in technology and worker training should be incorporated at firm level policies as they are major determinants of firms’ ability to get connected to foreign markets’ through exporting’. Gichira (2002) defines technology capabilities as information and skills that allow productive enterprises to utilize equipment and technology efficiently.

As a result of efficiently utilization of technology, MSES become innovative and achieve improved product consistency and reliability; better packaging technology for bulk markets; increased output to open up bulk markets and thus increased marketing independence. These results mean that technology is very crucial in improving MSES product marketability and growth. It improves product design, quality control and ensures increased product markets. Figure 2 below represents respondents’ views on how technology helps them solve problems of lack of market.
Business competitiveness

For effects of appropriate technology on business competitiveness, 32% of respondents said it helps them increase their sales, 28% stated it improves quality, 19% talked of increasing efficiency while 16.5% said it improves their customer royalty.

These results bring out two most important outcomes that technological assistance to MSES can achieve, also mentioned by Gichira (2002) Biggs (1995), Oakland (1993) and Government of Kenya (G O K, 2005).

These two achievements from use of appropriate technology are improvement of quality of products and increase in sales volume of an enterprise. This is reflected in table 1 and figure 2 below and shows that most entrepreneurs perceived use of appropriate technology is helping them to increase their sales volume and improve quality of their products to enhance their competitiveness.

Table.1 Information on Appropriate Technology

<table>
<thead>
<tr>
<th>Options</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quality products</td>
<td>28.2</td>
</tr>
<tr>
<td>Increased sales volume</td>
<td>32.0</td>
</tr>
<tr>
<td>Reduced waste</td>
<td>3.9</td>
</tr>
<tr>
<td>Fast/ efficient production</td>
<td>19.4</td>
</tr>
<tr>
<td>Customer loyalty/repeat buying</td>
<td>16.5</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>100.0</strong></td>
</tr>
</tbody>
</table>
Fig. 2 Effect of Technology on Agri-Business Competitiveness.

When plotted on a normal regression graph, effect of technology as perceived by entrepreneurs and agri-business competitiveness produces a perfect positive regression line. This implies that there is a one-on-one relationship between the two variables (effect of technology as perceived by entrepreneurs and business competitiveness). This is similar to ILO/UNDP (2000) expectations that the purpose of technology is to improve productivity of enterprises and help them withstand local and international competitions. According to Gichira (1999), technology has proved to be the engine of economic growth when applied to micro and small enterprises amongst ‘Asian Tigers’. Lucas (1993) observes that accumulations of human capital in form of technological capabilities far outweigh all other factors of production and that it is a cause of sustained development success. Lastly, Moyi and Njiraini (2005) say that technology is a key source of growth and competitiveness. They conclude that ability to use technology is best measured by the production and investment capabilities. These results therefore imply that Technology is very effective in enhancing entrepreneurs’ agri-business
competitiveness. Figure 3 below represents the relationship between Effect of Technology and Agri-Business Competitiveness.

![Normal P-P Plot of Regression Standardized Residue](image)

**Normal P-P Plot of Regression Standardized Residue**

**Fig. 3 Effect of Technology on Agri-Business Competitiveness.**

**Challenges faced in Applying emerging technologies**
When asked the challenges they face in applying quality improvement technique, 49% of the respondents said they have insufficient funds. Inappropriate skills were mentioned by 22.3%, and inefficient machines were mentioned by 18.4%. 11% however said their major challenge in applying the technique was lack or insufficient information. These results concur well with Moyi (2005) who observes that Kenya’s productive and investment capability is constrained by factors such as high cost of equipment and machine components; Gichira (2002) who concludes that widening gap between the technological capabilities employed by African firms and those employed by firms in other parts of the world are caused by inadequate funds; and Biggs, Shah and Srivastova (1995) who asserts that studies in African countries reveal that Africa exhibits
much more inter firm technological heterogeneity than other developing regions (due to lack of funds); and Patel (1986), Chambers (1967) and Albu (1997) who conclude that entrepreneurs need skills, knowledge as well as financial resources to be able to assimilate change and create technology.

These discussions imply that the most important challenge in using quality improvement techniques is insufficient funds. These results are represented in table 2 below.

Table 2; Challenge Faced In Applying Quality Improvement Techniques

<table>
<thead>
<tr>
<th>Options</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>No/ little money</td>
<td>48.5</td>
</tr>
<tr>
<td>No/inappropriate skills</td>
<td>22.3</td>
</tr>
<tr>
<td>No efficient machines</td>
<td>18.4</td>
</tr>
<tr>
<td>No/little information</td>
<td>10.7</td>
</tr>
<tr>
<td>Total</td>
<td>100.0</td>
</tr>
</tbody>
</table>

Qualitative Questions

These were mainly from part three of the questionnaire. The questions in part three were aimed at checking and confirming the outcomes of the quantitative questions as they also bring out other main themes. The section had varied responses. However the responses which could be grouped were analyzed in numerical terms using the SPSS. They are as follows.

Comment on Any Other Technology Issue

When asked to comment on any other technology issue, 62.1% had no comment. 1.9% said they do not know what to say. 15.5% said technology is complicated while 2.04% talked of other issues. These results imply that entrepreneurs fear technology as it is complicated. This observation is also shared by the Government of Kenya that “MSEs have restricted levels of technology, in-appropriate technology and inadequate institutional capacity to support adaptation and absorption of modern technological skills. In addition, there is a wide gap between the suppliers of technology and the end users of technology products.”(GOK, 2003). Fig.4 below
shows respondents’ comments on other technological issues not captured in the main questionnaire.

![Fig.4: Comments on Other Technology Issues.](image)

**Comment on Any Other Technology Issue of Importance to Youth Led Agri-Business**

For comments on any other technology issue of importance to youth agri-businesses, a shocking revelation came out that many landlords do not take requests on repairs and maintenance of business premises from youth tenants seriously. This view is very well supported by the Ministry of Youth Affairs and Sports strategic objectives of empowering youth to participate in decision making at all levels (GOK, 2006).

**Recommendations**

1. To enable MSEs cope with challenges of financial resources, it was recommended that the government of Kenya provide them with accessible, cheap and adequate loans.
2. The government should capacity build young entrepreneur’s human resource base with relevant skills to be able to benefit from emerging technologies

3. The government should promote all sectors of the economy including agriculture for young entrepreneurs to invest in

4. Finally, it was highly recommended that youth entrepreneurs be given a forum where they can air their views concerning issues affecting their businesses, a situation which would build their confidence in entrepreneurship and agri-business management skills.

References

Ablu M (1997)."Technological learning and innovating in industrial clusters in the south" science policy unit, electronic working paper No. 7 Brighton: university of sussex.


Van Dijk (2001). *Innovation and micro and small enterprise development in developing countries: linking knowledge as skills to produce employment*: University of Erasmus Netherlands.