INFORMATION COMMUNICATION TECHNOLOGY AS A STRATEGIC TOOL IN MICROFINANCE INSTITUTIONS IN KENYA

BY

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DECLARATION

This Management Research Project is my original work and has not been presented for a degree in any other university.

Signed: ........................................... Date: 23RD NOV, 2007

This Management Research Project has been submitted with my approval as University Supervisor.

Signed: ........................................... Date: 23/11/07

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DEDICATION

To my dear parents,
Mr. Ben Lelei and Mrs. Leah Lelei
For the love of education and
Who this thing began
And
A special dedication to my husband Eng. Anthony K. Bichii
For setting a good example
And our children Trevor Kiptoo and twins Andrew Ian Kipchumba
And Angela Ivy Cheruto who will continue from where mum has
Stopped.
ACKNOWLEDGEMENTS

I thank the almighty God for seeing me through this programme. His grace has been sufficient, He is my EBENEZER!

My sincere gratitude to all those who contributed immensely in one way or another to the completion of this project. Special gratitude goes to my supervisor, Mr. Jackson Maalu for his guidance, extreme patience and understanding, suggestions, improvements, and tremendous support through out this project. My sincere gratitude also goes to my lectures Dr Ogutu and Mr. Kariuki

I am greatly indebted to my dear parents, Mr. and Mrs. Ben Lelei for their support, my husband Eng. Anthony Bichii for encouragement, my brothers Philip (late), Davy, Dan, Cosmas, Nicholas, Pet and sisters Emerald and Mercy for support, my children Kiptoo, Kipchumba and Cheruto for their patience and perseverance, friends and colleagues, Sam Rotich, Francis Kiprop, Francesca, Tomno, Kinyua, Fronica Monari, George Okelo and many others for their constant guidance and encouragement.

My very special thanks to all my respondents. My special thanks to all relatives and friends who wished me well.
ABSTRACT

ICT is a key enabler. It has rewritten business rules and transformed business rules and transformed businesses. It has added value to business by reducing costs and improving communication and co-ordination between activities so that they run effectively. The study sort to establish the extent to which ICT is used as a strategic tool in MFIs in order to compete effectively and survive in a dynamic and turbulent environment.

Microfinance is the supply of loans, savings, money transfers, insurance and other financial services to low income people. Microfinance institutions (MFIs) which encompass a wide range of providers that vary in legal structure, mission and methodology offer these financial sources to clients who do not have access to mainstream banks or other formal financial service providers. A census study was carried out; data was collected through a questionnaire method. Questionnaires were administered through mail survey and e-mail. The respond rate was 76%. Findings of the study indicated that all MFIs have a vision, mission and a business strategy (100%). The extent to which MFIs use ICT for strategic roles such as development of business strategy, marketing, attracting customers, market expansion, provision of better customer service and development of new market was to a great extent . Among the challenges faced by MFI as they embrace ICT is high costs involved and regulatory barriers was not a challenge at all.
LIST OF TABLES

Table 4.1. Size of organizations.................................................................26
Table 4.2 Existence of clearly articulated vision, mission statement
and business strategy..............................................................................27
Table 4.3 Integration of ICT system with each other..................................32
Table 4.4 Integration of ICT system with your customers /suppliers?...........32
Table 4.5 Extent to which your organization uses ICT for strategic roles.......34
Table 4.6 Current challenges faced by micro finance institutions on ICT......35

LIST OF FIGURES

Figure 2.1 Strategy and capability...............................................................9
Figure 2.2 Representative technologies in a firms value chain....................12
Figure 4.1 Age of organization..................................................................26
Figure 4.2 Kinds of strategic planning methods..........................................28
Figure 4.3 Sources of your organizations competitive advantage...............29
Figure 4.4 Environmental factors that influence business strategy...............29
Figure 4.5 MFIs with fully fledged ICT departments.................................31
Figure 4.6 IT systems present in organization............................................31
<table>
<thead>
<tr>
<th>Acronym</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>ATM</td>
<td>Automatic Teller Machine.</td>
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<tr>
<td>AMFI</td>
<td>Association of Microfinance Institutions.</td>
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<tr>
<td>CGAP</td>
<td>Consultative Group to Assist the Poorest.</td>
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<td>ECLOP</td>
<td>Ecumenical Loans Funds.</td>
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<td>ICT</td>
<td>Information Communication Technology.</td>
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<td>KREP</td>
<td>Kenya Rural Enterprise Program.</td>
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<tr>
<td>KPOSB</td>
<td>Kenya Post office Savings Bank.</td>
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<tr>
<td>KWFT</td>
<td>Kenya Women Finance Trust.</td>
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<tr>
<td>SMEP</td>
<td>Small and Medium Enterprise Program.</td>
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<td>MFI</td>
<td>Microfinance Institutions.</td>
</tr>
<tr>
<td>MSE</td>
<td>Macro and Small Enterprises.</td>
</tr>
</tbody>
</table>
# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>Section</th>
<th>Pages</th>
</tr>
</thead>
<tbody>
<tr>
<td>DECLARATION</td>
<td>i</td>
</tr>
<tr>
<td>DEDICATION</td>
<td>ii</td>
</tr>
<tr>
<td>ACKNOWLEDGEMENT</td>
<td>iii</td>
</tr>
<tr>
<td>ABSTRACT</td>
<td>iv</td>
</tr>
<tr>
<td>LIST OF TABLES</td>
<td>v</td>
</tr>
<tr>
<td>LIST OF ACRONYMS</td>
<td>vi</td>
</tr>
<tr>
<td>TABLE OF CONTENTS</td>
<td>vii</td>
</tr>
</tbody>
</table>

## CHAPTER ONE: INTRODUCTION

### 1.1 Background

### 1.1.1 ICT as a Strategic Tool

### 1.1.2 Microfinance Institutions in Kenya

### 1.2 Statement of the Problem

### 1.3 Objective of the Study

### 1.4 Significance of the Study

## CHAPTER TWO: LITERATURE REVIEW

### 2.1 The Concept of Strategy

### 2.2 ICT and Strategy

### 2.3 Transformation of Value Chain

### 2.4 ICT as a Strategic Tool

### 2.5 A Review of studies on ICT in Micro Finance Institutions

### 2.6 Current Challenges Facing MFIs

## CHAPTER THREE: RESEARCH METHODOLOGY

### 3.1 Introduction

### 3.2 Research Design

### 3.3 Population

### 3.4 Data Collection

### 3.5 Data Analysis

## CHAPTER FOUR: DATA ANALYSIS, FINDINGS AND DISCUSSION

### 4.1 Introduction

### 4.2 Profiles of the Respondent

### 4.3 Business strategy

### 4.4 ICT Strategy
4.5 Extent to which Organizations use ICT for Strategic Roles ................. 33
4.6 Challenges Faced by MFIs on ICT .................................................. 34

CHAPTER FIVE: ..................................................................................... 36

SUMMARY, CONCLUSION AND RECOMMENDATION ...................... 36

5.1 Summary ......................................................................................... 36
5.2 Conclusion ....................................................................................... 37
5.3 Limitations of the Study .................................................................. 37
5.4 Recommendation ........................................................................... 37

REFERENCES ......................................................................................... 38

APPENDIX I: QUESTIONNAIRE
APPENDIX II: LIST OF MICRO FINANCE INSTITUTIONS
CHAPTER ONE: INTRODUCTION

1.1 Background

Today's business environment is turbulent. Events are dynamics, full of challenges and stiff competition. To remain competitive in increasingly aggressive markets, organizations have come up with ways of surviving by continuous innovations. To deal with matters that affect growth and profitability, managers employ management processes that will position a firm optimally in its competitive environment (Pearce and Robinson, 2002).

Thompson and Strickland (1989), states the challenge is to keep organizations strategies afresh, to maintain the organizations capacity for dealing with conditions and steer the organizations into doing the right thing at the right time. Companies must come up with strategies in order to survive the turbulent environment. An organization best chance for achieving a superior performance over long-term occurs when managers do a fine job on strategies. Aosa (1992), says the Kenya business environment has experienced many changes among them: globalization increased competition and accelerated implementation of economic reforms by the government, privatization and commercialization of public sector, price controls and liberalization of both domestic and foreign market

Ansoff & McDonnell (1990) have defined strategy as a set of rules for decisions making that guide organization behaviour which can either be of the following forms: Yardsticks also called objectives, product or business strategy, rules for establishing
internal relations called organizational concepts or rules for conducting day to day activities also known as operating policies. Chandler (1962) refers to it as the determination of the basic long term goals and objectives of an organization and the adoption of courses of action and allocation of resources necessary for meeting the goals. Therefore, strategy is a tool that offers significant help for coping with turbulent environment.

1.1.2 ICT as a strategic tool

According to Kahigu (2003) Information and Communication Technology (ICT) was in the past viewed as an automation tool for existing business processes. Existing business needs specifically drove ICT developments. It is now widely recognized that this will very often result in high investments and increased operating costs but in the anticipated improvements in performance. Today, the central premise is that ICT is a lever for designing processes and therefore, should not be simply overlaid on the existing business processes as a constraint in the development of optimum ICT infrastructure, the basic logic of the processes itself is questioned.

The impact of the new technology is far reaching and its invention has revolutionized the way companies conduct business and the micro finance industry is not an exception. Information communication technology has been instrumental in shaping it. It has opened the door to offer new products and better customer services. Therefore, enabling greater outreach and facilitate integration with the rest of the financial sector (Frankiewiez 2003).

Porter (1985), adds technological change is a principal driver of competition, plays a major role on industry structural change and increases new products; is great equalizer,
eroding competitive advantage of firms and propelling others to the forefront; a diffused technological change affects each of the competitive forces.

Technology has been the driving force in the 20th century and promises to hold the same in if not greater importance in the 21st century (Antoniou and Ansoff, 2004). Technological developments are the fastest and the most far-reaching in extending or contracting opportunity (Mintzberg et al. 2003). High quality, timely and reliable information is essential for performance, growth, internal control, portfolio quality, assets management and liquidity management. According to Consultative Group to Assist the Poorest (CGAP) survey, it takes 8.4 days on average for African microfinance institutions to know a delinquency problem verse two days in Latin America, and not only about a third of Africa microfinance institutions can predict their cash flow beyond one month, compared to about three-quarters in Latin America.

In today’s rapidly changing and competitive microfinance industry, most institutions are looking hard at the potential value to be derived from information and communication technology. This focus has taken on even greater urgency as institutions seek to meet the needs of the underserved poor and struggle with the issues of sustainable rural finance and the challenges of outreach. Technology has helped find practical solutions and help partnership work. Increase confidence in customers’ ability to share information, lend credibility, and have quality data. It also conveys an image of sophistication or “cutting edge” approach to operations and generate confidence to customers (Frankiewicz 20003).

1.1.3 Microfinance Institutions in Kenya

Microfinance is the supply of loans, savings, money transfers, insurance and other financial services to low income people. Microfinance institutions (MFIs) which
encompass a wide range of providers that vary in legal structure, mission and methodology offer these financial sources to clients who do not have access to mainstream banks or other formal financial service providers (Lafourcade, et al 2005).

Omino, (2005) defines microfinance to the provision of financial services to the low income households and macro-and small enterprises (MSEs), provide an enormous potential support to the poor and thus contribute to poverty alleviation.

Microfinance refers to small scale financial services - primary credit and services provided to people who own small business. These services also include insurance and payment services (Robinson, 2001). Ledgerwood (1998), the term microfinance refers to the provision of financial services to low income clients, including self employed.

The Kenya microfinance industry is one of the oldest and most established in Africa. Interest in the informal sector in Kenya started as far back as the early 1970's after the seminal ILO report on employment was issued in Kenya in 1972. This report for the first time identified the informal sector as a potentially important contributor to employment and economic growth in Kenya and other developing countries.

The microfinance industry in Kenya took its present shape on the set of economic liberation between 1992 and 1994. Kenya has developed a network of microfinance institutions that extend loans to small farms, business and entrepreneurs. The Association of Micro finance Institutions (AMFI) was formed to serve the interests of these institutions by creating an enabling environment for micro finance. Sharing best practices and creating business connections between various regional firms.
AMFI serves as an umbrella body of 33 micro finance institutions. Major players in the sector include Faulu, KWFT, Pride Ltd, Wedco Ltd, Small and Medium Enterprise Programs (SMEP), Vintage Management (Jitegemee Trust), Ecumerial Loans Funds (ECLOF) and Kenya Post Office Savings Bank.

Micro finance Act was enacted recently, and it is aimed at regulating the sector. MFIs will now be subjected to thorough audits by CBK and MFIs are expected to comply with these new guidelines which attract fines for every one broken. Code of conduct and ethics were non-existent and everyone was doing business the best way they knew how, it was free- for- all. Micro finance Institutions play an important role in the economic development of poor communities. Access to credit enables the households to accumulate wealth and assets which allow them to cope better.

MFIs face many challenges. Operating and financial expenses are high, and on average revenues remain lower than in other global regions. Efficiency in terms of cost per borrower is lowest for MFIs. Technological innovations, product refinements and on going efforts to strengthen the capacity of African MFIs are needed to reduce costs, increase outreach and boost overall profitability.

Currently, interest and knowledge about the microfinance industry had grown substantially. The focus of these institutions has gradually changed from emphasis on the very poor to the enterprise, as the demands on these institutions to become financially sustainable have increased. MFIs are important actors in the financial sector, and they are well positioned to grow and reach the millions of potential clients who currently do not have access to mainstream financial services.
1.2 Statement of the Problem

The ever increasing and complex business challenges (such as globalization, need for flexibility) call for the use of ICT, requiring organizations to embrace IT for core functions. ICT is part of the core business in many organizations offering the organization key success factors required by the modern day organizations, speed integration, flexibility and enabling innovation (Askkenas et al, 1995).

Porter (1998), states that ICT is applicable in all the value adding activities in an organization’s value chain. ICT links the various activities offering the organization a positive effect on differentiation and cost through its influence on the drivers for cost and uniqueness (of value activities). Competition is now based on information, with companies that are better able to gather and utilize information having an advantage; therefore organizations need to formulate comprehensive ICT strategies. Hogbin et al (1994) conclude that there is a greater need for IT to be more responsive to the long range needs of the business strategy, and other business functions to make better use of ICT to stay competitive.

Over the last decade mainstream financial institutions closed their branches that they had set up in rural areas and micro finance institutions filled the gap. The commercial banks have now reconsidered their decision, these institutions are now coming up with strategies of how to cast their net wider to encompass this segment of the population they once considered high risk and unviable. The competition continues to intensify; commercial banks are now making tailor made products for small customers. The target customers in microfinance business are the rural poor. Therefore this calls for continuous innovation in order to offer quality service at reduced costs. The
environment is constantly changing and the organizations have to constantly realign their activities to match with the new requirements of the environments (Gruduah 2007). ICT has added value to businesses in other sectors and it can do the same in micro finance industry. Sabana (2003) says many MFIs do not apply ICT as a strategic tool; they treat it as an add-on and consider it as something system administrators should deal with. MFIs should use ICT to add value by development of new products and for market growth.

Studies that have been done on competitiveness and information technology in Kenyan firms include Nyamwange (2001) and Abwao (2002). Nyamwange (2001) studied operational strategies pursued by large manufacturing in firms in Kenya to achieve competitive edge and survive in the turbulent (libero-global) environment. His focus was on the operational strategies. On the other hand Abwao (2002) dwelt on the role of information technology in the different levels of management specifically, on the extent to which computers are applied in business management in the private sector with special emphasis in the insurance industry. Letting (2003) looked at core technologies applied by vegetables and fats industries in order to be competitive. None of the above studies looked at the extent to which microfinance institutions are using ICT as a strategic tool.

Therefore, the research question this research intends to answer is, to what extent are microfinance institutions using ICT for strategic role?
1.3 Objective of the Study

The aim of the study is to establish the extent to which ICT is being used as a strategic tool by MFIs.

1.4 Significance of the Study

The study will be important to the players in the micro finance industry as they will be able to understand the information communication technology as a powerful strategic tools in transforming reach and efficiency. This approach significantly changes to the ways of doing business.

The findings will also be used by scholars as a point of reference in aspects that relate to ICT as a strategy and the value it adds to the organizations.
CHAPTER TWO: LITERATURE REVIEW

2.1 The Concept of Strategy

Andrew (1971) defines strategy as the pattern of major objectives, purposes or goals and essential policies and plans for achieving those goals which enable the company to define what business the company is pursuing, the kind of economic contribution it intends to make to its shareholders, employees and community at large. Porter (1996) asserts that strategy is creating a fit among companies' activities. The success of a strategy depends on doing many things well not just a few and integrating them. The organizations activities include its effective interaction with the environment in that these activities are geared towards serving external environment.

Organizations cannot survive let alone succeed if they cannot match their capability to the environmental requirements. The framework therefore that links on organization's capability to its environment is referred to as strategy (Ansoff, 1990).

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<table>
<thead>
<tr>
<th>Capability</th>
<th>Environment</th>
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<tr>
<td>Technology</td>
<td>Competition</td>
</tr>
<tr>
<td>Human Resource</td>
<td>Political</td>
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<td>Financial Resources</td>
<td>Natural</td>
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<td>etc</td>
<td>Social</td>
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Figure 2.1: Strategy - Capability link

Source: Ansoff and McDonnell, 1990

All organisations are an open system. They do not only depend on the environment for their provision of inputs and the disposal of their output to the same, but they are part of the environment and an integral one for that matter. Thus for an organisation to achieve its objective and ultimate success, realistic approaches that are considerate of the
environment must be taken into account. Overall, strategy is about the long term direction of an organization (Johnson and Scholes 2002).

2.2 ICT and Business Strategy

Letting (2003) takes website dictionary definitions of ICT as one which includes: the branch of knowledge that deals with industrial arts, applied science or engineering, the terminology of an art or technological process, invention method or the like and some of the ways in which a social group provides themselves with the material objects of the civilization.

ICT and strategy will focus on the impact of technology change in the environment and the development of appropriate ICT capabilities thereby ensuring that the company is positioned to take better advantage of technological opportunities available and using critical resources optimally. It is through the ICT strategy that organization become aware of and plan for changing technologies. ICT strategy contains the technology scope (how ICT creates business opportunities), and the governance structure (what external relationships ICT depends on), security structure (how to mitigate risks inherent technology), infrastructure architecture and skill (Haes and Graembergen 2004).

Neuman (1994), notes that not only is ICT strategy dependent on corporate marketing and operating strategies, but also marketing and operating strategies are depend on ICT. This circular dependency requires right integration between the developments of these strategies. The most successful companies are those that find and use methods to analysis the current and likely future state of technology and to utilize this knowledge.
throughout the entire strategy process. They need techniques to ensure that the implementation of the strategies stay aligned in the face of technological developments and changing consumer needs and competitive environment. Without aligned strategies, companies will not act as competitive as possible.

There is need to align ICT and business strategy. A lack of alignment between ICT and the business could lead to sub-optimal use of resources and cause the organization to lose out on the synergistic benefits thereof (Kitur 2006). Neumann (1994) points out that lack of alignment between ICT and business strategies affect a company’s competitiveness whereby the company will not be positioned to use critical resources optimally and therefore may be sidelined by companies that are taking better advantage of technological opportunities.

Karmarkar (2004) noted that ICT has enabled organizations to reconstitute in an effective and efficient manner. Its differing use in each organization coupled with its changing role in the business has lead to a continual replacement with the organization structure. A change in the environment requires a change in the strategy of the organization, which in turn requires supporting organizational structure for operation. ICT and the cultural values assumptions drive and influence all the decisions made in an organization. ICT seen from the view of technology (an environmental factor) and as a strategy has a direct effect on how the organization is structured to be able to support strategy.

2.3 Transformation of Value Chain

Competitive advantage cannot be understood by looking at a firm as whole. It stems from the many discrete activities a firm performs in designing, producing, marketing,
delivering, and supporting its product. Each of these activities can contribute to a firm's relative cost position and create a basis for differentiation. A systematic way of examining all the activities a firm performs and how they interact is necessary for analyzing the sources of competitive advantage. The value chain disaggregates a firm into its strategically relevant activities in order to understand the behaviour of costs and the existing and potential sources of differentiation. A firm gains competitive advantage by performing these strategically important activities more cheaply or better than its competitors (Porter, 1998).

The figure below illustrates the various types of technologies available and applicable in a firm as embodied in a value chain analysis.

Figure 2.2: Representative Technologies in a Firm's Value Chain

*Source: Adapted from Michael Porter Competitive Advantage: Creating and Sustaining Superior Performance (Page 167)*
According to Porter (1998), Information systems technology is particularly pervasive in the value chain, since every value activity creates and uses information. Figure 2 above shows information systems are used in scheduling, controlling, optimizing, measuring, and otherwise accomplishing activities. Information systems technology also has an important role in linkages among activities of all types, because the coordination and optimization of linkages requires information flow among activities. The recent, rapid technological change in information systems is having a profound impact on competition and competitive advantages because of the pervasive role of information in the value chain.

The technologies in different value activities can be related, and this underlies a major source of linkages within the value chain. Product technology is linked to the technology for servicing a product, for example, while component technologies are related to overall product technology. Thus a technology choice is one part of the value chain can have implications for other parts of the chain. In extreme cases, changing technology in one activity can require a major reconfiguration of the value chain. Linkages with suppliers and channel also frequently involve interdependence in the technologies used to perform activities (Porter, 1998).

The operations of microfinance institutions can be divided into: loan processing, service delivery, marketing activities, human resources etc. After performing these activities the microfinance institution should create value for the customer by having tailor made products at a low cost compared to what competitors are offering. The micro finance gains value when its costs are low when performing its activities. To gain competitive advantage over other players its services must be cheap and has an edge as far as quality

13
and customers satisfaction is concerned. This can be attained through products that best suit the customers.

ICT is vital at every point the way discreet activities are performed and the nature of the linkages among them. It’s also affecting the competitive scope and reshaping the way products meet buyers’ needs. This basic effect explains why ICT has acquired strategic significance and is different from other technologies business use (Letting 2003).

Porter’s (1998), ICT can be used to improve added value not only by the obvious business motivators of reducing costs but also by improving communication and coordination between activities so that they can run efficiently. Computerized support can reduce costs, add value by improving quality, making a service better, and improve coordination and thereby reducing raw material stocks and making a product more rapidly. This walk in strategic planning of information systems will become increasingly important as companies use information technology more efficiently to compete with each other and internally to improve profitability and product value.

2.4 ICT as a Strategic Tool

Technology has rewritten business rules, it has transformed stand alone environment into concentrated entities and created networks that dramatically optimize operations and set up the pace of business. Hence in this dynamic environment, technology is a key enabler. It allows business to address and accommodate global customers, vendors, suppliers and customers on a common ground. It is evolving technology that has forced enterprises to be proactive and look at solutions to evolve too. Anticipating shifts, managing them and twinning them into effective business solutions that change, scale
and deliver at all times is the way to maintain competitive advantage in the market place (Robson 1997).

Stebbins et al, (1995), the growth of ICT systems and their pervasive use in business is a familiar development from the early 1980’s. The ICT is fundamentally changing the nature of the workplace. Businesses are relying upon ICT to create competitive advantage thereby taking a new urgency to the business. ICT is being employed in the value adding activities, creating a new source of and means to sustainable competitive advantage. It is increasingly through ICT that consumer attraction and loyalty are accomplished while competitor initiatives are muted. It is therefore not surprising that business strategy is more influenced, enabled, and dependent on the ICT strategy.

Collis and Montgomery (1995) observes that the speed, the sharp reduction in the cost of information systems technology (i.e. computers, remote devices and telecommunication) has allowed IT systems to move from applications for the back office support to those offering competitive advantage.

Laforectade et al, (2005), operating and financial expenses are high and on average revenues remain lower than in other global regions. Efficiency in terms of cost per borrower is lowest for African MFIs. Technological innovations, product refinements and on going effects to strengthen the capacity of African MFIs are needed to reduce costs, increase outreach and boost overall profitability. Technological environment is thus a major segment of macro environment. This segment is interlinked with other macro finance environmental segments; nevertheless it constitutes the primary environmental segment influencing the management of technology.
The technological environment is the most viable and persuasive macro environmental segment in the society for three reasons: it brings new products, processes and materials it directly impacts every aspect of the society around us-for example transportation modes, energy, communications, entertainment, health care, food, agriculture and industry and alters the rules of global trade and competition (Narayanan 2001).

Mintzberg (1991) add that there are technological, economic, physical, social and political in kind. The corporate strategies are usually at least aware of these features of current environment. But in all the categories, change are taking place at varying rates fastest is technology less rapidly politics.

Information technology has long-term strategic influence on business performance. Many organizations store data which is often duplicated, not in the right format or not available when required. The ability to assemble this information and convert this into knowledge and make good business decisions is paramount for improving business performance (Gattorna et al 1990). Information Communication Technology has been documented as having strategic significance. It has added value to products, removed competition and enabled many new opportunities to re-evaluate strategic direction. Empirical studies have clearly identified positive links between IT and profitability, (Mingfang & Ye 1997). Bharadway, (2000) says specifically information technology will have a greater impact on profitability where there are dynamic environmental changes and more proactive organization strategy. Information technology is becoming essential if organizations wish to enter business on a global scale, it’s vital to coordinate and control global operations.
Organizations are using information technology to improve their competitiveness and a more strategic approach is becoming apparent. Simon and Grover (1993) examined ICT applications and demonstrated how a link between an organizations strategic decisions and ICT application could provide competitive advantage.

Reynolds (1995), ICT supports corporate strategy, managers must be able to identify opportunities to seize a competitive advantage. He refers to Porter that the fundamental basis for achieving and maintaining above average profitability over the long run is sustainable competitive advantage. He offers these basic strategies for achieving competitive advantage: cost leadership (become the low-cost producer in all market segment), differentiation (distinguish your products and services from others in all the market segments) and become the low cost producer.

2.5 A Review of studies on ICT in Micro Finance Institutions

According to Frankiewicz (2003), MFI s will use ICT as a strategic tool to deliver more valuable solution to customers needs than their competitors. With more, better and faster information, MFI s are in a stronger position to deliver products and services that customer's value. They use their enhanced understanding of customers evolving needs to improve existing products and to develop new ones. They can adjust certain product features, alter the way in which a product is marketed, or improve the care and services with which the product is delivered.

They can design new products to meet the need of new markets, the newly identified needs of existing markets, or the particular needs of individual market segments. ICT makes market segmentation possible, by organizing and analyzing the huge volume of data that are collected during a clients' relationship with the MFI. Cracknell and Douf
(2003) noted MFI can also use information technology to actually deliver new solutions or to enhance product features that customers most value. One of the advantages of electronic banking is that it offers greater accessibility to financial services. MFIs can develop affordable branchless banking solutions and alternative delivery channels that reduce wait time in queues and at counters and enhance the customer experience. It increases your ability to adapt to the changes in your environment and adapt to the changing needs of your clients.

Transaction costs are reduced, technologies such as wireless devices, electronic payment systems, and credit scoring can enable MFIs to complete transactions at a lower cost than before, thus making it possible for retail outlets or remote units to break even faster (Echange 2003).

Technology has today emerged from the role of a mere enabler to the driver of business strategies and a key factor for building and sustaining competitive advantage. MFIs are an information intensive industry massive and correct data with prompt retrieval system is needed. MFIs don’t just manage deposits and loans anymore; they manage live, sensitive relationships. This is an era whereby ‘anywhere, anytime’ mode of banking is a customer’s expectation. The end of the hour is for the MFIs to concentrate on their core competencies and partner with a company who has a deep understanding of banking business. With ICT, there is the ability to predict the future trends and offer optimal solutions by adopting latest technology (Perez 2003).

Lafourcade et al (2005), Technology makes it possible for MFIs to collect more information accurately. ICT allows microfinance organizations to increase their efficiency, thereby by lowering their overhead costs and helping them achieve
sustainability. The technology results in time savings for loan officers, while also ensuring more accurate accounting and record keeping, because all information is stored on a smart card. Field officers can make decisions on the spot, reducing the number of visits required to complete a transaction. Hence, increase in staff productivity as the employees well is able to serve more customers. Pride Africa, has launched drum Net which stores more information on the buying and business habits of pride clients. In order to group the purchasing power of thousands of small entrepreneurs (CGAP 2003).

Various softwares packages are contributing to the increase in efficiency of many MFIs. HISaab, for example, is a micro finance software designed for illiterate and uneducated users. The software is used to document transactions, and allows for more macro-level analysis of lending patterns, cash flows and repayments (Cracknell 2003).

According to Frankiewiez (2003), with ICT, MFIs can create alternative delivery channels that make it possible to reach clients without necessarily having to physical infrastructure, i.e. buildings and offices. This physical infrastructure is costly to acquire to create each individual access point typically restricts growth. Although capital investment are also required for IT infrastructure, those investment tend to be intense during initial design and installation, with much lower costs for adding individual access point. This facilitates growth and gain greater economic of scale.

MFIs can choose from a growing number of options for reaching their customers, including ATMs, retails agents equipment with point of sale devices, internet kiosk etc. Large banks, whose access to capital, scale, and expertise could alleviate many of the problems associated with micro finance, have been reluctant to respond to the unmet demand for micro finance service due to the large costs of building and maintaining
physical bank branches, with this in mind, many initiative are using new information and communication technologies, such as smart cards, handhelds and modified ATMs, to bypass the traditional methods of providing bank services. In doing so they are lowering their overload costs and expanding their reach, helping to extend the availability of microfinance.

ICT can help find practical solutions to make partnerships work and facilitate integration. It can help solve the technical problems of connecting different individuals and constitutions, system compatibility, security, meeting regulatory requirements, and designating applications that enable the sharing of relevant and timely information. It makes the idea of integration more attractive. The proper application of mainstream IT can increase confidence in a partners ability to share information lend credibility to the quality of data that will be shared, convey an image of organization, sophistication or an “cutting edge” approach to operations, and generate confidence in partners ability to manage risk (Hulme et al, 1999).

Rural poor people frequently lack an identity that allows them to access credit. Banks are reluctant to provide services to these potential customers, who are often illiterate and have no credit history. By providing secure identification new ICT such as smart cards and biometrics are compensating for this, allowing many to access credit from formalized institutions for the first time. Secure identity can also protect MFI from customers who are have proven to be bad credit risks “shopping” for loan from one branch or one MFI to the next. Addressing this problem requires MFIs sharing customers’ credit history (Sabana, 2003).
2.6 Current Challenges Facing MFI’s on ICT

Most ICT solutions are not affordable to the vast majority of MFI’s. The high cost of structures in implementing ICT is a great challenge. Rapid technological change renders investment in technology worthless. ICT projects are costly and the return on investment may not be obvious given that it usually takes years, not months, for projects for realize their worth. These projects have to compete with the needs of many other departments which can easily show a return on investment over a short period of time. To get management support, ICT objectives and returns have to be explained in a way that conservative, risk-averse bankers can understand (Pertet, 2003).

Many MFI cannot attract high calibre IT staff either because of a shortage of available professional with requisite skill or because they cannot afford to pay available professionals a competitive salary. As a result many institutions lack the technical skills to properly evaluate and negotiate ICT contracts (Echange, 2003).

Lengewa (2003) cited human resources weakness and limited management capacity on market research and product design. High staff turnover and unattractive staff incentive structures have been noted to be a key factor within the industry. Institutions end up relying on expensive external advisors and / or are unable to provide adequate staff support within the institution both during and after implementation. This can significantly impact system update.

MFI budgets are always tight and implementation schedules are aggressive. People try to do a lot on a compressed amount of time. There are high expectations of technology. People see it as the potential panacea for making the whole organization better and they are often not very clear about what the limitations of technology are upfront. We think it
works perfectly, and then when we get in and it doesn’t and there’s a great dissatisfaction (Echange, 2003).

The CGAP survey findings that the current technology solution are not adequately meeting MFI needs, 34% of African micro-finance managers are happy with their current systems reflects this weakness. Many reasons were cited for it, including an inability on behalf of MFIs to clearly articulate what their business goals and needs are, and to make IT decisions in support of those goals. Hence integration poses a challenge.

Vendors have over-promised and under-delivered in the relationships with Micro-finance institutions. MFIs have become disenchanted, frustrated, intimidated and angry about their experience. According to Sabana (2003), the IT service providers and the vendors have taken advantage of the pressure and ignorance in the industry to make a quick kill. MFIs feel that they have been used as testing grounds for new software. Vendors come in with hard sell tactics and give wonderful stories about how well their system is working, but once it is installed, then MFI realize that they have been taken for a ride. MFIs struggle to manage change at different levels, change in the markets, in the size of customer base and in the environment in which they operate.
CHAPTER THREE: RESEARCH METHODOLOGY

3.1 Introduction

This chapter describes the methods and procedures that were used to conduct the study. It includes research design, target population, data collection and data analysis techniques.

3.2 Research Design

The research design used was a census survey. A census survey is a complete enumeration of all items in the population. All items were covered and no element of chance was left and highest accuracy was obtained. When universe is a small one, it is no use resorting to a sample survey. When the field is large this method becomes difficult to adopt (Kontari 1990).

3.3 Population

The population of the study consisted of all 33 microfinance institutions registered under AMFI, according to 2007 Micro Finance directory. The study was a census survey and as such all the 33 microfinance were included in the study. Responses were obtained from ICT managers of microfinance institution and in their absence senior managers were used in the study.
3.4 Data Collection

The study used primary and secondary data. A structured questionnaire was used to collect primary data. The questionnaire was divided into five sections (see appendix 1).

The researcher used drop and pick questionnaires method. Follow-up were done via personal visits and telephone calls which facilitated responses rate. Primary data were be supplemented by secondary data from microfinance manuals, internet research empirical studies and academic journals with relevant information.

3.5 Data Analysis

Before analysis, the data was checked for completeness and consistency. Descriptive statistical method was used to analyze section one and two of the questionnaire. Data was summarized and presented in form of frequencies, percentages and proportions in tables. Descriptive statistics enabled the researcher to summarize and organize data in an effective and meaningful manner. Section four and five of the questionnaire responses were analyzed using percentages to rank the factors in order of preferences.

Factor analysis was used to group together factors with the same characteristics and reduce the responses to manageable factors. Factor analysis ranked the extent to which organizations use ICT as a strategic tool. Factor analysis enables the data to be summarized and organized in an effective meaningful way as it provides tools for reducing information into understandable form (Nachmias and Nachias, 1996).
CHAPTER FOUR: DATA ANALYSIS, FINDINGS AND DISCUSSIONS.

4.1 Introduction

The research objective was to establish the extent to which ICT is being used as strategic tool by MFI’s. This section presents the analysis and findings from the primary data that was gathered from the respondents. All completed questionnaires were edited for completeness and consistency. Summaries of data findings together with interpretations have been presented by use of percentages, frequencies, bar graphs, mean scores, standard deviations. Factor analysis was used to reduce the data into a few meaningful dimensions/factors.

4.2 Profiles of the Respondent.

The study used a census survey of thirty three (33) questionnaires which were sent out to various respondents (companies). Out of the thirty three questionnaires, twenty five were collected and used in the analysis, this represents 76 percent response rate.

The organizations in the study were analysed in terms of the age (number of years of existence), this was to highlight how established the MFI’s have been operating in the industry. As shown in fig 4.1, 52% of the companies had been in existence for over 10 years, and 36% between 6 to 10 years and 12% had been in existence for less than 5 years. This indicates that majority of the companies interviewed had been in existence for longer period.
Figure 4.1: Age of the organization

The demographic profile of the respondent's, that is, the number of employees in each company was analyzed to determine the general classification of the respondents. The respondents were categorized into three categories as shown in table 4.1, that is, MFI's with employees below 500 employees, between 501-1000 employees and above 1000. The findings shows that 76% of the companies had below 500 employees, 12% between 501 and 1000 employees and 12% above 1000 employees. Majority of the companies had a workforce of less than 500 employees.

Table 4.1. Size of organizations

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percentage</th>
<th>Cumulative Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td>Below 500</td>
<td>19</td>
<td>76.00</td>
<td>76.00</td>
</tr>
<tr>
<td>501-1000</td>
<td>3</td>
<td>12.00</td>
<td>88.00</td>
</tr>
<tr>
<td>Over 1000</td>
<td>3</td>
<td>12.00</td>
<td>100.00</td>
</tr>
</tbody>
</table>

4.3: Business strategy

Porter (1996) asserts that strategy creating a fit among company's activities. The success of a strategy is doing many things well not just a few and integrating them. The organization activities includes its effective interaction with its environment in that these activities are geared towards serving external environment. The business strategy data was compared in excel by using frequencies, percentages and Cumulative
percentages. As shown in table 4.2, all MFI’s (100%) had clearly articulated vision, mission and business strategy. This confirms Porter’s assertion. According to Johnson and Scholes (2002) strategy is about the long term direction of an organization. Organizations can not survive let alone succeed if they can not match their capability to the environment requirements. Therefore that links on organizations to its environment is referred to as strategy (Ansof 1990). This is consistence with the findings of the study and respondents response that there is need to have business strategy.

Table 4.2: Existence of Vision, Mission and business strategy in MFI's

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percentage</th>
<th>Cumulative Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>25</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>No</td>
<td>0</td>
<td>0</td>
<td>100</td>
</tr>
<tr>
<td>Don't know</td>
<td>0</td>
<td>0</td>
<td>100</td>
</tr>
</tbody>
</table>

The development of business strategy amongst various MFI’s are carried out in terms of high formal, formal, and semi formal. Figure 4.2 shows that, 68% follow formal strategic planning method, 24% follows high formal method while 8% adopted semi formal method of strategic planning. Formal strategic planning method is the most common way of developing business strategy amongst MFI’s. This is because the method involves many people in the organization (sense of ownership) and its is well documented.
To remain competitive in an increasingly aggressive market organizations have to come up with means of surviving by continuous innovations (Pearce & Robinson, 2002). The organization must therefore have a definite planning periods within which the plans are appraised and where necessary changes are made in line with the market demands and beyond which anew strategy must be put in place to drive the organization. Amongst most MFI's planning period is 0 to 5 years, developed in-house and done through consultative workshop.

Among the competitive advantages listed, different companies identified with various parameters as a measure of their competitive advantages as shown in figure 4.3, 56% had Cost leadership (pricing) as their competitive advantage, 72% identified focus (meeting specific customers needs) as competitive advantage,28% had speed as a competitive advantage, 60% had innovation while 68% identified customer service as their competitive advantage.
Environmental factors influencing business strategy were competition, changing market/customer needs, social/cultural factors and economic conditions and trading blanks (ranked as the most influential factors) and political/legal factors, natural phenomena and globalization (ranked as least influential factors) amongst MFI’s as shown in figure 4.4.
4.4: ICT Strategy

ICT strategy contains the technology scope (how ICT creates business opportunities), and the governance structure (what external relationship’s ICT depends on), security structure (how to mitigate risks inherent technology), infrastructure architecture and skills (Haes and Graembergen, 2004). The ICT strategy data was compared in excel by using frequencies, percentages and Cumulative percentages. Majority of the MFI’s, 56% had fully fledged ICT department, 36% did not have while 8% did not know as shown in figure 4.5. The ICT departments are headed by ICT managers who report to the CEO. Development of ICT strategies are done in-house by senior managers under a planning period of three years. Technology has rewritten business rules, it has transformed stand alone environment into entities and created networks that dramatically optimize operations and set up the pace of the business. Hence in this dynamic environment, technology is a key enabler. It allows businesses to address and accommodate global customers, vendors, suppliers and customers on common ground. It is evolving technology that has forced enterprises to be proactive and look at solutions to evolve too (Robson 1997). This is consistent with the findings of the study that most MFI have an ICT department 56% and ICT strategy. The findings are further demonstrated by the fact that 96% of the organizations have communication systems and 96% financial systems, communication is a powerful tool in coordination of activities and accurate financial reporting so that the right decisions are made on at the right time.
Organizations with fully ICT department

Fig 4.5: MFI's with fully fledged ICT department

Companies had various IT systems in place. 96% of the companies had communication (email, internet site) in place, 92% had financial IT systems in place, 52% had customer relationship management systems in place, 40% had human resource management system and 20% had other systems (office operation, sponsorship management, credit management and loan tracking systems) in place.

What IT systems does your organization have?

Figure 4.6: IT systems present in organizations.
Table 4.3: Integration of ICT systems with each other

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percentage</th>
<th>Cumulative Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>20</td>
<td>80</td>
<td>80</td>
</tr>
<tr>
<td>No</td>
<td>4</td>
<td>16</td>
<td>96</td>
</tr>
<tr>
<td>Don't know</td>
<td>1</td>
<td>4</td>
<td>100</td>
</tr>
<tr>
<td>Total</td>
<td>25</td>
<td>100</td>
<td></td>
</tr>
</tbody>
</table>

In order to fully utilize ICT systems in an organization, it is a requirement that the systems are linked to each other. Table 4.3 indicates that, 80% of the companies have their ICT systems linked to each other, 16% of the companies have systems which are not linked to each other while 4% of the companies did not know whether their systems were linked to each other.

Table 4.4: Integration of ICT systems with customers and suppliers

<table>
<thead>
<tr>
<th></th>
<th>Frequency</th>
<th>Percentage</th>
<th>Cumulative Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>7</td>
<td>28</td>
<td>28</td>
</tr>
<tr>
<td>No</td>
<td>18</td>
<td>72</td>
<td>100</td>
</tr>
<tr>
<td>Don't know</td>
<td>0</td>
<td>0</td>
<td>100</td>
</tr>
<tr>
<td>Total</td>
<td>25</td>
<td>100</td>
<td></td>
</tr>
</tbody>
</table>

Customers and suppliers form the wider part of the organizations and as such they are directly or indirectly related to the organizations. Companies may or may not have direct link of their systems to their customers/suppliers. The possibilities of linkages are determined by the nature of the companies' business, relationship between customers/suppliers and the company, speed of doing business and security risks involved. Of the companies in the study 72% did not have their systems integrated with their customers/suppliers while only 28% integrated their systems to their customers/suppliers. The findings could be as a result of the risks involved.
4.5 Extent, to which Organization Uses ICT for Strategic Roles.

The end justifies the means, if you want to achieve a certain goal, you must come up with ways of attaining it. The means is ICT. Stebbins et al. (1995) asserts that businesses are relying upon ICT to create competitive advantage. ICT is been employed in value adding activities, creating a new source of and means to sustainable competitive advantage. It is increasingly through ICT that customers’ attraction and loyalty are accomplished while competitor initiatives are muted. It is therefore not surprising that business strategies are more influenced, enabled and dependent on the ICT strategy. The data was captured by use of frequency. The data was analysed in terms of mean and standard deviation using SPSS. The findings were as shown in table 4.5. The mean values of the strategic roles played by ICT in the organization varied from 2.84 to 3.875, standard deviations values were high across all the strategic roles, showing a high variation in opinion expressed by the respondent for each role, that is, the MFI’s uses ICT to achieve different objectives within the same strategic role. Using the mean values of the various roles, the extent to which ICT is used by MFI’s for strategic purposes are classified as moderate extent (mean of 3) and great extent (mean of 4). Using factor analysis, MFI’s identified uses of ICT for strategic roles into two factors, that is, moderate extent (F1-mean of three), and great extent (F2-mean of four).

The findings are in line with Frankieiez (2003), asserts that MFI’s use ICT as a strategic tool to deliver more value solutions to customer needs than their competitors.
Table 4.5: Extent to which organization uses ICT for each of the strategic roles

<table>
<thead>
<tr>
<th>Description</th>
<th>Mean</th>
<th>Std. Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>ICT is very involved in the development of business strategy</td>
<td>3.6400</td>
<td>.90738</td>
</tr>
<tr>
<td>ICT has been used as an effective tool in marketing</td>
<td>3.4167</td>
<td>.92661</td>
</tr>
<tr>
<td>ICT has enabled the organization to offer electronic services to customers</td>
<td>3.5200</td>
<td>1.47535</td>
</tr>
<tr>
<td>The organization has used ICT to attract customers by offering services cheaply</td>
<td>3.2400</td>
<td>1.33167</td>
</tr>
<tr>
<td>The organization has used ICT to expand its markets</td>
<td>3.4400</td>
<td>1.19304</td>
</tr>
<tr>
<td>ICT has supported product differentiation strategy by adding value and quality</td>
<td>3.1600</td>
<td>1.10604</td>
</tr>
<tr>
<td>ICT has enabled provision of better customer service/product information</td>
<td>3.7200</td>
<td>1.02144</td>
</tr>
<tr>
<td>The organization has utilized ICT to provide customers with reliable service, quick response to their questions and additional products</td>
<td>3.8750</td>
<td>.94696</td>
</tr>
<tr>
<td>The organization has utilized ICT to achieve market specialization-concentrating on a particular market/product niche</td>
<td>3.0600</td>
<td>1.03763</td>
</tr>
<tr>
<td>The organization has utilized ICT to market its new products and services in an existing networks to achieve</td>
<td>3.3200</td>
<td>1.14455</td>
</tr>
<tr>
<td>ICT has created strong and profitable linkages with suppliers and customers</td>
<td>2.8400</td>
<td>1.10604</td>
</tr>
<tr>
<td>ICT has formed the basis for the organization to enter into strategic alliances</td>
<td>3.0000</td>
<td>1.41421</td>
</tr>
<tr>
<td>ICT has greatly transformed value chain leading to efficiency in service delivery</td>
<td>3.6250</td>
<td>1.13492</td>
</tr>
</tbody>
</table>

4.6 Challenges faced by MFI's on ICT.

Challenges are stumbling blocks on MFIs as they embrace ICT. Challenges are factors that are beyond the MFI and some of the solutions are not affordable. The purposes of these challenges are important for MFIs so that they are able to plan in advance and know where to source for funds when need be. It is important to be aware that things might not work as planned. According to CGAP survey findings the current technology are not adequately meeting MFI needs, 34% of African micro finance managers are happy with the current systems reflects this weakness. Data was captured by use of frequency, mean score and standard deviation using SPSS. As shown in table 4.6, the findings were, challenges faced by MFI's had a mean values of two (2), that is regulatory barriers (minor challenge) mean of three (3) that is staff attraction and retention, nature and pace of change, poor vendor relationship, higher expectations and
vested interest (moderate challenges), mean of four (4) that is, high cost of implementation and ICT solutions not meeting their needs (major challenges). Standard deviations values across the challenges were high, showing a high variation in opinion expressed by the respondent for each challenge. Using factor analysis, MFI’s identified challenges into three factors, that is, minor challenge (F1-mean of two), moderate challenge (F2-mean of three) and major challenges (F3-mean of four).

Table 4.6: Current challenges faced by Microfinance institutions on ICT

<table>
<thead>
<tr>
<th>Descriptive Statistics</th>
<th>Mean</th>
<th>Std. Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>High cost structures in implementing ICT</td>
<td>3.7500</td>
<td>1.11316</td>
</tr>
<tr>
<td>Many organization cannot attract high caliber ICT staff in terms of competitive salary</td>
<td>3.5833</td>
<td>1.13890</td>
</tr>
<tr>
<td>ICT solutions are not adequately meeting their needs</td>
<td>2.8333</td>
<td>1.04950</td>
</tr>
<tr>
<td>Organization struggle with the nature and pace of change</td>
<td>3.1739</td>
<td>0.83406</td>
</tr>
<tr>
<td>Poor vendor relationship. Vendors have been able to over promise and under deliver in their relationships</td>
<td>2.7500</td>
<td>1.07339</td>
</tr>
<tr>
<td>There are high expectations of ICT</td>
<td>3.2500</td>
<td>1.03209</td>
</tr>
<tr>
<td>Regulatory barriers can constrain ability to implement strategic ICT solutions</td>
<td>2.2083</td>
<td>1.35066</td>
</tr>
<tr>
<td>Vested interest in terms of infrastructure and shared solutions. Unwillingness to share</td>
<td>2.7083</td>
<td>1.16018</td>
</tr>
</tbody>
</table>
CHAPTER FIVE: SUMMARY, CONCLUSION AND RECOMMENDATIONS

5.1 Summary

The objective of the study was to establish the extent to which ICT is being used as a strategic tool in MFIs. The study examined the nature of strategic planning of organizations, environmental factors influencing business strategy, the existence of ICT departments in organizations, development of ICT strategies in organizations, various systems of ICT existence in organizations linkages / integrations of ICT systems with the departments in organizations and stakeholders. The study also examined analysed the extent to which MFIs use ICT for strategic roles and current challenges faced by MFIs on ICT. In a nut shell all organizations had clearly and articulated visions, mission’s statements and business strategy (100%). Most MFIs used formal methods of developing strategic plans (68%) and (56%) had a fully fledged ICT department while 36% did not have and 80% had ICT strategy in place. ICT systems in place in most organizations were communication 96%, financial system 92%, HR management system 40%, and customer’s relationship management 52%. Most organizations departments had ICT system integrated with each other (80%) and most organizations (72%) did not link their ICT systems to customers/suppliers this maybe as a result of risks involved. The major strategic roles of ICT are development of business strategies, offering electronic services, provision of better customer services and efficiency in transformation of value chain. The key challenges faced by MFI’s in the use ICT are high costs structure in implementation of ICT, attraction and retention of high calibre staff and high expectations from ICT, however regulatory barriers is viewed as minor challenge across the MFI’s in the implementation of the ICT.
5.2 Conclusion

ICT plays a major role in the operations of microfinance institutions as highlighted from the findings i.e. financial systems, communication systems, credit system management and loans recovery system management. This is also supported by the fact that all the MFI's had a clear ICT strategy in place. Among the listed variables in terms of the extent to which ICT is used as a strategic tool in the management of MFI's most of them were ranked as having moderate to great extent. In conclusion the study shows that ICT is a key driver in achieving competence in MFI's.

5.3 Limitations of the Study and Problems Encountered

The study only focused on MFI's registered under AMFI. The response from the field (questionnaires administered) was not a 100% due to busy schedule of some ICT managers and senior managers. Some MFI's have a policy in place restricting disclosure of information.

5.4 Recommendations

In this study only MFI's registered under AMFI were considered and it is recommended that others not registered also be included. Similar studies need to be done and results be compared in order to establish the consistency of the role of ICT in MFI's.
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Pertet, RKO (2003), Key Success Factors And Challenges In Selecting And Implementing MIS. A challenge seminar report 2003 Nairobi.


Re: Collection of Survey Data

I am a Postgraduate student at the University Of Nairobi, School of Business. In order to fulfill the degree requirements, I am undertaking a research project. The title of my project is "Information Communication Technology as a strategic tool in inter-financial institutions in Kenya".

I have prepared a questionnaire to help me in my data collection and I am requesting you to take a few minutes to complete it to the best of your ability.

The information you will provide will be treated with strict confidentiality and will only be used for purposes of this study without mentioning your name or that of your organization.

Thank you for your cooperation.

Yours faithfully,

Grace C. Lelei
Student

Jackson Muli
Supervisor
Dear Respondent,

**Re: Collection of Survey Data**

I am a Post-graduate student at the University Of Nairobi, School of Business. In order to fulfill the degree requirements, I am undertaking a research project. The title of my project is "Information communication technology as a strategic tool in microfinance institutions in Kenya".

I have prepared a questionnaire to help me in my data collection and I am requesting you to take a few minutes to complete it to the best of your ability.

The information you will provide will be treated with strict confidence and will only be used for purposes of this study without mentioning your name or that of your organization.

Thanks for your co-operation

Yours faithfully

Grace C. Lelei.

Student

Jackson Maalu

Supervisor
APPENDICES

APPENDIX 2: QUESTIONNAIRE

SECTION ONE: Organization Profile.

1. Name of the company: ________________________________

2. How long has your organization been in existence?
   - Less than 5 years [ ]
   - 6 to 10 years [ ]
   - Over 10 years [ ]

3. Number of employees (tick one)
   - Below 500 [ ]
   - 501 - 1000 [ ]
   - Over 1000 [ ]

SECTION TWO: Business Strategy

4. Does your company have clearly articulated Vision and Mission statement? (Tick one)
   - Yes [ ]
   - No [ ]
   - Don’t know [ ]

5. Does your company have a business strategy? (Tick one)
   - Yes [ ]
   - No [ ]
   - Don’t know [ ]

6. What kind of strategic planning does your organization follow? (Tick one)
   - High formal [ ]
   - Formal [ ]
   - Semi formal [ ]
   - No process, no planning [ ]

7. What is your organization’s planning period? (Tick one)
   - 0 - 1 yr [ ]
   - 1 - 3 yrs [ ]
   - 3 - 5 yrs [ ]
   - Over 5 yrs [ ]

8. Is your business strategy developed in-house? (Tick one)
   - Yes [ ]
   - No [ ]
   - Partly [ ]
   - Don’t know [ ]

9. If yes in 8 above, what is the mode of its development (tick one)
   - Executive Retreats (Senior Management) [ ]
   - Management Retreats (Senior and Middle Management) [ ]
   - Consultative workshops (Senior, Middle and Top Management) [ ]
   - Other (please specify) ____________________________
10. If no in 8 above, which external parties are involved in developing the organization's business strategy? (Specify) ________________

11. How often does your organization review its business strategy? (Tick one)
   Once a year [ ]
   Twice a year [ ]
   Frequently [ ]

12. What are the sources of your organization's competitive advantage? (Tick all that apply).
   Cost leadership (Pricing) [ ]
   Focus (meeting specific customer needs) [ ]
   Speed. [ ]
   Innovation (delivery of unique services / product) [ ]
   Customer service .......... (Adaptability to change) [ ]

13. The following are environmental factors that influence your business strategy. Rank there from 1 – the most influencing factor to 5 – the least influencing one.
   Competition [ ]
   Changing Market / Customer needs [ ]
   Changing Technology (ICT) included [ ]
   Political / Legal factors [ ]
   Social / Cultural factors [ ]
   Economic conditions and Trading blanks [ ]
   Natural phenomena (e.g. weather [ ]
   Globalization [ ]

SECTION THREE: ICT Strategy

14. Does your company have a fully fledged ICT Department?
   Yes [ ]
   No [ ]
   Don’t know [ ]

15. If yes who Heads the Department? (Give title) ____________________________

16. To whom does the above named head (if any) report to? (Give title) ______________

17. Does your organization have an ICT strategy? (Tick)
   Yes [ ]
   No [ ]
18. Is your ICT strategy developed in-house? (Tick)
   Yes ☐
   No ☐
   Partly ☐
   Don’t know ☐

19. If no and partly 18 above which external parties are involved in developing the organization’s ICT strategy? (Specify) ____________________________

20. Who in the organization are involved in the development of the organization’s ICT strategy? (Tick all that apply)
   IT strategy Board committee ☐
   CEO ☐
   Senior management ☐
   IT management ☐
   Other (specify) ☐

21. What is the organization’s ICT strategy planning period?
   1 yrs ☐
   3 yrs ☐
   5 yrs ☐
   Over 5 yrs ☐

22. How often is the ICT strategy reviewed? (Tick)
   Once a year ☐
   Twice a year ☐
   Quarterly ☐
   Frequently ☐
   Never ☐

23. What IT systems does your organization have? (Tick the ones that apply)
   Communication (e mail, Internet site etc) ☐
   Human Resources Management Systems ☐
   Financial system ☐
   Customer Relationship Management system ☐
   Others (Please Specify) ☐
24. Are the ICT systems in your organization integrated or linked with each other? (Tick)
   Yes ☐
   No ☐
   Don’t know ☐

25. Is any of your organization’s ICT system integrated or linked with your customers or suppliers? (Tick)
   Yes ☐
   No ☐
   Don’t know ☐
SECTION FOUR: Strategic Role of Information Communication Technology in the Organization.

Indicate the extent to which your organization uses ICT for each of the strategic roles described. (Tick as appropriate)

<table>
<thead>
<tr>
<th></th>
<th>Not at all</th>
<th>Very little extent</th>
<th>Moderate extent</th>
<th>Great extent</th>
<th>Very Great extent</th>
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</thead>
<tbody>
<tr>
<td>26</td>
<td>ICT is very involved in the development of business strategy</td>
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<tr>
<td>27</td>
<td>ICT has been used as an effective tool in marketing</td>
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<td>28</td>
<td>ICT has enabled the organization to offer electronic services to customers</td>
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<td>29</td>
<td>The organization has used ICT to attract customers by offering services cheaply</td>
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<tr>
<td>30</td>
<td>The organization has used ICT to expand its markets</td>
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<tr>
<td>31</td>
<td>ICT has supported product differentiation strategy by adding value and quality</td>
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<tr>
<td>32</td>
<td>ICT has enabled provision of better customer service / product information</td>
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<td>33</td>
<td>The organization has utilized ICT to provide customers with reliable service, quick response to their questions and additional products</td>
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<td>34</td>
<td>The organization has utilized ICT to achieve market specialization – concentrating on a particular market/product niche</td>
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<td>35</td>
<td>The organization has utilized ICT to market it’s new products and services in an existing networks</td>
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<tr>
<td>35</td>
<td>ICT has created strong and profitable linkages with suppliers and customers</td>
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<td>36</td>
<td>ICT has formed the basis for the organization to enter into strategic alliances</td>
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<tr>
<td>37</td>
<td>ICT has greatly transformed value chain leading to efficiency in service delivery</td>
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</tbody>
</table>

38. Specify any strategic role of ICT in your organization:

____________________________________________________________________________________
SECTION FIVE: Current Challenges Faced by Microfinance Institutions on ICT

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<tr>
<th></th>
<th></th>
<th>Not at all</th>
<th>Very little extent</th>
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<th>Very Great extent</th>
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<tbody>
<tr>
<td>39</td>
<td>High cost structures in implementing ICT</td>
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<td>40</td>
<td>Many organizations cannot attract high caliber ICT staff in terms of competitive salary.</td>
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<td>41</td>
<td>ICT solutions are not adequately meeting their needs.</td>
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<td>42</td>
<td>Organizations struggle with the nature and pace of change.</td>
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<td>43</td>
<td>Poor vendor relationship. Vendors have been able to over-promise and under-deliver in their relationships</td>
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<td>44</td>
<td>There are high expectations of ICT.</td>
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<td>45</td>
<td>Regulatory barriers can constrain ability to implement strategic ICT solutions.</td>
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<td>46</td>
<td>Vested interest in terms of infrastructure and shared solutions. Unwillingness to share.</td>
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</tbody>
</table>

52. Other challenges (specify):

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Thank you for taking time to complete this questionnaire.
LIST OF MICRO FINANCE INSTITUTIONS

1). AAR Credit Services
2). ADOK Timo
3). Agakhan Foundation.
4). BIMAS
5). CIC Insurance
6). Co-op Bank
7). Crossbridge
8). ECLOF
9). Elite Microfinance
10). Equity Bank
11). Faulu Kenya
12). Jamii Bora
13). Jitegemee Credit Ltd
14). Jitegemee Trust Ltd
15). KADET
16). Kenya Gatsby Trust
17). KWFT
18). K-rep Bank
19). K-rep Development Agency
20). SUNLINK
21). Micro Africa Ltd
22). Milenia Multipurpose Society
23). Oiko Credit
24). Plan International
25). Post Bank
26). Pride Ltd
27). SISDO
28). SMEP
29). SNV
30). WEDCO
31). WEEC
32). Fusion Capital Limited
33). Yehu Enterprises