

**THE EFFECT OF AUTOMATED TELLER MACHINE (ATM) SERVICE ON
CUSTOMER SATISFACTION IN THE TANZANIAN BANKING SECTOR**

**THE CASE STUDY OF NATIONAL MICROFINANCE BANK (NMB),
IFAKARA BRANCH**

By

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**A Dissertation submitted in Partial/ Fulfilment of the Requirements for the award of
Master's Degree of Science in Accounting and Finance of Mzumbe University**

2013

CERTIFICATION

We, the undersigned, certify that we have read and hereby recommend for acceptance by the Mzumbe University, a dissertation entitled The Effect of Automated Teller Machine (ATM) Service on Customer Satisfaction in the Tanzanian Banking Sector: The Case Study of NMB Ifakara Branch, in partial/fulfilment of the requirements for award of the degree of Master of Science in Accounting and Finance of Mzumbe University.

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DEDICATION

This study is dedicated to my lovely son Victor Joseph Tillya. His patience has enabled me to complete my studies successfully.

ABBREVIATIONS

ATM	-----	Automated Teller Machine
CPU	-----	Central Processing Unit
ICT	-----	Information and Communication Technology
NMB	-----	National Microfinance Bank
PIN	-----	Personal Identification Number
SPSS	-----	Statistical Package for Social Sciences

ABSTRACT

This study was carried out to assess the effect of ATM on Customer Satisfaction in the Tanzanian Banking Sector. NMB Ifakara Branch was selected as the case study for the study.

Samples of 96 ATM users of NMB Ifakara Branch were selected. Data were collected using semi-structured questionnaires and they were organized, coded and analyzed using Statistical Package for Social Sciences (SPSS) version 20.0 for windows. Results were presented in tabular form with frequencies and percentages. Regression analysis was also done using dependent variable (customer satisfaction) and independent variables (reliability, security, safety, accuracy, and convenience).

The findings show that many respondents are aware of the presence of ATM services and they hold account and ATM cards with NMB Ifakara Branch.

The findings further show that interviewed respondents rated the services offered by an ATM to be effective with withdrawal as the main service offered by ATM, followed by checking of balances/recharge service.

From regression analysis respondents showed that they are satisfied with services offered by the Bank in terms of reliability, security, safety, and accuracy. However, they are not satisfied in terms of the ceiling of the amount of money to be withdrawn from the ATM per day and the number of ATMs installed and they regard it as a hindrance to the effectiveness of the ATM service delivery especially at the end of the month when customers spend a long time in queue waiting to access service.

TABLE OF CONTENTS

CERTIFICATION	i
DECLARATION	ii
COPYRIGHT.....	iii
ACKNOWLEDGEMENT	iv
DEDICATION	v
ABBREVIATIONS	vi
ABSTRACT.....	vii
TABLE OF CONTENTS.....	viii
LIST OF TABLES.....	xii
CHAPTER ONE	1
1.0 Introduction.....	1
1.1 Background to the study	1
1.2 Problem Statement	3
1.3 Purpose of the Study	5
1.4 The Specific Objectiveswere	5
1.5 Research Questions were	5
1.6 Scope of the Study	5
1.6.1 Geographical Scope	5
1.6.2 Time Scope	6
1.7 Significance of the Study	6
CHAPTER TWO	7
2.0 LITERATURE REVIEW	7
2.1 Introduction.....	7
2.2 The Concept of ATM.....	7
2.2.1 Evolution of ATM	7
2.2.2 Operation of ATM	8
2.2.3 ATM services.....	8

2.2.4 Importance of ATM	9
2.3 Effectiveness of ATM.....	10
2.4 The Concept of Customer Satisfaction	11
2.4.1 Measuring customer satisfaction.....	12
2.4.2 Who is a customer?.....	12
2.4.3 Importance of customer satisfaction	12
2.4.4 ATM services and customer satisfaction	13
2.4.5 Conceptual framework for ATM services and Customer Satisfaction.....	15
2.4.6. Operationalization of variables	16
CHAPTER THREE	16
3.0 RESEARCH METHODOLOGY.....	17
3.1 Introduction.....	17
3.2 Research Design.....	17
3.3 Area of Study	17
3.4 Population	17
3.5 Sample Size and selection methods	18
3.6 Data Collection Tools/ Methods	18
3.7 Data Management	18
3.7.1 Data Processing.....	18
3.7.2 Data Analysis.....	18
3.7.3 Variable Scope	18
CHAPTER FOUR.....	19
4.0 PRESENTATION OF FINDINGS	19
4.1 Introduction.....	19
4.2 Data preparation.....	19
4.3 Preliminary data analysis	19

4.3.1 Characteristics of the respondents	19
Table 1: Gender of respondents	20
4.3.2 Occupation of respondents	20
Table 2: Occupation of respondents.....	20
4.3.3 Respondent's banking background characteristics	21
Table 3: Respondent's banking background characteristics	21
4.3.4 Services offered by ATM.....	21
Table 4: Percentage distribution of respondents by services offered by ATM.....	22
4.3.5 Effectiveness of ATM services.....	22
Table 5: Percentage distribution of respondents by rating of the ATM services	24
Table 6: The time spent in the queue before accessing ATM service.....	25
Table 7: Problems experienced by customers when accessing ATM services	26
4.3.6 Relationship between ATM services and customer satisfaction.....	26
Table 8.Level of satisfaction of customers receiving ATM services.....	28
4.3.7 Regression analysis results.....	29
Table 9: Regression analysis result	29
Table 10: Model summary	30
CHAPTER FIVE	31
5.0 DISCUSSION OF RESEARCH FINDINGS	31
5.1 Introduction.....	31
5.2 Discussion of the results for the four specific objectives.....	31
5.2.1 Examination of ATM services offered by NMB Ifakara Branch.....	31
5.2.2 Examination of the effect of ATM services to customer satisfaction	31
5.2.3 Studying the problems faced by customers while using ATM services.....	32
5.2.4 Analysis of the relationship between customer satisfaction and ATM services	32
CHAPTER SIX.....	34
6.0 SUMMARY, CONCLUSIONS AND RECOMMENDATIONS	34
6.1 Introduction.....	34
6.2 Summary of findings.....	34

6.3 Conclusion	35
6.4Recommendations.....	35
REFERENCES	37
APENDICES.....	41
QUESTIONNAIRE	42
Part I Biodata	42
Part II Background Information	42
Part III Services offered by ATM.....	43
Part IV Effectiveness of ATM Services	43

LIST OF TABLES

Table 1: Gender of respondents	20
Table 2: Occupation of respondents.....	20
Table 3: Respondent's banking background characteristics	21
Table 4: Percentage distribution of respondents by services offered by ATM.....	22
Table 5: Percentage distribution of respondents by rating of the ATM services.....	24
Table 6: The time spent in the queue before accessing ATM service	25
Table 7: Problems experienced by customers when accessing ATM services	26
Table 8. Level of satisfaction of customers receiving ATM services.....	28
Table 9: Regression analysis result	29
Table 10: Model summary	30

CHAPTER ONE

1.0 Introduction

This chapter covers the background information on the Automated Teller Machine (ATM) and its effects on customers` satisfaction. It offers a snapshot of what an ATM is its history in the world, how it works and some problems associated with the use of ATM in banking services.

1.1 Background to the study

In banking industry, e-services are revolutionizing the way business is conducted. Electronic based business models are replacing conventional banking system and most banks are rethinking business process designs and customer relationship management strategies. It is also known as e-banking, online banking which provides various alternative e-channels to using banking services i.e. ATM, credit card, debit card, internet banking, mobile banking, electronic fund transfer, electronic clearing services etc. however, as per Tanzanian e-banking scenario ATM and mobile banking are most acknowledged than other e-channels(Singh and Komal, 2009).

Automated Teller Machine (ATM) refers to a machine that acts as a bank teller by receiving and issuing money to and from the ATM account holders/users (Singh, 2009). ATM means neither “avoids traveling with money” nor “any time money,” but certainly implies both (Singh and Komal, 2009). ATM cards are fast replacing confounding withdrawal forms as a convenient way of getting your money from banks. In a way, they are rewriting the rules of financial transaction. A smart person no longer needs to carry a wallet-full of paper money; rather, what he/she needs to do is to fish out an Automated Teller Machine (ATM) card from his/her pocket, insert it in the slot of the machine, punch in a few details and go home with hard cash (Singh and Komal, 2009).

The history of ATM can be traced back to the 1960s, when John Shepherd-Barron who was managing director of De La Rue Instruments invented the first ATM machine. That machine used by Barclays Bank (Barclays Bank in Enfield Town in North London, United Kingdom) on 27 June 1967 (Anderson, 1993).

ATM is designed to perform the most important function of bank. The plastic card is replacing cheque, personal attendance of the customer, banking hour's restrictions and paper based verification. ATMs are used as springboard for Electronic Fund Transfer. ATM itself can provide information about customers account and also receive instructions from customers - ATM cardholders. An ATM is an Electronic Fund Transfer terminal capable of handling cash deposits, transfer between accounts, balance enquiries, cash withdrawals and pay bills (Hood, 1976).

In many parts of the world the majority of bank customers regularly use Automatic Teller Machines (ATMs) and today's western youth have not known a world without them. For them, the prevailing Perception of a cash machine is that of a tool providing a familiar functionality of basic financial information and dispensing cash. The technology is hidden from sight; the computer is invisible. It has taken approximately 30 years to establish ATMs as ubiquitous examples of public walk-up-and-use devices. The adoption has not been straightforward, requiring trust in the technology and willingness to modify behavioral strategies in the very sensitive domain of personal finance. Financial institutions have played a major, sometime coercive, role in encouraging ATM adoption. The ATM flourishes within societies where time is precious and money readily available. This culture is composed of individuals, who have personal bank accounts and access to a wide range of technology. For these individuals, ATMs are convenient and reliable everyday artifacts: push a few buttons and get the money. As ATMs cross-new borders and pervade different cultures, it is imperative to understand the role of cultural characteristics on people's Perception of, attitudes towards, and action on, the machine. This understanding is instrumental in facilitating technology uptake and improving design localization, or the process of infusing a specific cultural context into products designed for different cultures (Anderson, 1993).

In Africa, ATMs are being introduced for the first time and we must understand the new users who live within a culture, which may bring new factors into the adoption curve. It concentrates on urban Africa but the approach can be generalized to cover other public (and personal) technologies, as well as other developing markets.

African Banking industry is witnessing an unprecedented competition. To stay ahead, banks are coming up with plethora of services to lure customers. Services like 24 hour banking, service at door step, telephone banking, internet banking, Extended Business Hours (EBH), speedy processing are only a few to mention. Greater part of today's bank transactions take place somewhere else other than in branch premises (Krishna and Rao, 2006).

Though, the aim of these services is to satisfy customers, there is a need to understand customer awareness, Perception and importantly the level of satisfaction. Efforts are directed to attract and retain customers by offering them a basket of tailor made schemes supported by a state of the art distribution system (the ATMs). The whole exercise is helping banks to serve their customers fast and avoid human intervention totally. And for the customers, ATMs offer hassle-free cash withdrawal. No more fighting with the bank's teller for change and fresh notes. The total cash movement through ATMs in Africa is already between Millions of shillings (local currency) every year. In future, things are going to be even more different and challenging. The ATM has become a medium for non-cash transactions such as payment of bills, insurance payments, printing of statements or even accessing the internet (Krishna and Rao, 2006).

Tanzania banking sector has adopted the use of ATM in offering services. National Microfinance Bank (NMB) Ifakara branch introduced ATM services in 2009, and now customers are accessing the service.

1.2 Problem Statement

The use of ATM is a new way of accessing banking services necessitated by customers' business needs and is enabled by fast changing technology like Internet. Due to achievements brought about by increased utilization of Information and Communication Technology (ICT) in society, the banking industry has introduced ATM. ATMs provide a new method of dispensing customer services which are expected to increase efficiency, sales performance, and enhance customer satisfaction (Mboma, 2011).

In many parts of the world the majority of bank customers regularly use Automatic Teller Machines (ATMs) and today's western youth have not known a world without them. For them, the prevailing Perception of a cash machine is that of a tool providing a familiar functionality of basic financial information and dispensing cash. The technology is hidden from sight; the computer is invisible. It has taken approximately 30 years to establish ATMs as ubiquitous examples of public walk-up-and-use devices (Hood, 1979).

The adoption has not been straightforward, requiring trust in the technology and willingness to modify behavioural strategies in the very sensitive domain of personal finance. Financial institutions have played a major, sometime coercive, role in encouraging ATM adoption. The ATM flourishes within societies where time is precious and money readily available. This culture is composed of individuals, who have personal bank accounts and access to a wide range of technology. For these individuals, ATMs are convenient and reliable everyday artifacts: push a few buttons and get the money. As ATMs cross new borders and pervade different cultures, it is imperative to understand the role of cultural characteristics on people's Perception of, attitudes towards, and action on the machine (Dabholka and Pratibha, 1994). In a nutshell, ATM is very important worldwide in that it facilitates Provision of mini bank statement, Cash withdrawal, Cash deposit, Transfer of funds from one account to another, Balance enquiry, Purchase of some utilities like electricity and fuel, Bill payments, and no need to carry a large amount of cash (Pandian and Sharma, 2012).

The review of literatures suggest that most of the studies on the effect of ATM in providing bank services and customer satisfaction have been done in countries like USA, UK, Malaysia, Singapore, Finland, and Australia (Gerrard and Cunningham, 2006). However, no sufficient work has been done in Tanzania with regard to ATM services and customer satisfaction issues. It is therefore against this background that the researcher was prompted to investigate and find out the effect of ATM services and customers' satisfaction in NMB Ifakara Branch.

In NMB Ifakara branch the ATM services were introduced in 2009 and it is one of the best services offered by the bank, which offers a convenient way to customers to avoid frustrating queues in banks.

1.3 Purpose of the Study

The purpose of the study was to obtain information on the effect of ATM system to customer satisfaction in Tanzanian banking sector

1.4 The Specific Objectives were

- i. To examine services offered by ATM at NMB Ifakara Branch
- ii. To examine the effectiveness of ATM services
- iii. To study the problems faced by customers while using ATM services offered by NMB Ifakara branch
- iv. To analyze the satisfaction level of customers towards ATM services in NMB Ifakara branch

1.5 Research Questions were

- i. What are the services offered by ATM of NMB Ifakara Branch?
- ii. How effective are the services provided by ATM to account holders of NMB Ifakara Branch?
- iii. What are the problems faced by customers while using ATM services offered by NMB Ifakara Branch?
- iv. To what extent are customers satisfied with ATM services offered by NMB Ifakara Branch?

1.6 Scope of the Study

1.6.1 Geographical Scope

The study was conducted at NMB Ifakara Branch and its ATM service point located within the same District. The researcher decided to carry out the study in the branch because of the ever-long queue at the bank's ATM service point day in day out but worst at the end of the month.

1.6.2 Time Scope

The study looked at how the ATM system of banking has been providing quality services in relation to customers' expectations from the period 2009 to April 2013.

1.7 Significance of the Study

- i. The findings of the study will help NMB as well as the banking industry by showing how quality services offered by ATM service points are essential
- ii. The conclusions and recommendations of the study will be used to help the banking industry in the identification of the weaknesses in the use of ATM system of banking on the ways of improving its services
- iii. This study can also be of great importance to future scholars who will pursue research in fields related to ATM system of banking and service satisfaction
- iv. The study will also be used as a partial fulfilment for the awards of a master's degree

CHAPTER TWO

2.0 LITERATURE REVIEW

2.1 Introduction

This chapter reviews the available literatures written on the effect of Automated Teller Machine (ATM) service on customer satisfaction in the Tanzanian banking sector. It comprises of the concept of ATM, evolution of ATM, operation of ATM, ATM services, importance of ATM, effectiveness of ATM, the concept of customer satisfaction, measuring customer satisfaction, who is a customer?, importance of customer satisfaction, ATM services and customer satisfaction and conceptual framework for ATM and customer satisfaction. This has been made possible by the identification, collection and review of the literatures from various sources such as textbooks, journals, reports and materials from the internet.

2.2 The Concept of ATM

ATM is typically made up of the Central Processing Unit (CPU) for controlling the user interface and transaction devices, magnetic or Chip card reader for identifying the customer, display which is used by the customer for performing the transaction, function buttons usually close to the display or a Touch screen used to select the various aspects of the transaction and a record printer which provides the customer with a record of a transaction (Cronin, 1997).

Most ATMs are connected to interbank networks, enabling people to withdraw and deposit money from machines not belonging to the bank where they have their account or in the country where their accounts are held thus enabling cash withdrawals in local currency (Maxwell, 1990), and they are often identified by signs above them indicating the name of the bank owning them.

2.2.1 Evolution of ATM

ATM is said to have evolved from early cash dispenser and is said to have first been introduced in the early 1970s. The dispensers were operated by a token in form of a punch card. This enabled a customer to withdraw as sachets of suitable values of bank notes. These sachets processed and then returned the card to the customers.

Another source has it that ATM concept was started around 1967, and that it was first installed in Endfield town, on the London Borough of Endfield by Barclays Bank (Thomas, 1996). This is said to have been accredited to John Shepherded Baron, although George Simon registered patent in New York and Don Wetzel and two other Engineers from Docatel Company also registered patent in April 1973 (Brendan, 1996). In the second generation, it was improved to the extent that made it possible to count proved money.

2.2.2 Operation of ATM

ATMs typically connect directly to their ATM Controller via either a dial-up modem over a telephone line or directly via a leased line. Leased lines are preferable because they require less time to establish a connection (Musiime and Biyaki, 2010). It is observed that, most modern ATMs, the customer are identified by inserting a plastic ATM card with a magnetic stripe or a plastic smartcard with a chip that contains a unique card number. Security is provided by the customer entering a Personal Identification Number (PIN). For one to access ATM service, he/ she (the card holder) has to insert the card (magnetic stripe card) into the machine (ATM), which then reads the stripe and makes contact with the central computer to confirm the validity of the card which is either accepted or rejected depending on whether it is valid or not. When accepted, the customer then punches his/ her PIN number, which is then verified according to its compatibility with the information stored in the card. After which it then performs the service requested of like (issuing cash, accepting cash/ cheque deposit, balance enquiry, mini-statement) etc., and finally ejects the card.

2.2.3 ATM services

Worldwide, ATMs have made it easy for ATM users to get some bank services out of bank offices which *inter alia* include provision of mini bank statement, cash withdrawal, cash deposit, transfer of funds from one account to another, balance enquiry, purchase of some utilities like electricity and air time, bill payments, and tax payments.

2.2.4 Importance of ATM

Today ATM machine is just like a boon for everyone. This is one of the best services provided by the banking industry to every one having an account in a bank (Akrani, 2011). Actually, ATM provides 24 hours service, meaning that ATMs provide service around the clock. The customer can withdraw cash up to a certain limit during any time of the day or night (Akrani, 2011).

ATM gives convenience to bank`s customers, which means that now a days, ATMs are located at convenient places, such as at the air ports, railway stations, universities, bus stands, hotels, supermarkets, petrol stations, and not necessarily at the bank`s premises. He further argued that it is to be noted that ATMs are installed off site (away from bank premises) as well as on site (installed within bank`s premises) (Lovelock, 2011).

ATMs provide mobility in banking services for withdrawal. Meaning that ATM reduces the workload of bank`s staff – ATMs reduce the work pressure on bank`s staff and avoid queues in bank premises (Lovelock, 2011).

ATM provides service without any error – The customer can obtain exact amount. There is no human error as far as ATMs are concerned (Pandian and Sharma, 2011).

ATM is very beneficial to travellers – ATMs are of great help to travellers. They need not to carry large amount of cash with them. They can withdraw cash from any city across the country and even from outside the country with the help of ATM (Khan, 2010).

ATM may give customers new currency notes – the customer also gets brand new currency notes from ATMs. In other words, customers do not get soiled notes from ATMs (Khan, 2010).

ATM provides privacy in banking transactions of the customer – most of all; ATMs provide privacy in banking transactions of the customer (Steve, 2012).

Steve (2012) posits that ATM is convenient, enables people to withdraw money any time, allows people to make purchases and enables them to pay bills.

Steve further argues that, a major advantage of an ATM is that it allows the user to access money at any time. In addition to withdrawing money, an ATM offers other banking services. With an ATM, the user can readily move funds between accounts at the same bank or deposit checks at any time of day. ATMs also allow patrons to conduct balance inquiries. By using an ATM, the user can find out how much money is in the account without wasting time on hold or waiting in line at the bank.

Utility bills can be paid through ATMs. ATM patrons can register their water, electric, and phone accounts with their bank. Then, users can view utility bills at an ATM and have their monthly charges deducted from their bank account. Patrons are able to get a receipt showing their utility bill has been paid from an ATM (Lovelock, 2011).

ATMs do not just dispense money. Using their ATM cards, patrons can also purchase stamps, phone cards, train tickets, and even financial products such as stocks at bank machines. Payments are facilitated through a person's bank account (Khan, 2010).

Pandianand Sharma (2012) said that in this modern world where money plays an important role for survival, ATM helps the people to take money whenever needed by them.

Tuli, KhatriandYadav (2012) analyzed that most important factor which influences customer to use the ATM services is its convenience in use and availability of machines.

2.3 Effectiveness of ATM

Without usage of technology the banking sector cannot provide customers with effective services (Patricioet al., 2003). Effective service delivery is significantly improved service concept that is taken into practice (Drake, 2001). Customer

expectations concerning service encounter experiences and service delivery mechanisms as well as the entire concept of what constitutes quality service are therefore key issues that need to be considered prior to the implementation of any structural change (Patricio *et al.*, 2003). Effective service delivery is a service product or service process that is based on some technology or systematic method. It can be a new customer interaction channel, a distribution system or a technological concept or a combination of them (Kelley *et al.*, 1990). Kumbhar (2011) observed that effectiveness of service provision have a significant relationship with overall customer satisfaction. Effective service delivery is positively related to customer satisfaction in that, when a customer perceives that the delivery mode of the transactions that the bank is supposed to offer is quite good, the more the customers will be satisfied with the bank services.

2.4 The Concept of Customer Satisfaction

Cacioppo (2000) defines customer satisfaction as the state of mind that customers have about a company when their expectations have been met or exceeded over the lifetime of the product or service as quoted by Malcolm (2008). Increased customer expectations have created a competitive climate whereby the quality of the relationship between the customer and bank has taken on a greater significance in some cases than the product itself. (Biyaki, 2010). Krishnan *et al* (1999) point out that, the banking industry strives to succeed by putting the topic of rapid and changing customers' needs to their agenda. This can be achieved through good customer care and offering attractive services or products that other competitors may not offer. Therefore, customer satisfaction is seen as a key performance indicator within a business. The concept of customer satisfaction occupies a central position in marketing and practice (Cardozo, 1965). Customer satisfaction is a person's feelings of pleasure or disappointment resulting from comparing a product's perceived performance or outcome in relation to his or her expectations. (Musiime and Biyaki, 2010). In a nutshell, customer satisfaction is the actual meeting of customer's expectation after he or she has completed consuming a product or service.

2.4.1 Measuring customer satisfaction

In service provision, there are some factors, which are considered by customers as a benchmark for appreciating a service being offered (Ramora and Sundaram, 2012). With regard to ATM, Ramora and Sundaram (2012) mentioned a list of factors considered by customers as important for their service satisfaction. Such factors include tangibility, reliability, convenience, assurance, accuracy, safety, ease of use, and responsiveness.

They posited that, each of these factors is very important for customer satisfaction for the service being provided. The service should be reliable, in that the service has to be available every time the customer needs it. The service should be user friendly, meaning that a customer will be loyal to the service he/she is able to use with ease. Customers are satisfied when the service they are receiving is executed accurately, and they are always sensitive to their safety when receiving any service of their choice.

2.4.2 Who is a customer?

A customer is the most important visitor on business premises. The customer is not dependent on us. The customer is not an interruption to our work. The customer is the purpose for it. The customer is not an outsider on our business rather the customer is part of it, we are not doing him/her a favour by serving the customer rather he/she is doing us a favour by giving us an opportunity to do so. Wasswa, (2003) further describes a customer, as one that enables the organization to exist.

In my own view, I believe that, customers are the heart; the life and the soul of our businesses, without whom we can't hold even for a second the existence of our business. Hence they should be accorded utmost respect and care when rendering service to them. In a nutshell, a customer is a person or organization that consumes the product or service of a company or business.

2.4.3 Importance of customer satisfaction

Khirallah (2005) defines customer satisfaction as; a customer's Perception that his or her needs, wishes, expectations, or desires with regard to products and service has been fulfilled. Consumer satisfaction in short can therefore be defined as an

evaluative process that contrasts pre-purchase expectations with the actual Perceptions of performance during and after consumption experience. The outcomes of satisfying a customer are:

(i) Customer loyalty-loyal customers are those who have the enthusiasm about the brands or products they use. The more enthusiastic a customer is, the higher the profit contributed to the brand (Malcolm, 2008). Musiime and Biyaki (2010) define loyalty as a combination of intentional repurchase behaviour and psychological attachments of a customer to a particular service provider. The fundamental assumption of all the loyalty models is that keeping existing customers is less expensive than acquiring new ones. In summary, loyalty is customer's demonstration of faithful adherence to an institution despite the occasional errors. Thus satisfying a customer is of very paramount importance to organizational existence.

(ii) Customer retention-customer retention is the ability to hold on to customers over time. Joseph and Stone (2003) define customer retention as the activity that the selling organization undertakes to reduce customer account defections. It can also be described as a series of actions that the selling organization undertakes to reduce defections. Ganesh et al (2000) observed that long-term customers become less costly to serve due to the bank's greater knowledge of the existing customer and to decrease serving costs. They also tend to be less sensitive to comparative marketing activities (Czepiel, 1990). Losing customers not only leads to opportunity costs because of the reduced sales, but also to an increased need for attracting new customers which is five to six times more expensive than customer retention (Joseph and Stone, 2003).

2.4.4 ATM services and customer satisfaction

Recent advances in technology have created a surge in "technology-based self-service" (Dabholkar *et al*, 2003). Literature related to customer satisfaction and ATM services are reviewed and explained under this section.

Oliver (1997) defines customer satisfaction, as “Satisfaction is the customer’s fulfilled response. It is a judgment that a product or service feature, or the product or service itself, provides a pleasurable level of consumption-related fulfilment”.

Yi (1990) in his study titled ‘A Critical Review of Consumer Satisfaction’ stated that customer satisfaction is a collective outcome of Perception, evaluation and psychological reactions to the consumption experience with a product and also states that many studies found that customer satisfaction influences purchase intentions as well as post-purchase attitude.

Edosomwan (1993) says in his book that ‘a satisfied customer will recommend excellent products and services to their friends and help the enterprise to increase its market share and profitability’.

Davies et al., (1996) examined the factors that influence customers’ satisfaction on ATM services includes costs involved, and the efficient functioning of ATM. Anderson *et al* (1976) and Laroche (1988), the researchers of customer satisfaction said that the bank’s ability to deliver the factors like convenience and accessibility will probably impact on customer satisfaction.

Moutinho (1992) argued that ATM facility resulted in speed of transactions and saved time for customers. Lovelock (2000) identified that secured and convenient location; adequate number of ATMs, user-friendly system, and functionality of ATM are the important factors for the customer satisfaction.

Based on the prior studies, Al-Hawari *et al* (2006) compiled a list of five major items about ATM service quality that include convenient and secured locations, functions of ATM, adequate number of machines and user-friendliness of the systems and procedures. Most early studies found location convenience influences most on bank selection (Kaynak and Kucukemiroglu, 1992).

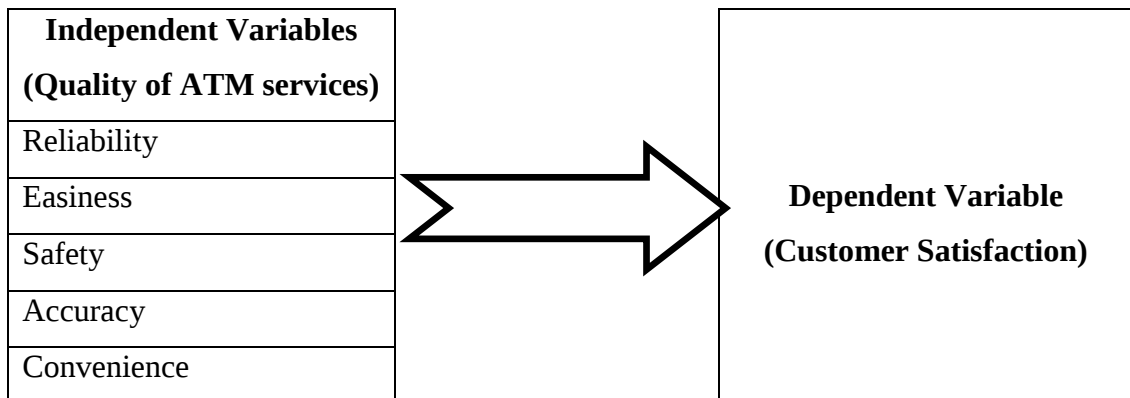
Khan (2010) said that the key dimensions of automated banking service quality include reliability, ease of use, privacy, convenience and responsiveness. Wolfinbarger and Gilly, (2003) argue that reliability is the strongest predictor of customer satisfaction. Much of the researches say that there is an association between customers' usage pattern and the demographic profiles. (Hood, 1979, Murphy, 1983). Bimbhit (2008) in his study on "Technology led customer service" has found that the customers would expect security of money, growth, safety and respectful listening from their banks. ATMs are used no longer for dispensing money only but also offer more information and services. In Customer Relationship Management in Banking Sector. Sarangapani and Mamatha (2008) found that the introduction of ATMs, Internet banking and Credit cards help the customers to carry out their transaction in an easy way. ATM helps the customers to transact within a short time. Malavizhi (2011) mentioned that age is the main factor that determines ATM services in Coimbatore City.

Many studies had investigated the effects of demographic profile such as age, educational qualification, sex on the customers' attitude towards the acceptance of the new technologies (Al Somali *et al*, 2008). The research on the relationship among young people and financial institution established that these people have their accounts in more than one bank, because of need for convenience, requirement of more services offered, and 24- hours' availability of ATM and location. Initially they were required to focus more on Perception of a customer, whether he is willing to adopt the technology or not (Dabholkar and Pratibha, 1994). It has been established through research that customer's response to a specific technology depends upon the service quality that is provided (Parasuraman, Zeithmal, and Berry, 1994).

2.4.5 Conceptual framework for ATM services and Customer Satisfaction

Customer satisfaction (dependent variable) depends on independent variables (the quality of ATM services which include reliability, security, accuracy, safety, and convenience). Therefore, customer satisfaction is dependent on quality of ATM services such as reliability, security, accuracy, safety and convenience as shown in figure 1 below.

Figure 1: Conceptual Framework for ATM services and Customer Satisfaction



Source: Own conceptualization

2.4.6. Operationalization of variables

The conceptual framework in figure 1 above shows the quality of ATM service is the independent variable, while customer satisfaction is the dependent variable

Independent variable (Quality of ATM services) is measured by obtaining information's on the respond of a customer/respondent who received or utilizing the service using factors such as safety, accuracy, convenience, reliability and easiness in solving customers banking problems.

On the other hand the Dependent variable (customer satisfaction) is measured by the customer/respondent providing their inner fillings on how the service fulfilling their expectations through the service they are using (ATM services) using factors like less or no customer complaints about ATM services offered by NMB Ifakara Branch.

CHAPTER THREE

3.0 RESEARCH METHODOLOGY

3.1 Introduction

This chapter explores the methods to use in data collection and their justifications. It covers research design, area of study, population, sample size and selection methods, data collection tools and methods, data management, data processing, data analysis and variable scope.

3.2 Research Design

Introduction

A research design is a plan or strategy used to get the expected study results (Kothari, 2004). Research design is categorized into different types depending on the nature of the study, which includes case study design, survey design and experimental design. This study therefore, used direct interview, observation and review of available documents on the subject.

3.3 Area of Study

The study was carried out in Ifakara District at NMB Ifakara Branch, this is because it is the District where the researcher is working and using the service of the same NMB Ifakara and as a result he has a clue on the way the ATM services are delivered and as a result he wanted to know the reality from the customers of NMB Ifakara who are using the ATM services, not only that but also on the other hand it was economical for a researcher to conduct a research to a place where he is familiar with the geographical environment and logistics.

3.4 Population

The study only targeted ATM users. A non-probability sampling system specifically purposive sampling technique was used during the study. This is because the total number of population from which the sample was drawn was not known to the researcher. And the researcher targeted only those respondents who receive ATM services offered by NMB Ifakara Branch.

3.5 Sample Size and selection methods

A sample of 96ATM users of NMB Ifakara Branch was selected. The selection was done through purposive sampling technique.

3.6 Data Collection Tools/ Methods

The researcher used a structured questionnaire that was comprised of different questions to be administered directly to respondents. The questionnaire had different sections, ranging from the Biodata of the respondents to questions that helped the researcher collect information/data about the subject at hand. There was a face-to-face interview between the interviewer (researcher) and interviewee (respondent).

3.7 Data Management

The data was assembled through the means of administering questionnaire (Primary data) to customers of NMB Ifakara Branch. A personal visit to different offices where some respondents (employees) are working was done to get the information about ATM services. Others were interviewed at the scene of the ATM.

3.7.1 Data Processing

Data were processed with the help of the Statistical Package for Social sciences (SPSS 20.0 for windows).

3.7.2 Data Analysis

After the collection of data, the researcher edited and coded the questionnaires. This done to determine the response rate, qualitative and quantitative form of analysis. The data were calculated and converted into frequency tables.

3.7.3 Variable Scope

The topic of the study was the effect of Automated Teller machine (ATM) to customer satisfaction. Here the effect of ATM services was the independent variable while customer satisfaction is the dependent variable.

CHAPTER FOUR

4.0 PRESENTATION OF FINDINGS

4.1 Introduction

This chapter includes data preparation, data editing and coding. It also has descriptive statistics, scale analysis, factor analysis, scale transformation and regression analysis.

4.2 Data preparation

Data preparation process started by making data editing, then coding, entering and finally analysis.

4.3 Preliminary data analysis

Out of 100 distributed questionnaires, a total of 96 or a response rate of 96% was returned. The strategy used to collect questionnaire was to interview the customers who came for ATM service at the point of ATM in the bank premises. The researcher also visited government offices where he managed to interview some respondents. The researcher interviewed these respondents physically and the questionnaires were immediately filled by either the researcher himself or the respondent.

4.3.1 Characteristics of the respondents

During the research at NMB Ifakara Branch, the researcher wanted to know the gender of the respondents who receive ATM services and at the bank, and the results were that out of 96 respondents interviewed, 60 respondents equivalent to 62.5% respondents were males while 36 equivalent to 37.5% respondents were females. This shows that both genders are customers of the NMB Ifakara Branch albeit in different degrees. This is an opportunity for the bank to encourage more women to open up accounts with the bank as many of them are engaged in informal businesses which are giving them incomes. If the bank capitalizes on women, it will make a significant profit because they are many in society and most of them are yet to open accounts with the bank. The results are as tabulated in table 1 below.

Table 1: Gender of respondents

Gender	Frequency	Percent
Male	60	62.5
Female	36	37.5
Total	96	100

Source: Field data, 2013

4.3.2 Occupation of respondents

During the research the researcher wanted to know the occupation being undertaken by the respondents who receive ATM services at NMB Ifakara Branch. The options were if the respondent is employed, business men or women, student or none of the above. The results show that out of 96 interviewed respondents, 72 respondents equivalent to 75% were employed, 17 respondents which is equivalent to 17.71% were business men or women and the remaining 7 respondents equivalent to 7.29% were students. No respondent who was not undertaking any business. The high percentage of employed people having accounts with NMB Bank is attributable to the fact that NMB is the only bank with at least one branch in each district council on one hand and most government employees receive their salaries through NMB on the other. The same explanation of strong network of NMB Bank is also applicable to business people especially those in rural areas who are engaged in agriculture sector. For the case of students, nowadays school fees are paid through banks and therefore, some students see it necessary to hold accounts with the bank to make it easy for them to receive school fees and pocket money despite the fact that M-Pesa, Tigo Pesa and Airtel Money are threats to the bank. However, the bank is addressing this threat by collaborating with Vodacom for example in money transactions. The results are as tabulated in table 2 below.

Table 2: Occupation of respondents

Occupation	Frequency	Percent
Employed	72	75.00
Business	17	17.71
Student	07	07.29
None	00	00.00
Total	96	100.00

Source: Field data, 2013

4.3.3 Respondent's banking background characteristics

This sub-section presents respondents' banking characteristics. The banking characteristics covered include possession of an account with the bank, awareness of the presence of ATM services, and possession of an ATM card by customers of NMB Ifakara Branch.

The researcher wanted to know if respondents hold accounts with NMB Ifakara Branch, if they are aware of the existence of ATM banking, and whether they possess the ATM cards. The results show that all 96 interviewed respondents possess an account with NMB Ifakara Branch, they are aware of the existence of ATM banking and they possess the ATM cards as shown in the table 3. However, the bank should be making sure that it retains all its customers by being always alert to improve the services it provides.

Table 3: Respondent's banking background characteristics

Banking characteristics	Yes	No
Possession of an account	96	00
Awareness of the existence of ATM banking	96	00
Possession of an ATM card	96	00

Source: Field data, 2013

4.3.4 Services offered by ATM

This sub-section presents the percentage distribution of respondents according to the services offered by the ATM and tries to find out whether these services are

satisfactory to the respondent or not.

With reference to table 4 below, most of the respondents identified withdrawal (39.58%) as the main service offered by ATM, followed by balance checking and recharge service (32.29%) like buying electricity tokens and recharge vouchers. Statement/mini-statement of account seemed to be among the services offered by the ATM (26.04%) in table 4. Some respondents expressed the concern that some services albeit important are not given the importance they deserve by the bank. Such services *inter alia* include cash/cheque deposit using ATM (2.08%).

The table further shows that services being offered by ATM Ifakara branch are not enough as expressed by 62.5% of interviewed respondents. They thought that more services should be added to improve the services offered. This is a wakeup call to the bank to make a research on what services should be added to the customer's satisfaction.

Table 4: Percentage distribution of respondents by services offered by ATM

Services offered by ATM	Frequency	Percent (%)
Withdrawal	38	39.58
Cash/Cheque deposit	02	2.08
Statement/Mini statement of account	25	26.04
Balances and Recharge services	31	32.29
Total	96	100.00
Are the services offered enough?	Frequency	Percent (%)
More than enough	01	01.04
Enough	25	26.04
Neutral	10	10.41
Not enough	60	62.50
Not enough at all	00	00.00
Total	96	100.00

Source: Field data, 2013

4.3.5 Effectiveness of ATM services

This sub-section presents the percentage distribution of respondents by how they rated the ATM services in terms of available functions/services offered, costs

associated with withdrawal, security of the respondent's money, safety using ATM and the time. Other variables the researcher considered included the time the respondent takes in the queue before accessing the ATM services, whether the respondent experienced any problems while using the ATM. Also the researcher tried to find out whether the bank had done anything to avert the problem(s). The results are as shown in the table 5 below.

According to Table 5 below, 41.67% of the respondents agree that services offered by ATM are effective, while 20.83% of the respondents were neutral, and 31.25% of the respondents see ATM services as ineffective. Withdrawal of money through the ATM being cheap also got more support (62.5%). The table further depicts that the majority of the respondents felt that their money was secure and many of them agree that the time spent in a queue was effective. This is due to the fact that ATM offers those (respondents) with most of what they require and to their expectation as per Khirallah (2005) definition of a customer satisfaction as a customer's Perception that his or her needs, wishes, expectations, or desires with regard to products and service have been fulfilled. About the security of their money, is attributable to the fact that ATM offers secret PIN codes which makes it easy to protect one's money safely. This is in line with the explanation that security is provided by the customer entering a personal identification number (PIN). Then lastly about convenience of time spent in the line, can be in comparison with the time they take in the line over the counter, that of ATM seems to be more satisfactory. All in all, respondents agree that ATM services are effective. However, more improvement needs to be done so as to satisfy the few others who were not in agreement so as to retain them.

Table 5: Percentage distribution of respondents by rating of the ATM services

Available services/functions offered by the ATM	Frequency	Percent (%)
Very effective	06	06.25
Effective	40	41.67
Neutral	20	20.83
Ineffective	30	31.25
Very ineffective	00	00.00
Total	96	100.00
Costs associated with deposit and withdrawal	Frequency	Percent (%)
Very costly	05	05.21
Costly	20	20.83
Neutral	11	11.46
Cheap	60	62.50
Very cheap	00	00.00
Total	96	100.00
Security of your money	Frequency	Percent (%)
Very secure	00	00.00
Secure	50	52.08
Moderate	25	26.04
Insecure	21	21.88
Very insecure	00	00.00
Total	96	100.00
Time	Frequency	Percent (%)
Very effective	00	00.00
Effective	60	62.50
Neutral	10	10.42
Ineffective	25	26.04
Very ineffective	01	01.04
Total	96	100.00

Source: Field data, 2013

Table 6 below shows that most of the respondents (63.54%) say they spend few minutes before accessing the ATM services. Those saying they spend a long time in a queue are very few (2.08%), and they attribute this to long queue at the end of the month when most government employees go for their salaries. This is an indicator that ATM services are quite fast, rather the challenge can be that the ATM points are

few that sometimes results in congestion at the end of the month and thus causing the delay to some people. Therefore, the bank should increase the number of ATMs to curb this challenge and let their customers be satisfied with the services they receive.

Table 6: The time spent in the queue before accessing ATM service

Time spent in a queue	Frequency	Percent (%)
0 – 5 minutes	61	63.54
6 – 10 minutes	24	25.00
11 – 15 minutes	09	09.38
16+ minutes	02	02.08
Total	96	100.00

Source: Field data, 2013

Table 7 below shows that respondents (75%) do experience problems while using the ATM with the commonest problem encountered being limited amount of money to be withdrawn per day (57.29%), followed by machine/network breakdown (26.04%), complication (11.46%) and card retention problem coming last. The table also indicates that the respondents experience such problems less often (52.08%). It further shows that majority of the respondents as saying the bank has tried to solve problems (53.12%) but the bank is yet to resolve completely all encountered problems (57.29%). This clearly shows that despite the occurrences of the problems with the ATM, it is not too rampant and it also indicates that the bank has keen interest in trying to resolve the problem(s) as and when they occur. In conclusion therefore, ATM service still has some shortcomings though it appears not so much with the bank coming in to try and resolve/avert the situation.

Table 7: Problems experienced by customers when accessing ATM services

Do you experience problems when using the ATM?	Frequency	Percent
Yes	72	75.00
No	24	25.00
Total	96	100.00
If yes, what type of problems do you face?	Frequency	Percent (%)
Network/machine breakdown	25	26.04
Complication	11	11.46
Limited amount of money to be withdrawn	55	57.29
Card retention	05	05.21
Total	96	100.00
How often do you experience such problems?	Frequency	Percent (%)
Very often	04	04.17
Often	22	22.91
Moderate	20	20.83
Less often	50	52.08
Not at all	00	04.17
Total	96	100.00
Has your bank done anything to avert such problems?	Frequency	Percent (%)
Yes	51	53.12
No	45	46.88
Total	96	100.00
If yes, did it solve all the problems encountered or not?	Frequency	Percent (%)
Yes	41	42.71
No	55	57.29
Total	96	100.00

Source: Field data, 2013

4.3.6 Relationship between ATM services and customer satisfaction

This sub-section shows the relationship between the ATM services and customer satisfaction. The variables considered by the researcher under ATM services were reliability, easiness, safety, accuracy, and the level of satisfaction of customers using the ATM services. The outcomes are presented in table 8. According to Table 8, most of the respondents (62.5%) agree that ATM services are reliable; and ATM is easy to

use, safe and accurate in offering its services. However, most of the respondents (62.5%) see ATM location not convenient for them and they are asking the bank to install other ATMs at different locations like Kibaoni, TAZARA, and Bethlehem and district hospital in Ifakara district. Therefore, ATM users of NMB Ifakara Branch are satisfied with the services offered by ATM only that they need more ATMs to be installed in other areas of Ifakara as well for convenience of the service.

Table 8. Level of satisfaction of customers receiving ATM services

How reliable ATM services are?	Frequency	Percentage
Very reliable	01	01.04
Reliable	60	62.50
Neutral	10	10.42
Not reliable	25	26.04
Not reliable at all	00	00.00
Total	96	100.00
How easy is it to use ATM in withdrawing money?	Frequency	Percent (%)
Very easy	01	01.04
Easy	60	62.50
Neutral	10	10.42
Not easy	25	26.04
Not easy at all	00	00.00
Total	96	100.00
How safe is the ATM?	Frequency	Percent (%)
Very safe	01	01.04
Safe	60	62.50
Neutral	09	09.38
Not safe	25	26.04
Not safe at all	01	01.04
Total	96	100.00
How accurate is the ATM?	Frequency	Percent (%)
Very accurate	01	01.04
Accurate	60	62.50
Neutral	10	10.42
Not accurate	25	26.04
Not accurate at all	00	00.00
Total	96	100.00
How convenient is the ATM?	Frequency	Percent (%)
Very convenient	01	01.04
Convenient	25	26.04
Neutral	10	10.42
Not convenient	60	62.50
Not convenient at all	00	00.00
Total	96	100.00

Source: Field data, 2013

4.3.7 Regression analysis results

Regression analysis was conducted between dependent (customer satisfaction) variable and independent variables (reliability, easiness, safety, accuracy, and convenience).

Table 9: Regression analysis result

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
(Constant)	.133	.174		.762	.448
How reliable ATM services are?	.316	.108	.319	2.935	.004
How easy is it to use ATM in withdrawing money?	.191	.100	.193	1.899	.061
How safe is the ATM?	.235	.057	.246	4.147	.000
How accurate is the ATM?	.270	.093	.273	2.906	.005
How convenient is the ATM?	-.051	.019	-.127	-2.675	.009

a. Dependent Variable: To what extent are customers satisfied with ATM services?

From table 9 above, it is clear that reliability of ATM services, safety, and accuracy of ATM have a significant and positive influence towards customer satisfaction. Their magnitudes were as follows: reliability ($p = 0.004$, $\beta = 2.935$); easiness ($p = 0.061$, $\beta = 1.899$); safety ($p = 0.000$, $\beta = 4.147$); accuracy ($p = 0.005$, $\beta = 2.906$) respectively. Convenience is significant negative ($p = 0.009$, $\beta = -2.675$) related to customer satisfaction. Additionally, the results found the weak relationship which is not significant between easiness, safety, accuracy and customer satisfaction.

Table 10: Model summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.907 ^a	.822	.812	.38065

Predictors: (Constant), How convenient is the ATM?, How easy is it to use

From table 10, the study shows that independent variables combined with the dependent variable of 0.907. The contribution of all independent variables to the dependent variable (customer satisfaction) was by R Square 0.822. This indicates that factors combined explain the rate of 0.812 of the change in behaviour of the dependent variable, which is considered as high percentage, while the statistical independent variable represented in the reliability, easiness of using ATM, safety, accuracy, and convenience amounted to the impact of these variables combined on the dependent variable through the Adjusted R Square of 0.812.

CHAPTER FIVE

5.0 DISCUSSION OF RESEARCH FINDINGS

5.1 Introduction

The purpose of the study was to assess the effect of Automated Teller Machine (ATM) Services on customer satisfaction in the Tanzanian Banking Sector. The case study was National Microfinance Bank (NMB), Ifakara Branch. The specific objectives were to: examine services offered by ATM at NMB Ifakara Branch, examine the effect of ATM services to customers' satisfaction, study the problems faced by customers while using ATM services offered by NMB Ifakara branch, and analyze the satisfaction level of customers towards ATM services in NMB Ifakara branch. This chapter discusses four objectives of this study.

5.2 Discussion of the results for the four specific objectives

This sub-section discusses results, which were obtained for the specific objectives for this study.

5.2.1 Examination of ATM services offered by NMB Ifakara Branch

The first objective of this study was to examine ATM services offered by NMB Ifakara branch. The results show that withdrawal, mini/statement of account, balance checking and recharge services are the most services offered by ATM. These results are in line with Lovelock (2011) who argued that ATMs provide mobility in banking services for withdrawal. It is further consistent with Akrani (2011) who argued that ATM provides 24 hours services, meaning that ATMs provide services around the clock. The customer can withdraw cash up to a certain limit during any time of the day or night.

5.2.2 Examination of the effect of ATM services to customer satisfaction

The second objective of the study was to examine the effect of the ATM services to customer satisfaction and the results are as follows.

Most respondents agreed that the ATM services offered are effective. This is due to the fact that ATM offers them (respondents) with most of what they require and to their expectation. The results are consistent with the study on ATM services and customer satisfaction, which was conducted by Khirallah (2005) who first defined customer satisfaction as a customer's Perception that his or her needs, wishes, expectations, or desires with regard to products and service have been fulfilled. His results further showed that the security of customers' money has effect to their satisfaction.

5.2.3 Studying the problems faced by customers while using ATM services

The third objective was to study the problems faced by customers while using ATM services, and the results show that; network/machine breakdown, card retention, limited amount of money withdrawn per day, complications and inadequate number of ATMs are the most problems experienced by customers. This is in line with Lovelock (2011) who argued that customers using ATM do experience problems like card retention, ATM falling short of cash, network/machine breakdown, limited amount of money to be withdrawn per day, and queue in areas where there is limited number of ATMs. It is also consistent with Khera (2009) who argued that there are several problems with ATM usage, which include instructions displayed during transaction, physical security at ATMs and ATM sharing (queue). The results are also consistent with Mboma (2011) who did a study on ATM and Customer Satisfaction – A Case Study of Banking Industry in Tanzania, and found that the level of satisfaction is reduced by technological and processing failures.

5.2.4 Analysis of the relationship between customer satisfaction and ATM services

The fourth objective of this study was to analyze the relationship between ATM services and customer satisfaction in NMB Ifakara Branch. The results show that reliability of ATM services, safety, and accuracy of ATM have a significant and positive influence towards customer satisfaction. The results are consistent with Vijesh *et al* (2011) who did a research on factors leading to customer satisfaction after accessing the ATM services. He stated that customers are satisfied by safe,

secure, accurate and convenient ATMs. The results are also in line with Khan (2007) who did a study on the Customer Satisfaction in the Indian Banking sector. The results from his study showed that security, accuracy, reliability and safety of ATM services led to customer satisfaction. The results are further consistent with Lovelock (2000) who identified that secured and convenient location; adequate number of ATMs, user-friendly system, and functionality of ATM are the important factors for the customer satisfaction. Furthermore, based on the prior studies, Al-Hawari et al. (2006) compiled a list of five major items about ATM service quality that include convenient and secured locations, functions of ATM, adequate number of machines and user-friendliness of the systems and procedures. Therefore, customer satisfaction depends on a number of things including reliability, safety, accuracy, convenience and security.

The results also found that convenience is significant negative related to customer satisfaction. This was unexpected since the literatures suggest positive relation between the two. We can justify this by arguing that customers do appreciate the presence of ATM services at NMB Ifakara Branch. However, the services are not convenient due to the fact that the ATMs are located only at the bank premises. They think that it is good if more ATMs are located in other places like hospital, railway station, bus stand and market areas for convenience.

CHAPTER SIX

6.0 SUMMARY, CONCLUSIONS ANDRECOMMENDATIONS

6.1 Introduction

This chapter presents a summary of findings, recommendations and conclusions. Findings from this study are based on analysis in the previous chapter and in reference to the research questions in chapter one, also presents the recommendations for further studies.

6.2 Summary of findings

This sub-section presents a summary of findings for the objectives of the study. The purpose of the study was to assess the effect of Automated Teller Machine (ATM) Services on customer satisfaction in the Tanzanian Banking Sector. The case study was National Microfinance Bank (NMB), Ifakara Branch. The specific objectives were to: examine services offered by ATM at NMB Ifakara Branch, examine the effect of ATM services to customers` satisfaction, study the problems faced by customers while using ATM services offered by NMB Ifakara branch, and analyze relationship that exists between ATM services and customer satisfaction in NMB Ifakara branch.

During this study, samples of 96 ATM users of NMB Ifakara Branch were selected. Data were collected using semi-structured questionnaires and they were organized, coded and analyzed using Statistical Package for Social Sciences (SPSS) version 20.0 for windows. Results were presented in tabular form with frequencies and percentages. Regression analysis was also done using dependent variable (customer satisfaction) and independent variables (reliability, security, safety, accuracy, and convenience).

The results emanating from the study show that withdrawal, mini/statement of account, balance checking and recharge services are the most services offered by ATM. The customer can withdraw cash up to a certain limit during any time of the day or night. The results further found that most customers deem ATM services

provided by NMB Ifakara Branch to be effective, although they face some problems such as card retention, ATM falling short of cash, network/machine breakdown, limited amount of money to be withdrawn per day, and queue in areas where there is limited number of ATMs. The results further found that customer satisfaction depend much on quality of ATM services which are reliable, accurate, safe, secure, and convenient.

6.3 Conclusion

In a nutshell based on study findings, most ATM services offered by NMB Ifakara Branch include cash withdrawal, mini/statement, balance checking, and recharge services.

Furthermore, ATM services offered by NMB Ifakara branch are effective except that ATMs are located only in the bank premises. It could have been better if the bank considered of locating the ATMs to different locations especially in places where there are other services like hospital, bus stand, train stations and local market for more convenience.

On the other hand, customers do face problems when accessing ATM service. Such problems include network/machine breakdown, card retention, limited amount of money to be withdrawn per day and other complications.

Conclusively, a number of factors contribute to the satisfaction of customers accessing ATM services from NMB Ifakara branch. Such factors include reliability, safety, accuracy and convenience of ATM.

6.4 Recommendations

Based on research findings, the researcher recommends that, the bank has to undertake deliberate efforts to install more ATMs in different places especially in areas where there are other services like hospitals, bus stand, market areas and railway stations.

Constant and consistent check-up must be done on these ATM machines in order to avoid network/machine breakdowns and any other possible problems that may lead to inconvenience to the users.

The amount of money to be withdrawn from the bank using ATM machine should be increased more than it is now. This will help reduce congestion at the counter.

This study confined itself on respondents without any kind of disabilities. The research recommends for further studies to explore if there is a number of customers with some kinds of disabilities so as to understand if the ATM services being offered by NMB Ifakara Branch are satisfactory to this kind of a group of people.

Further studies should also consider increasing the number of respondents to be interviewed so to understand if they have more concerns than the ones expressed by respondents who were interviewed by the researcher who undertook this study.

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APENDICES
MZUMBE UNIVERSITY

QUESTIONNAIRE

Sir/ Madam;

I Mr. _____ from Mzumbe University, take this opportune time to inform you that this is an Academic research, and that all the information you will fill in here shall be confidential. I therefore kindly request you to fill this questionnaire for me.

Part I Biodata

Please tick applicable option appropriately.

1. What is your gender?

Male

Female

2. What is your occupation?

Employed

Business

Student

None

Part II Background Information

3. Do you hold an Account with National Microfinance Bank (NMB) Ifakara Branch?

Yes

No

4. If yes, are you aware of the existence of ATM banking?

Yes

No

5. If yes, do you possess an ATM card?

Yes

No

Part III Services offered by ATM

6. What are the services offered by ATM?
- | | | |
|--------------------------------------|----------|--------|
| Withdrawal | Cash/ | Cheque |
| deposit | | |
| Statement/ Mini-statement of account | Balances | |
| Others | | |
7. Are the services offered enough for you or still lacking?
1. More than enough
 2. Enough
 3. Neutral
 4. Not enough
 5. Not enough at all
8. If not, what other services would you like to see added?
- i.
 - ii.
 - iii.

Part IV Effectiveness of ATM Services

9. How do you rate ATM services in terms of:-
- a. Its available functions/ services offered?
 1. Very effective
 2. Effective
 3. Neutral
 4. Ineffective
 5. Very ineffective

b. Costs associated with deposit and withdrawal?

1. Very costly
2. Costly
3. Neutral
4. Cheap
5. Very cheap

c. Security of your money?

1. Very secure
2. Secure
3. Moderate
4. Insecure
5. Very insecure

d. Time

1. Very effective
2. Effective
3. Neutral
4. Ineffective
5. Very ineffective

10. How long do you often take in the queue before accessing the ATM service?

0-5 Minutes

6-10 Minutes

11-15 Minutes

16+ Minutes

11. Do you experience problem(s) using ATM?

Yes

No

12. If yes, what kind of problem(s) do you face?

Network/ Machine breakdown

Complication

Limited amount of money to be withdrawn

Card retention

Any other (Specify):.....

13. How often do you experience such problem?
 1. Very often
 2. Often
 3. Moderate
 4. Less often
 5. Not at all
14. Has your bank done anything to avert such problem (s) above?

Yes	No
-----	----
15. If yes, did it solve all the problem (s) encountered or not?

Yes	No
-----	----
16. If no in 14 and 15 above, what would you suggest your bank should do in order to avoid re-occurrences of such problems in future?
 - i.
 - ii.
 - iii.

Part V: Level of satisfaction of customers receiving ATM services

17. How reliable ATM services are?
 - a. Very reliable
 - b. Reliable
 - c. Neutral
 - d. Not reliable
 - e. Not reliable at all

18. How easy is it to use ATM in withdrawing money?

- a. Very easy
- b. Easy
- c. Neutral
- d. Not easy
- e. Not easy at all

19. How safe is the ATM?

- a. Very safe
- b. Safe
- c. Neutral
- d. Not safe
- e. Not safe at all

20. How accurate is the ATM?

- a. Very accurate
- b. Accurate
- c. Neutral
- d. Not accurate
- e. Not accurate at all

21. How convenient is the ATM?

- a. Very convenient
- b. Convenient
- c. Neutral
- d. Not convenient
- e. Not convenient at all

22. Are you satisfied with the ATM services?

- a. Very satisfied
- b. Satisfied
- c. Unsure
- d. Dissatisfied
- e. Very dissatisfied