

**EFFECTS OF INSTITUTIONAL FACTORS ON CREDIT PERFORMANCE OF  
MICRO-FINANCE INSTITUTIONS IN KENYA;  
A CASE OF FAULU KENYA LIMITED**

**BY**

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## ABSTRACT

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Despite aggregate growth in the microfinance sector, microfinance institutions (MFIs) continue to face challenges in credit performance. The Central Bank of Kenya has not only been concerned over the low level of risk management in financial institutions, but also in the fact that most of these institutions concentrate only on credit risk, with weak measures in other credit management policies. Even though financial institutions are investing a lot of funds in credit risk modelling, it is not clear whether this investment is viable. Challenges with developing optimal appraisal, risk control, and debt collection policies persist, as well as their effect on credit performance. There is minimal research on the effect of institutional factors on credit performance. As such, research on the factors influencing credit performance is a matter of concern in practice and policy. The purpose of the study is to investigate the effect of institutional factors on credit performance. The specific objectives are to investigate the effect of client appraisal, credit risk control, debt collection policies on credit performance in Faulu Kenya. The study was guided by an adapted conceptual framework linking the independent variables and dependent variable. A descriptive cross-sectional design was used to investigate the research questions. Random sampling was used to generate a sample size of 90 respondents. The questionnaire for data collection was pilot-tested and found to be satisfactory with a Cronbach's Alpha Reliability Coefficient of 0.844, which is above the recommended 0.7 threshold. Data was analyzed using descriptive statistics and inferential statistics. Descriptive results indicate a high level of importance placed on credit appraisal, credit risk control, and debt collection strategies. Multiple regression coefficients indicate that the relationship between credit appraisal policy ( $p=0.143$ ) and credit performance; an inverse relationship between credit risk control policy ( $p=0.246$ ) and credit performance, and a positive and statistically significant relationship between debt collection policies and credit performance ( $p=0.000$ ) at 95% significance level. The study concludes that MFIs should emphasize on debt collection policies in order to improve credit performance.

## INTRODUCTION

This chapter describes the background of the study, statement of the problem, objectives of the study, the research questions and the justification of the study. It also discusses the scope of the study and the conceptual framework.

**1.1 Background of the Study**

Microfinance institutions (MFIs) play a vital role in the economic development of many developing countries (Arun and Hulme, 2008; Hoque, 2011). Microfinance can be defined as financial instruments such as loans, savings, insurance and other financial products that are tailored to the poor. Before microfinance, the poor had difficulty accessing commercial financial institutions because of the lack of collateral and unverified credit histories (Mokhtar, 2011). According to Anyanwu (2004) MFIs help to combat poverty at an individual level. In Africa and other developing regions, MFIs are the main source of funding for micro enterprises (Anyanwu, 2004). In Kenya the gap filled by MFIs has become part of the formal financial system and MFIs need to access capital market to fund their lending portfolios, in order to allow them to dramatically increase the number of poor people they can reach (Werue, 2012).

MFIs have grown significantly over the past three decades and become an important sub-sector in global financial markets (Arun and Hulme, 2008). Globally, according to the 2010 European Development Report (ERD), Latin America leads in the number of MFIs, 384 with 14.4 million voluntary savers, 14.1 million borrowers, and a gross loan portfolio of USD 16,739. This is followed by Eastern Europe and Central Asia with 292 MFIs, 5.2 million voluntary savers, 3 million borrowers, and a gross loan portfolio of USD 10,065 million. In terms of number of MFIs, Sub-Saharan Africa ranks third with 275, with 18 million voluntary savers, 7.5 million borrowers, and a gross loan portfolio of USD 3,335 million. In terms of borrowers worldwide, Africa lags behind other regions with 9% compared to 17% in East Asia and 16% in Latin America (Arun and Hulme, 2008).

In Sub-Saharan Africa, the top three countries with the highest number of borrowers are Ethiopia with 1,840,788 borrowers (28.4%), Kenya with 1,093,515 borrowers (16.9%), and South Africa with 722,559 borrowers (11.9%) (Arun and Hulme, 2008; ERD, 2010). In Kenya, MFIs have achieved high growth rate over the past 10 years, with assessments

showing a growth in portfolio by 107% from 2004-2009, growth in total assets by 30% from 2009-2011, and an increase of borrowers to more than 1.5 million (MicroFinanza Rating, 2013).

Even though MFIs have grown significantly over the past three decades and become an important sub-sector in global financial markets, and a major financial player in Kenya, it continues to be affected by credit performance issues (Angaine and Wari, 2014). Credit performance issues arise from the inability of MFIs to receive its money plus interest from borrowers. Loan default can be defined as the inability of a borrower to fulfil his or her loan obligation when due (Balagun and Alimi, 1990). Significant loan repayment defaults lead to decreased employment levels and cash flow problems in microfinance institutions (Munene and Nguyo, 2013). A high default rate in MFIs is a major concern to policy makers in developing countries (Warue, 2012).

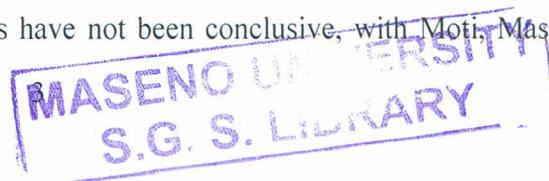
A key requirement for effective credit management is the ability to intelligently and efficiently manage customer credit lines. As such, in order to minimize exposure to bad debt, over-reserving and bankruptcies, MFIs must have greater insight into customer financial strength, credit score history and changing payment patterns. Credit management starts with the sale and does not stop until the full and final payment has been received (Howard and Thierry, 2006). It is as important as part of the deal as closing the sale. In fact, a sale is technically not a sale until the money has been collected. It is difficult to establish an optimal credit policy as the best combination of the variables of credit policy is quite difficult to obtain; however, a firm must develop a credit policy to govern its credit management operations (Pandey, 2008). Credit management policies encompass: client appraisal policies, credit risk control policies and debt collection policies (Moti, Masinde, Mugenda, and Sidhani, 2012).

Credit appraisal policies are also known as credit terms and refer to the conditions under which MFIs advance credit to its customers. The terms specify the credit period and interest rates. The credit period is the period of time the credit is granted and is influenced by the collateral value, credit risk, the size of the borrower's account, and the market competition (Ross, Westerfield, and Jordan, 2008). Yunus (2003) argues that MFIs should appraise clients using the three C's of credit (Yunus, 2003). Character being the first C, refers to how a person has handled past debt obligations. It can be evaluated from credit history, personal background, honesty and reliability of the borrower. The next one is capacity; this means how

much debt a borrower can comfortably handle. Income streams are analyzed and any legal obligations looked into, which could interfere with payments. Finally capital, this means current available assets of the borrower, such as real estate, savings or investment that could be used to repay debt if income should be unavailable. The three C's minimum criteria is very hypothetical as borrowers still find themselves in a situation that they are unable to meet their debt obligations. This means that more is required than just meeting this minimum criteria (Angaine and Waari, 2014). Additional two C's: capital and condition have also been added as mechanisms of determining the suitability of lending, to create a five C's model (Ouma, 2008; Kiplimo and Kalio, 2012).

The credit risk control refers to the measures taken by MFIs to deal with the risk of loss arising from a borrower who does not make payments as promised. Credit risk is also known as default risk and MFIs may suffer from losses including lost principal and interest, decreased cash flow, and increased allocation costs. The risk can be mitigated by using risk based pricing, covenants, credit insurance, tightening and diversification (Ross *et al.*, 2008). Credit risk control should also entail analyzing the business viability position and business management when appraising the financial strength of the applicant, the firm's quality of management and nature of the customer's businesses. If the nature of the customer's business is highly fluctuating or has financially weak buyers or the business depends on a few buyers, then it is risky to extend credit to such borrower (Pandey, 2004). In MFIs, a monitoring system that highlights repayment problems clearly and quickly, so that loan officers and their supervisors can focus on delinquency (repayment rate) before it gets out of hand is crucial (Addae, Korankye, 2014).

According to Kimando (2012), since most microloans are unsecured, delinquency can quickly spread from a handful of loans to a significant portion of the portfolio. This contagion is exacerbated by the fact that microfinance portfolios often have a high concentration in certain business sectors. Consequently, many clients may be exposed to the same external threats such as lack of demand for clients' products, livestock disease outbreak, bad weather and many others (Kimando, 2012). Most studies done on credit management have concentrated on the banking sector (Musyoki and Kadubo, 2012), while those that have been done on microfinance in Kenya have focused on the MFIs in specific regions (such as Moti, Masinde, Mugenda, & Sidhani (2012) also investigated the effectiveness of credit management system on loan performance in the microfinance sector in Meru region). The results on the effects of credit risk policies have not been conclusive, with Moti, Masinde,



Mugenda, & Sidhani (2012) reporting that there is no significant relationship between credit risk policies and performance, while Gatuhu (2011), in a study investigating the effect of credit risk control on 59 MFIs found out that the relationship is significant. It is important to establish whether the same could apply at institutional level.

The debt collection policy in MFIs include the various policies put in place to ensure that credit management is done effectively, particularly how the institutions deal with customers who do not pay their debts in time. Recognizing that some customers are slow payers while some are non-payers, such a policy aims at accelerating collections from slow payers and reducing bad debt losses arising from non-payment (Kariuki, 2010). A collection policy ensures prompt and regular collection for fast turnover of working capital keeping collection costs and bad debts within limits and hence maintaining collection efficiency. Collection policies also specify clear-cut collection procedures to avoid conflicts arising from loan repayment periods, amounts and loan structure (Pandey, 2004). Gatuhu (2011) reported that there is a significant relationship between collection policy and performance in MFIs; and Moti, Masinde, Mugenda, & Sidhani (2012) also found out that, comparatively, collection policies have a higher effect on loan repayment. However, there is no study that focuses on individual MFIs, particularly Faulu Kenya Ltd.

High levels of non-performing loans threaten the viability and sustainability of MFIs and credit management policies has been found to impact on performance in financial institutions (Tundui and Tundui, 2013). Despite the availability of client appraisal frameworks such as the 5 C's model, loan defaults persist. Moti, Masinde, Mugenda, and Sidhani (2012) established that how credit officers formulate credit terms influences loan performance. Loan repayment is determined by the willingness, ability, and other characteristics of borrowers; the business characteristics including credit policies, product designs, and suitability of products to borrowers also affect loan repayment (Onyechocha *et al*, 2002). However, MFIs, just like other financial institutions, constantly grapple with developing an optimal appraisal mechanism and the inherent risks in loaning funds as a business. Studies such as Dinos & Ashta (2010) and Saloner (2007) have showed that various internal and external risk factors among self-help groups significantly affect loan delinquency performance among MFIs in Kenya; however, the studies did not establish if this is the same for all classes of borrowers. In 2010, the Central Bank Annual Supervision Report, covering 10 years, indicated rising levels of non-performing loans by MFIs. Problems with debt collection policies is evident from recent studies such as Munene & Nguyo (2013) which reported high rates of loan

repayment defaults and effects on credit performance among MFIs in Imenti North District. The study will analyze how institutional factors affect credit performance.

## **1.2 Statement of the Problem**

The main goal of every microfinance institution (MFI) is to operate profitably in order to maintain its stability and improve growth. However, existence of high levels of loan delinquency problem in microfinance industry negatively affects credit performance. The Central Bank of Kenya Annual Supervision reports show that microfinance institutions continue to suffer from high levels of loan defaults. External and internal economic environments are viewed as critical drivers of loan delinquency occurrence. The proportion of delinquency's loans to gross lending is largely affected by the institutional policies in individual MFIs. However, most studies have concentrated on borrower characteristics, such as owner and businesses characteristics and the use of borrowed funds for unintended purposes or diversion of funds to unplanned for activities which affect the cash flow needed for loan repayments. Apart from aggregated assessments for the MFI sector, there is a paucity of research on how internal factors affect credit performance in individual MFIs. The study investigated the effect of the institutional credit management factors: client appraisal, credit risk control, and debt collection policies and how they affect credit performance in Faulu Kenya.

## **1.3 Objectives of the Study**

The general objective of this research was to analyze the institutional credit management factors affecting credit performance of microfinance in Kenya.

The Specific Objectives of the study includes;

- i. Establish the effect of client appraisal policies on credit performance at Faulu Kenya Ltd.
- ii. To establish the effect of credit risk control policies on credit performance at Faulu Kenya Ltd.
- iii. Examine the effect of debt collection policies on credit performance at Faulu Kenya Ltd.



#### 1.4 Research Hypotheses

H1: There is a significant effect of client appraisal policies on credit performance at Faulu Kenya Ltd.

H2: There is a significant effect of credit risk control policies on credit performance at Faulu Kenya Ltd.

H3: There is a significant effect of debt collection policies on credit performance at Faulu Kenya Ltd.

#### 1.5 Scope of the Study

The study was restricted to Deposit Taking MFIs, specifically Faulu DTM Limited, which is the largest DTM with branches in every County in Kenya. Currently, Faulu Kenya has 40 banking branches distributed across the country. The study was limited to investigating the factors that affect credit performance in microfinance institutions in Kenya. The factors under investigation were: credit appraisal policies, credit risk control policies, and debt collection policies. The study was carried out between August 10 and September 30, 2015.



#### 1.6 Significance of the Study

The study is useful for the formulation of government policy, particularly those affecting microfinance institutions. It brings to light issues concerning the factors that affect the performance of MFIs and how legislations can be structured to improve the overall profitability and sustainability of financial industry.

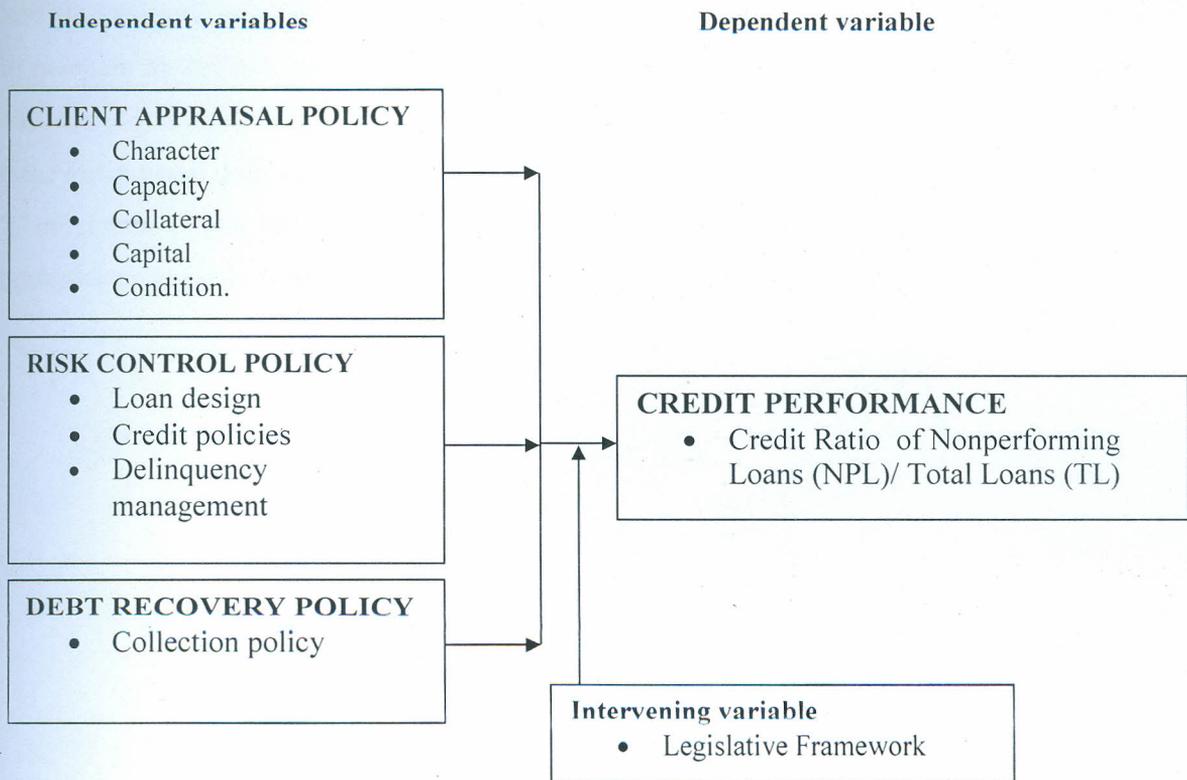
This study was aimed at developing an understanding of the factors affecting the credit performance of MFIs, with specific focus on Faulu Kenya which is the biggest licensed deposit taking microfinance in Kenya. The findings of the study can be used by the management teams to develop strategies that can be adopted to enhance profitability and sustainability.

The study is also useful to students, educators, and researchers. The findings can be used as reference material to ground further research on the relationship between credit management and credit performance of MFIs.

## 1.7 Conceptual Framework

The conceptual framework provides the relationship between the independent variables: client appraisal, risk control, and debt recovery policy, and the dependent variable: credit performance.

The figure below shows the relationships between the variables.



**Figure 1.1: Institutional factors and credit performance (Author, 2015)**

From the conceptual framework, client appraisal policy refers to the screen of clients to ensure that they have the willingness and ability to repay a loan. In this study, client appraisal policy is measured using the 5Cs model of credit to evaluate a customer as a potential borrower. The 5Cs help MFIs to increase loan performance, as they get to know their customers better. These 5Cs are: character, capacity, collateral, capital and condition (Abedi, 2000). The credit control policies are the ways through which the microfinance institution evaluates and manages risks associated with lending (Ouma, 2008). In the study, credit risk control measures are loan product design, credit committees, and delinquency management. On the other hand, the debt recovery policy includes measures put in place to ensure effective credit management and to ensure that all loanees pay in time. The policy

helps in accelerating payment and reducing debt losses (Kariuki, 2010). In this study, the debt recovery policy at the institution is used as the measure.

The conceptual framework connects institutional policies: client appraisal, risk control, and debt recovery policies with measures of credit performance. In the study, the credit performance was determined by the level of loan Credit performance will be measured by looking at the credit ratio of nonperforming loans (NPL) to total loans (TL) abbreviated as NPL/TL. Usually, microfinance institutions adopt credit management methods and strategies to maintain an optimal level of credit and ensure that it continues to carry out its lending business (Myers and Brealey, 2003). The study is therefore interested in the extent to which these institutional policies have influenced credit performance at Faulu Kenya Ltd.. The study is interested in the extent to which these institutional policies have influenced credit performance at Faulu Kenya Ltd.

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## CHAPTER TWO

### LITERATURE REVIEW

#### 2.1 Introduction

This section covers theoretical literature review, the 5 C's model of credit management and the review of empirical studies. It also examines the client appraisal policies and credit performance, credit risk control policies and credit performance. It concludes by examining debt recovery, policies, credit performance, and the research gaps that the study intends to fulfil.

#### 2.2 Theoretical Literature

Microfinance can be defined as financial instruments, such as loans, savings, insurance and other financial products that are tailored only to the poor. Microfinance is created in the economy for the economic benefit of the poor and to alleviate poverty. Before microfinance, the poor had difficulty accessing commercial financial institutions because of a lack of collateral and unverified credit histories (Mokhtar, 2011). According to Robinson (2001) microfinance refers to small scale financial services primarily credit and savings-provided to people who farm or fish or herd; who operate small enterprises or small business enterprises where goods are produced, recycled, repaired, or sold; who provide services; who work for wages and commissions; who gain income from renting out small amounts of land, vehicles, draft animals, or machinery and tools; and to other individuals and groups at the local levels of developing countries, both rural and urban (Mokhtar, 2011).

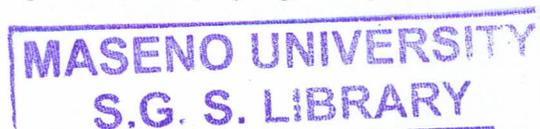
Microcredit is the lending side of microfinance. Microcredit loans help the poor to be involved in income generating activities that allow them to accumulate capital and improve their standard of living (Littlefield, Morduch, & Hashemi, 2003). By providing access to financial services, microfinance plays an important role in the fight against poverty. For example, income generation from a business helps not only the business activity to expand but also contributes to household income and improves food security, children's education, and empowers women. For example, microcredit in Bangladesh has empowered women by increasing their contribution to the household income and asset accumulation, which significantly improved the living standard of the family. Thus, microcredit emerges as a tool for promoting the economic and social development of the poor (Khandker, Samad, & Khan, 1998).

Measuring the performance of a microfinance institution is about examining progress and determining whether the goals of microfinance have been met. The important goal of

microfinance is to improve the standard of living of the poor and lift them out of poverty. However, according to Schreiner (1996), the performance of microfinance differs according to the perspective of the borrowers, society, donors, the microfinance institution's staff and investors. From the perspective of the borrower, the performance is measured by their repeated use of the microfinance products to gain benefits. For example, with microcredit loans, borrowers are able to improve their businesses, provide healthy food for their families, provide better education for their children and also empower their personal life (Schreiner, 1996). Society, like the borrowers, also measures the performance of microfinance. From the perspective of donors, performance is measured using market leverage. Where, market leverage is the gain that the microfinance institution has achieved with the donations given (Schreiner, 2003). For example, with donations, outreach to the poor will increase and the microfinance institution will be considered more stable and efficient in delivering the services. Finally, from the perspective of the microfinance institution, good performance is when the microfinance institution achieves high profitability from the investors' investment (Schreiner, 2003).

The performance of microfinance institutions can also be measured by evaluating the collection performance, that is, how effective is the microfinance institution in collecting its loan. This study will be based on this second measurement and will examine the loan repayment levels (loan default levels) as a measure of credit performance (Bayang, 2009).

### 2.2.1 The 5 C's Model of Credit Management



Microfinance institutions may use the 5Cs model of credit management to evaluate a customer as a potential borrower (Abedi, 2000). The 5Cs are character, capacity, collateral, capital and condition. Character basically is a tool that provides weighting values for various characteristics of a loan applicant and the total weighted score of the applicant is used to estimate his credit worthiness (Myers, 2005). The factors that influence a client can be categorized into personal, cultural, social and economic factors (Ouma, 2008).

The psychological factor is based on a man's inner worth rather than on his tangible evidences of accomplishment. MFIs may consider this factor by observing and learning about the individual. In most cases it is not considered on first application of credit by an applicant but from the second time. Under social factors, lifestyle is the way a person lives. This includes patterns of social relations such as membership groups, consumption and entertainment. A lifestyle typically also reflects an individual's attitudes, values or

worldview. Reference groups in most cases have indirect influence on a person's credibility. Through group guarantors MFIs try to identify the reference groups of their target as they influence a client's credibility (Ouma, 2008).

Personal factors include age, life cycle stage, occupation, income or economic situation, personality and self concept. Under life cycle stage for example older families with mature children are not likely to default since it's easier to attach collateral on their assets since they are settled unlike the unsettled young couples. The MFIs will consider the cash flow from the business, the timing of the repayment, and the successful repayment of the loan. Cash flow helps the MFIs to determine if the borrower has the ability to repay the debt. The analysis of cash flow can be very technical. It may include more than simply comparing income and expenses. MFIs determine cash flow by examining existing cash flow statements and reasonable projections for the future (Kiplimo and Kalio, 2014).

Collateral is any asset that customers have to pledge against debt (Modoc, 1999). Collateral represents assets that the company pledges as alternative repayment source of loan. Most collateral is in form of hard assets such as real estate and office or manufacturing equipment. Alternatively accounts receivable and inventory can be pledged as collateral. MFIs prefer collateral that has duration closely matched to the short term loan. According to Wester (1993) capital is measured by the general financial position of the borrower as indicated by a financial ratio analysis, with special emphasis on tangible net worth of the borrower's business. Thus, capital is the money a borrower has personally invested in the business and is an indication of how much the borrower has at risk should the business fail. Condition refers to the borrower's sensitivity to external forces such as interest rates, inflation rates, business cycles as well as competitive pressures. The conditions focus on the borrower's vulnerability (Kiplimo and Kalio, 2014).

The 5 C's model can also be used to examine the lender's characteristics, which include policies, attributes, objectives and work performances that govern the lending criteria. Beside the three C's model of lending that is character, capacity, capital, and does insist that MFI's should evaluate clients on collateral and prevailing financial condition of the borrower (Mwenje, 2006). Past financial statements i.e. the balance sheets and income statements are reviewed in terms of key profitability and credit ratios, inventory turnover, ageing of accounts receivable, the entrepreneur's capital invested and commitment to the business. Future

projections on market size, sales and profitability are also evaluated to determine the ability to repay the loan (Mwenje, 2006).

Angaine and Waari (2014) discusses the various models that MFIs have used in lending to clients these models rank from group lending, village banks, ROSCAs and Cooperatives. The rules of borrowing are usually determined by the members forming these associations. Pande and Burgess (2005) further argue that the MFI may determine the credit worthiness of borrowers through discriminant analysis technique which is more objective in determining good and bad customers. On the other hand to save time the MFIs can turn to loan officers in evaluating prospective clients. According to him there is no sufficient monitoring and reporting to ensure funds are used for the purpose preferred by terms of MFIs. Some clients borrow from one lender to pay other lenders and repayment of credit may not be a good indicator for total success of MFIs hence to achieve preferred goals there is need for shift of both strategy and approach (Angaine and Waari, 2014).

## **2.3 Review of Empirical Studies**

### **2.3.1 Client Appraisal Policies and Credit performance**

Munene & Nguyo (2013) investigated the factors influencing loan repayment default in microfinance institutions in Imenti North District in Kenya. Using a descriptive survey design, and a representative sample of 400 respondents, the research established that there was a significant relationship between the type, of business ( $p=0.00$ ), age of business ( $p=0.00$ ), number of employees ( $p=0.00$ ) and loan repayment default. This means that the credit policies that lenders put in place should be able to evaluate business characteristics with the intention of determining the credit limit, borrower's reputation, borrowers' financial needs and assess capacity for repayment.

Bichanga & Aseyo (2013) investigated causes of loan default within microfinance institutions in Trans-Zoia County in Kenya. Using a descriptive design and a stratified random sample of 400 loan borrowers, the researcher reported that loan repayment default was due to the inadequate training of borrowers on the utilization of loan funds before the banks disbursed the loans. The net result was that most borrowers did not spend the loan amount on the intended projects. The study recommended that as part of the appraisal policies, the microfinance institution should monitor borrowers regularly to ensure the loans are being

utilized for the intended purposes. Therefore, appraisal can involve physically monitoring the borrowers to monitor and evaluate the intended use of the funds (Bichanga & Aseyo, 2013).

According to Batar (2008), the lender can identify target clients' MFI's financial services needs, evaluate their needs, assess their character and capacity for repayment and determine the appropriate loan amount using financial expertise Batar *et al* (2008). A firm may develop its own ad hoc approach of numerical credit scoring to determine the credit worthiness of customers. The attributes identify by the firm may be assigned weights depending on their importance and be combined to create an overall score.

Natukunda (2002) investigated the effect of microfinance credit lending terms, networks and performance of women enterprises in Wakiso District in Uganda. Using a cross-sectional design, and a random sample of 142 respondents, the study established that the loan repayment period is an important indicator of the performance of women enterprises. The study also demonstrated that the total cost of the loans is high and women enterprises tend to rely in social collateral to access loans. There was also a significant relationship between the credit lending terms and performance of women enterprises. This means that the nature of credit lending terms affects the ability of the enterprise to generate enough revenue to meet the loan repayment obligations.

Weston (2003) noted that there are various policies that lenders put in place to ensure that credit administration is done effectively. One of these policies is collection policy which is needed because all customers do not pay the firms bills in time. The collection effort should, therefore aim at accelerating collections from slow payers and hence reducing bad debt losses. A collection policy ensures prompt and regular collection for fast turnover of working capital keeping collection costs and bad debts within limits and hence maintaining collection efficiency. The collection policy specifies clear-cut collection procedures and hence dissuades conflicts arising from loan repayment periods, amounts and loan structure. The policy analyses business viability position and business Management by appraising the financial strength of the applicant, the firm's quality of management and nature of the customers businesses. The lender also conducts management audit to identify weakness of the customer's business management. If the nature of the customers business is highly fluctuating or has financially weak buyers or the business depends on a few buyers, then it is risky to extend credit to such borrower.

Kariuki (2010) demonstrated that the ability to attract customers hinges on the ability to quickly and easily make well-informed credit decisions and set appropriate lines of credit. However, a firm's credit policy is greatly influenced by economic conditions. As economic conditions change, the credit policy of the firm may also change. Therefore MFIs must develop a credit policy to govern their credit management operations and since MFIs generate their revenue from credit extended to low income individuals in the form of interest charged on the funds granted the loan repayments may be uncertain. Pandey (2008) and Ditcher (2003) added that the success of lending out credit depends on the methodology applied to evaluate and to award the credit and therefore the credit decision should be based on a thorough evaluation of the risk conditions of the lending and the characteristics of the borrower.

According to Horne (2007), numerous approaches have been developed in client appraisal process by financial institutions. They range from relatively simple methods, such as the use of subjective or informal approaches, to fairly complex ones, such as the use of computerized simulation models and Credit Reference Bureau (Horne, 2007). Many lending decisions by MFIs are frequently based on their subjective feelings about the risk in relation to expected repayment by the borrower. MFIs commonly use this approach because it is both simple and inexpensive. However the concepts of 5C for credit appraisal pioneered by Edward (1997) has gained currency in MFIs. These elements are character, capacity, collateral, capital and condition (Edward, 1997). In addition, credit policies also considers credit limit (maximum amount of credit which the firm will extend at a point in time). It indicates the extent of risk to the firm by extend credit to a customer. Credit limit is also a function of the Character of a customer (customer's willingness to pay and the moral factor). There are various methods employed to analyze Credit Worthiness. The debt capacity of the applicant is reflected in cash flow projection, forming the basis for the decision on the loan conditions and the payment plan. The willingness to pay is assessed either on the basis of his credit history or, if there is none, using statement of suppliers, neighbours on the borrowers reputation and how promptly (Orua, 2009).

### **2.3.2. Credit Risk Control Policies and Credit performance**

Borrowers can either repay their loan or choose to default. Borrower defaults may be voluntary or involuntary (Brehanu & Fufa, 2008). It is therefore important to understand the sources of risk and the various strategies that can be put in place to control and manage credit

risk. According to Brehanu and Fufa (2008), involuntary defaults of borrowed funds could be caused by unexpected circumstances occurring in the borrower's business that affect their ability to repay the loan. Unexpected circumstances include lower business revenue generated, natural disasters and borrowers' illness. In contrast, voluntary default is related to morally hazardous behaviour by the borrower. In this category, the borrower has the ability to repay the borrowed funds but refuses to because of the low level of enforcement mechanisms used by the institution (Brehanu & Fufa, 2008).

The policy used by an MFI to define delinquent loans directly influences the portfolio quality ratios and the determinant of the MFI's level of risk. If an MFI defines past due (over due and delinquent) only after the loan term has ended, the portfolio quality ratios will mean little (CGAP, 2010). The date that a loan term ends has no relevance to the amount of time a loan is overdue. What matters is the amount of time that has passed since the borrower stopped making payments. Delinquency loans play a critical role in an MFI's expenses, cash flow, revenue and profitability. In developing a delinquency management system, strategies such as institutional culture, client orientation, staff and client incentives, delinquency penalties and enforcing contracts can be designed to balance the carrots (incentives) and sticks (penalties) (Craig, 2006). The loan process and procedures, governance and loan monitoring policies of a MFI have far reaching effects on delinquency performance.

Group lending model is one of the best practices in microfinance especially in Africa (Latifee, 2006). A group consists of two or more individuals. Any MFI that aims to increase outreach and achieve sustainability may have to do it through mass numbers, which is possible through groups. In many African societies, many poor people are already members of a group; either in the church or within their immediate community. Groups consist of individuals who have something in common; they come from the same community, they worship in the same church, they are the same age group or they simply work in the same market. Understanding the reasons for continued existence of such groups would help lending MFIs develop long lasting groups, which translates to long life client base. This would enhance client creditworthiness assessments, which has direct link to delinquency. Group solidarity and self-regulation which includes group constitution would be expected to facilitate loan repayment among group members. Therefore group formation process may have a direct effect on loan delinquency among group members.

Saloner (2007) researched on the effect of institutional characteristics on default rate in developing world. The results showed that a focus on women as borrowers, on institutional incorporation into the community, and on client-led programming all lead to lower default rates and thus greater success. Pollio (2010) examined microfinance default rates in Ghana. He found that repayment is affected mainly by the number of dependents in the household, years in business, use of proceeds, loan status, and frequency of loan monitoring.

In order to overcome challenges of loan defaults, micro finance institutions use various credit lending models such as the Grameen (village) Bank in India founded by professor (Yunus, 2003) to manage the risks of lending. The bank adopted a methodology where a bank unit is set up with a field manager and a number of bank workers covering area of about 15 to 22 villages. The managers and the workers start by visiting villages to familiarize themselves with local milieu in which they will be operating and identify prospective clientele, as well as explain the purpose, functions and mode of operation of the bank to local population. Lending started with formation of groups of five prospective borrowers. The group is observed for a month to see if the members are conforming to the rules of the bank. Only if the first two borrowers repay the principal plus interest over a period of fifty weeks (50) do other members of the group become eligible for an additional loan. This mechanism ensured that collective responsibility of the group served as collateral on the loan.

Another popular model in micro finance is rotating savings and credit associations (ROSCA). ROSCAs form groups of individuals who pay into an account on a monthly basis. Each individual then earns an opportunity to receive a relatively large loan with to invest. The group decides who receives the loan each term, often based on rotating schedule. The initial money is either accumulation of the group members' individual deposits or more frequently, by an outside donation. Loan repayment is ensured through peer pressure. Anyone who does not repay the loan amount risks the privilege to borrow in the future (Munene & Nguyo, 2013).

Research has shown that a group lending mechanism is effective in reducing borrower defaults (Armendariz de Aghion, 1999). In group lending, the loan is secured by the co signature of members within the group and not by the microfinance institution. Each member will put pressure on the others in the group to meet the loan repayment schedule.

Thus, group sanction is important in discouraging defaults among members in microfinance (Van Tassel, 1999).

Studies on the effectiveness of the group-lending mechanism include Ahlin and Townsend (2007) on Thailand's microcredit borrowers and Olomola (2000) on Nigeria's microcredit borrowers. In addition, Sharma and Zeller (1997) and Zeller (1998) undertook studies on Bangladesh and Madagascar microfinance borrowers, respectively, examining the impact of group characteristics, lender characteristics and community characteristics on loan default rates. The repayment behaviour among borrowers in the group-lending model was also investigated by Wydick (1999). The author investigated the impact of social ties, group sanctions and peer monitoring on loan repayment behaviour among Guatemalan microfinance borrowers.

Musyoki and Kadubo (2012) investigated the impact of credit risk management on the credit performance in Kenya for the period 2000-2006. The study examined various parameters pertinent to credit risk management and how it affects the banks' credit performance. The parameters investigated were default rate, bad debts costs and cost per loan asset. The study covered 10 banks and analyzed credit risk management over seven years (2000-2006). The study revealed that all the parameters have an inverse impact on the credit performance of banks. However, the default rate is the most predictor of bank credit performance vis-à-vis the other indicators of credit risk management. The recommendation is to advise banks to design and formulate strategies that will not only minimize the exposure of the banks to credit risk but will enhance profitability and competitiveness of the banks.

Moti, Masinde, Mugenda, and Sidhani (2012) also investigated the effectiveness of credit management system on loan performance in the microfinance sector in Kenya. The study assessed the effectiveness of credit management systems on loan performance of microfinance institutions. Using a descriptive design and drawing respondents, who were credit officers in Meru town, the study established that of the measures: credit terms, client appraisal, credit risk control measures and credit collection policies; it is only the collection that was found to have a higher effect on loan repayment with ( $p= 0.000$  at 5% significance level). Further research was recommended on the effectiveness of credit referencing on loan performance of MFIs.

Bhatt and Tang (2002) conducted a study to investigate the determinants of loan repayments in microcredit programmes that applied the group lending approach, but took a

different approach. Bhatt and Tang looked at the borrower's socio economic variables instead of the elements of group lending for their influence on loan repayment behaviour. The borrower's socio-economic variables included gender, educational level, household income and characteristics of the business (type of business, years in business, etc. ). In their study, they found that a higher education level was significant and positively related to better repayment performance. Conversely, female borrowers, level of household income, type of business and borrower's experience had no significant effect on repayment behaviour. Most previous research that investigated the issue of loan repayment defaults in microcredit concentrated more on the effectiveness of group lending in discouraging defaults. However, little study has been conducted on the issue of the credit worthiness of the individual lending design applied by microfinance institutions. Research on the determinants of loan repayment defaults in individual-based lending schemes can be found only for rural banks or semi-formal financial institutions.

Chaudhary and Ishafq (2003) examined the credit worthiness of 224 rural borrowers in Pakistan. Using logistic regression, they found that borrowers with higher educational levels, involved in a non-farm business activity, who were using the loans for investment and were female, had a higher probability of repaying their loan. The study found that the subsidised interest rate level did not have a significant effect on repayment behaviour among rural borrowers in Pakistan. They concluded that a subsidised interest rate was not the best way to ensure good repayment by borrowers.

The determinants of loan repayment rates for agricultural loans were investigated by Brehanu and Fufa (2008). Using probit and logit regression, they conducted a study on the determinants of repayment performance among small-scale farmers in Ethiopia. In the study, they found that borrowers with larger farms, higher numbers of livestock and farms located in a rainfall area had a higher capacity to repay loans, since all those factors increased the farmers' productivity and income. The study also found that borrowers who had extra business income and were experienced in using agricultural technology had a good repayment performance.

Roslan and Karim (2009) investigated microcredit loan repayment behaviour in Malaysia. They conducted a study on microcredit loan borrowers from AgroBank Malaysia. AgroBank is a commercial institution specialising in loans to borrowers involved in agricultural business. Apart from giving large-scale loans, it also provides small-scale loans,

such as microcredit loans, to borrowers. In their research, they found that male borrowers and borrowers who had a longer duration for repayments had a higher probability of defaulting. Borrowers involved in non-production oriented business activities such as in the service or the support sectors who had training in their particular business and who borrowed higher loans had lower probabilities of defaulting.

Okorie (1986) studied the repayment behaviour in one agricultural corporation in Nigeria. The author's results from interviews with borrowers showed that the nature of the loan, either cash or in kind (seeds, fertilizer and equipment) can influence the borrowers' repayment behaviour. He found that borrowers who received a loan in kind had higher repayment rates than borrowers who received a cash loan. This was because many borrowers misused the cash, diverting it into personal consumption instead of investing in making their business productive. Regular visits by the loan officer to the borrowers' business site and higher profits generated by the borrowers also contributed to higher repayments by borrowers.

There are various risk controls that can be used by MFIs. These include loan product design, credit committees, and delinquency management (Churchill and Coster, 2001). MFIs can mitigate a significant portion of default risk by designing loan products that meet client needs. Loan product features include the loan size, interest rate and fees, repayment schedule, collateral requirements and any other special terms. Loan products should be designed to address the specific purpose for which the loan is intended (Gatuhu, 2011).

Credit committees are another risk control measure. Establishing a committee of persons to make decisions regarding loans is an essential control in reducing credit (and fraud) risk. If an individual has the power to decide who will receive loans, which loans will be written off or rescheduled, and the conditions of the loans, this power can easily be abused and covered up. While loan officers can serve on the credit committee, at least one other individual with greater authority should also be involved. The credit committee has the responsibility not only for approving loans, but also for monitoring their progress and, should borrowers have repayment problems, getting involved in delinquency management (Gatuhu, 2011).

According to Gatuhu (2011) delinquency management is another risk control measure. To minimize such delinquency MFIs can use the following delinquency management methods. First, MFIs can develop an institutional culture. In this case, a critical delinquency management method involves cultivating an institutional culture that embraces zero

tolerance of arrears and immediate follow up on all late payments. MFIs can also remind clients who have had recent delinquency problems that their repayment day is approaching. A logical first step toward developing a zero-tolerance institutional culture is to communicate this concept to each new client before she receives a loan. MFIs can also offer staff incentives by ensuring that the staff is involved in discouraging delinquency, through a staff incentives system, can be effective. Delinquency penalties, where clients are penalized for late payment can also be instituted. This could include delinquency fees pegged to the number of days late and limiting access to repeat loans based on repayment performance (Gatuhu, 2011).

Finally, given the vulnerability of the target market, it is common for borrowers to be willing but unable to repay. After carefully determining that this is indeed the case it may be appropriate to reschedule a limited number of loans. Only done under extreme circumstances, this may involve extending the loan term and/or reducing the instalment size (Gatuhu, 2011).

### **2.3.3. Debt Recovery Policies and Credit performance**

Warue (2012) carried out a study to determine the factors affecting loan delinquency in microfinance institutions in Kenya. The target population comprised of 49 MFIs under the Association of Microfinance Institutions of Kenya (AMFIK). The results indicated that the success of individual MFIs in credit management reflects the proportion of delinquency's loans to gross lending. There was a positive and significant ( $\beta = 9.937$ ,  $t$  value 5.016) relationship between loan delinquency and microfinance specific factor, and by extension the loan delinquency performance among MFIs in Kenya. As such, there were specific factors relating to the microfinance institutions that contributed to the delinquency problem. Such microfinance specific factors included group governance, members screening process, and default recovery methods.

Field and Pande (2008) studied repayment frequency and default in Micro-Finance in India. They found no significant effect of type of repayment schedule on client delinquency or default. Their findings suggested that, among micro-finance clients who were willing to borrow at either weekly or monthly repayment schedules, a more flexible schedule could significantly lower transaction costs without increasing client default. Field and Pande study paid scant attention to factors that influence default rate which is the main focus of this current study.

Srinivasan (2007) researched on measuring delinquency and default in microfinance institutions in India. The study found that the "mature" (i.e. the rate after say an year of operations of an MFI) collection rate was a good measure for estimating default. In addition, the on-time collection rate was useful for estimating delinquency and only the primitive collection ratio, based on tracking each period's loan disbursement, identified shock in loan repayment. Srinivasan measured delinquency while this current study investigates factors influencing default rate.

CGAP (2009) report on the delinquency crisis in southern Karnataka cited some of the causes of loan delinquency as; clients borrowing excessively from multiple lenders and then finding themselves unable to pay off their loans, poor client tracking systems; a downturn in the silk industry; poor collection practices and domestic problems. A few similar variables are examined by this study to find their relevance in loan delinquency in MFIs in Kenyan business environment.

Schreiner (2003) studied cost-effectiveness analysis of the Grameen Bank of Bangladesh. He found that joint liability reduces risk as members have knowledge of individual character and can screen potential borrowers. Through peer pressure members mentor each other and can coax comrades out of arrears or even to repay their debts for them.

According to Joana (2006), many institutions resist writing off loans because of the belief that some of the loan may still be recuperated. Once a loan has been written off, collection efforts for this loan may continue if it makes economic sense. Loan write-offs are simply a prudent approach to financial management, not a legal acknowledgment that the borrowers no longer are in debt to the institution. Reserve ratio based on the historical default rate, indicates what percentage of the loans outstanding is expected to be unrecoverable. Prudent financial management and full disclosure would imply that this figure should reflect the maximum projected unrecoverable loans. The amounts of the reserve for loan losses (on the balance sheet) and the loan loss provision (on the income statement) should be based on historical information regarding loan defaults (Joanna, 2006).

There are various policies that an organization should put in place to ensure that credit management is done effectively, one of these policies is a collection policy which is needed because all customers do not pay the firms bills in time. Some customers are slow payers while some are non-payers. The collection effort should, therefore aim at accelerating collections from slow payers and reducing bad debt losses (Kariuki, 2010).

#### 2.4. Research Gaps

In Kenya, microfinance institutions were introduced in the 1970s after the seminal International Labour Organization (ILO) report on employment was issued to Kenya in 1972. Currently, these include a wide variety of registered microfinance institutions, savings and credit cooperatives, and NGOs, make up Kenya's microfinance industry. According to the Association of microfinance institutions (AMFI), microfinance institutions currently have over 2 million active loan clients. The goal of microfinance is to improve the standard of living of the poor and lift them out of poverty. With microcredit loans, borrowers are able to improve their businesses, provide healthy food for their families, provide better education for their children and also empower their personal life. However, the existence of high levels of loan delinquency problem in microfinance industry negatively affect the level of private investment and constrain the scope of microfinance institution credit to borrowers as MFIs have to compensate for loan delinquency losses. The literature review has critically analyzed loan repayment, credit policies, default recovery methods, and their effect on the credit performance of microfinance institutions.

From the studies analyzed in the literature review, it is evident that the concept of microfinance, with respect to its origins and the purpose it serves in providing financial services to the poor has been studied widely. Literature review also shows that the chance that a microfinance institution (MFI) may not receive its money back from borrowers (plus interest) is the most common factor affecting the performance of MFIs. Since most microloans are unsecured, delinquency can quickly spread from a handful of loans to a significant portion of the portfolio (Pamoja, 2010).

While there are many studies on the effect of borrower characteristics on loan default, there is minimal research on the effect of the design of the credit policies in individual microfinance institution, despite the recognition that the design of credit management policies may influence the level of loan default either through inadequate or non-monitoring of micro and small enterprises, delays in processing and disbursement of loans, diversion of funds, and over-concentration of decision making where loan decisions have to be made by a central office (Warue, 2012). Whether default is random and influenced by erratic borrower behaviour or whether it is influenced by credit factors at specific MFIs, there is need for further empirical investigations so that the findings can be used by micro financing institutions to manipulate their credit management policies for the better.

Since different MFIs operating in different environments possess different methods of appraising clients, managing risks, and collecting debt; the study will look into how these credit management methods affect credit performance in MFIs in Kenya. There are various MFIs operating under diverse registrations in Kenya; however, the study is interested in Deposit Taking MFIs (DTMs), specifically Faulu Kenya which is the biggest DTM in Kenya.

CHAPTER THREE  
RESEARCH METHODOLOGY



### 3.1 Introduction

This chapter covers research design, study area, target population, sampling procedure, sample size and sampling technique. It discusses data collection methods, procedures, validity and reliability of data collection instruments. Finally it describes how data was analyzed and presented.

### 3.2 Research Design

A correlational design was used to investigate the research questions. Correlational designs are used when researchers are interested in establishing relationships between two or more variables. Gall, Gall and Borg (2003) indicated that correlational designs involve discovering both the direction and degree of the associations among variables without manipulating the variables. Although correlational design does not establish the cause and effect as an experimental design, the approach can ascertain potential causal factors for relationships among variables. According to Creswell (2002) a correlational design is well suited for identifying the type of association, explaining complex relationships of multiple factors that explain an outcome and predicting an outcome from one or two predictors.

### 3.3 Study Area

The study area is Faulu Kenya DTM Ltd. The MFI has 40 banking branches in all the 47 Counties in Kenya. Faulu Kenya is chosen for the study because it is the only DTM with a wide national coverage. Kenya is a country in East Africa, 580,367 km<sup>2</sup> (224,081 sq mi) in size and lying latitudes 5°N and 5°S, and longitudes 34° and 42°E.

### 3.4 Target Population

The target population for this study were employees of Faulu Kenya DTM Ltd. Currently; Faulu Kenya has 1500 staff distributed in 40 branches. The target population for the study are Credit Managers/Credit Officers in Faulu Kenya DTM.

### 3.5 Sampling

According to Bartlett, Kortrijk and Higgins (2001) sample size of a statistical sample is the number of observations that constitute it. The sample size is drawn from the target population

of the study. In surveys, a sample size is composed of respondents drawn from the larger population.

### 3.5.1 Sample Size

Stratified random sampling formula proposed by Krejcie & Morgan (1970). The target population of Credit Managers/Credit Officers in the 27 branches was 96. Using a simple sampling formula:

$$S = \frac{X^2 NP(1 - P)}{d^2(N - 1) + X^2 P(1 - P)}$$

$S$  is required sample size;  $X^2$  is the table value of chi-square for 1 degree of freedom at the desired confidence level (3.841);  $N$  is the population size;  $P$  is the population proportion (assumed to be .50 since this would provide the maximum sample size) and lastly,  $d$  = the degree of accuracy expressed as a proportion (.05).

$$S = \frac{3.841^2 NP(1 - 0.50)}{0.05^2(96 - 1) + 3.841^2 0.5(1 - 0.5)} = 90.192$$

Therefore, the sample size, for  $N=96$ , sample size is 90. A total of 90 respondents participated in the study.

## 3.6 Data Collection

### 3.6.1 Sources of Data

Data is defined as the information gathered for the purposes of the study. Primary data was collected to answer the research questions. Primary data refers to information that the researcher has obtained from the field. This included data from questionnaires.

### 3.6.2 Data Collection Procedure

Questionnaires and interviews were administered to the respondents at the place of work. Completed questionnaires and interview transcripts were saved physically and electronically for data analysis.

Secondary data collection sheet was used to collect secondary data. The major advantages of using secondary data are economic: using secondary data is less costly and time-consuming than collecting primary data. Its disadvantages relate not only to the availability of sufficient

secondary data but also to the quality of the data that is available. However, statements of credit performance are standard reports that comply with legal and regulatory requirements hence issues of availability and quality arose.

### **3.6.3 Instrument for Data Collection**

Primary data was collected using questionnaires and structured interviews. Questionnaires allow for the collection of standardized information that can either be expressed numerically or in short responses. Again, questionnaires grant anonymity to respondents and eliminate the impacts of researcher obtrusiveness. Finally, these data collection instrument is relatively inexpensive to administer and significantly easier to analyze.

Structured interviews allowed for the collection of standardized information that can either be expressed numerically or in short responses. Structured interviews were relatively inexpensive to administer and significantly easier to analyze. The interviews were administered through phone calls or face-to-face where applicable. The interviews collected information on the credit policies at Faulu DTM.

### **3.6.4 Validity Tests for Data Collection Instrument**

Validity is defined as the degree to which a test measures what it purports to measure. A questionnaire is said to be valid if it collects the information the researcher intends to obtain from the respondents. To ensure high levels of validity, the survey instrument was pilot tested before use in actual data collection (Creswell, 2009). The pilot study results were used to remove any ambiguities and improve the data collection instruments.

### **3.6.5 Reliability Tests for Data Collection Instrument**

The term reliability refers to the extent to which results are consistent over time and accurately represent the total population under study. If the results of a study can be reproduced under a similar methodology, then the research instrument is considered to be reliable. The reliability of the research instrument was tested using Pearson product moment correlation coefficient. An instrument with a Cronbach's Alpha Reliability Coefficient value of 0.7 was considered reliable for data collection.



### 3.7 Data Analysis

All the data was entered into an Excel sheet, organized and cleaned for any inconsistencies. The Excel data sheet was uploaded into Statistical Packages in Social Sciences software (SPSS 21) for data analysis. Descriptive statistics: means and standard deviations, and inferential statistics: linear regressions were used to analyze the data.

#### 3.7.1 Model Specification

Linear regression model was used to test the effect of client appraisal policies, credit risk policies, and debt collection policies on credit performance at Faulu Kenya.

The model will take the form of:

$$Y = \beta_0 + \beta_1 X_1 + \varepsilon$$

Where:

Y = Credit performance

$X_1$  = Client Appraisal Policies (CAP)/Credit Risk Policies (CRP)/Debt Collection Policies (DCP)

$\varepsilon$  = Error term

$\beta_1$  = slope of the regression equation

$\beta_0$  is the intercept

### 3.8 Data Presentation

The data was presented in tables, charts, and graphs.

## 4.0 CHAPTER FOUR

### RESULTS AND DISCUSSION

#### 4.1. Introduction

The study investigated the effect of the institutional credit management factors: client appraisal, credit risk control, and debt collection policies and how they affect credit performance in Faulu Kenya. This section presents the descriptive and inferential data analysis, presentation and interpretation of findings.

#### 4.2 Demographic Information

A total of 80 questionnaires were administered, out of which 72 were completed and returned, representing a response rate of 90%. The response rate was satisfactory for data analysis.

The demographic profiles of the respondents were analyzed and the results show that, a majority were male (87.5%), compared to the female respondents (12.5%). A majority of the respondents were aged between 31-40 years and accounted for 56.9% of the sample; 23.6% were aged between 21-30 years, 15.3% were aged between 41-50 years, and 4.2% were aged over 51 years old.

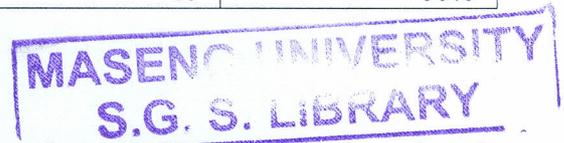
The highest educational achievement for a majority of the respondents was an undergraduate degree, accounting for 55.6%, followed by certificate/diploma constituting 20.9% of the credit officers. A significant proportion also had masters' degrees (16.7%), while only a few people had a PhD (6.9%).

The study also established that a higher proportion of the respondents have worked in the company for more than 3 years (55.6%). Credit officers who had worked for Faulu Kenya for 1-3 years accounted for 36.1% of the sample, and only 8.3% had been with the institution for less than 1 year at the time of the data collection. This means that a significant number of the respondents had been with the MFI long enough to understand how the institutional credit management factors: client appraisal, credit risk control, and debt collection policies, affect credit performance.

**Table 4.1: Demographic Information**

Demographic characteristics	Measure	Frequency	Percentage
Gender	Male	63	87.5
	Female	9	12.5
Age	21-30 years	17	23.6
	31-40 years	41	56.9
	41-50 years	11	15.3
	Over 50 years	4	4.2
Educational Level	Certificate/Diploma	15	20.9
	Degree	40	55.6
	Masters	12	16.7
	PhD	5	6.9
Duration	Less than 1 year	6	8.3
	Between 1-3 years	26	36.1
	Over three years	40	55.6

#### 4.3. Credit Appraisal Policies



Credit appraisal policies are characterized by assessing the trustworthiness and integrity of the business owner, determining the borrower's capacity to pay, evaluating the capital investment in the business, assessing capital and conditions under which the business is operating; plays a big role in determining the credit performance of the financial institution. These considerations are generally known as the 5Cs: character, collateral, capacity, capital and condition and play a big role in the application process.

The findings show that all the 5Cs were considered in evaluating and approving loans. Collateral was the most important factor evaluated by credit officers before approving a loan, with the highest mean of 4.33. The character was also an important tool for weighting the client's credit worthiness ( $M=3.92$ ), as well as the capacity to pay ( $M=3.89$ ). The capital invested in the business ( $M=3.83$ ) and the conditions under which the business was operating, in terms of the borrower's sensitivity to external forces such as interest rates, inflation rates, business cycles, and competitive pressures was also found to be an important aspect considered during the evaluation of a loan application ( $M=3.75$ ). The breakdown of the responses, with regard to the Likert-type scale and the measures of central tendency (means and standard deviation) for each of the 5Cs is presented in Table 4.2.

**Table 4.2: Client appraisal policies**

	SA	A	N	D	SD	Mean	Std. Deviation
Client appraisal considers the character of the customers seeking credit facilities.	36.1 %	36.1 %	18.1 %	2.8%	6.9 %	3.92	.135
Aspects of collateral are considered while appraising clients.	62.5 %	16.7 %	13.9 %	5.6%	1.4 %	4.33	1.007
The lender considers the conditions under which the business is operating and which may affect repayment	20.8 %	52.8 %	15.3 %	11.1 %	0%	3.75	1.110
The lender considers the capital the client has invested in the business.	20.8 %	52.8 %	15.3 %	11.1 %	0%	3.83	0.888
Failure to assess customers capacity to repay results in loan defaults	34.7 %	41.7 %	6.9%	11.1 %	5.6 %	3.89	1.170

#### 4.4.Credit Risk Management Policies

There are various credit risk control measures are employed at Faulu Kenya, such as loan size limits, regular credit checks, flexibility in loan repayment periods, penalties for late repayment, and use of credit application forms. The respondents were asked to rank various characteristics of credit risk policy in the institution.

A majority of the respondents agreed that the use of customer credit application forms improved monitoring and credit management (M=4.24). An equally high number of respondents were of the opinion that imposing loan limits has proven to be a viable strategy in credit management (M=4.21). Further, flexible loan repayment periods was also linked to improvement in credit management (M=3.97). Faulu Kenya also has in place penalties for late repayment as a credit risk policy aimed at enhancing the commitment of customers to loan repayment (M=3.76). Credit checks were also used to enhance credit management (M=3.67). The findings show that Faulu Kenya has put into place credit risk policies as shown in Table 4.3.

**Table 4.3: Credit risk control policies**

	SA	A	N	D	SD	Mean	Std. Deviation
Imposing loan size limits is a viable strategy in credit management	79.2%	0%	1.4%	1.4%	18.1%	4.21	1.574
The use of credit checks on regular basis enhances credit management.	48.6%	19.4%	0%	13.9%	18.1%	3.67	1.610
Flexible repayment periods improve loan repayment	44.4%	22.2%	25.0%	2.8%	5.5%	3.97	1.150
Penalty for late payment enhances customers commitment to loan repayment	31.9%	37.5%	12.5%	11.1%	6.9%	3.76	1.216
The use of customer credit application forms improves monitoring and credit management.	47.2%	31.9%	19.4%	0%	1.4%	4.24	0.864

#### 4.5. Debt Collection Policies

Debt management policies at the MFI ranged from regular reviews, guarantee assessments, and debt recovery in case of defaults.

The study sought to establish whether there were debt collection policies in place. The results indicate that the formulation of debt collection policies has been a challenge at Faulu Kenya (M=3.93). However, regular reviews have been done on these policies to improve the state of credit management at the MFI (M=3.82). The available collection policies have played a big role in ensuring effective debt collection management (M=3.93). The enforcement of guarantee policies was also linked with improved loan recovery in cases of defaults (M=3.61). The credit officers agree that a stringent policy is more effective in debt recovery than a lenient policy (M=3.40). The findings are presented in Table 4.4.

**Table 4.4: Debt collection policies**

	SA	A	N	D	SD	Mean	Std. Deviation
Available collection policies have assisted towards effective credit management.	34.7%	22.2%	30.6%	1.4%	11.1%	3.68	1.276
Formulation of collection policies have been a challenge in credit management.	41.7%	26.4%	23.6%	0%	8.3%	3.93	1.191
Enforcement of guarantee policies provides chances for loan recovery in case of loan defaults	31.9%	22.2%	27.8%	11.1%	6.9%	3.61	1.240
Regular reviews have been done on collection policies to improve state of credit management.	38.9%	22.2%	29.2%	1.4%	8.3%	3.82	1.214
A stringent policy is more effective in debt recovery than a lenient policy	23.6%	29.2%	20.8%	16.7%	9.7%	3.40	1.285

#### 4.6. The Effect of Institutional Factors on Credit Performance

Multiple regression analysis was performed to establish the effect of institutional factors based on the model presented in Section 3.6.1. The Model Summary indicates an Adjusted R square of 0.786. Adjusted R square is a coefficient of determination showing the variation in the dependent variable that is caused by the dependent variables. The findings show credit appraisal, credit risk, and debt collection policies are responsible for a 78.6% variation in credit performance-at Faulu Kenya a 95% confidence level, as shown in Table 4.5. There is a strong positive relationships between the study variables.

**Table 4.5: Model Summary**

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.891 <sup>a</sup>	.795	.786	.29145
a. Predictors: (Constant), Debt Collection Policies, Credit Appraisal Policy, Credit Risk Control Policies				

Analysis of Variance (ANOVA) was performed to test if the regression model is satisfactory for making conclusions about the relationship between institutional factors and credit

performance. ANOVA statistics indicate a significance level of 0.000 at 95%, hence the model is statistically significant.

**Table 4.6: ANOVA**



**ANOVA<sup>a</sup>**

Model	Sum of Squares	Df	Mean Square	F	Sig.
1 Regression	22.364	3	7.455	87.761	.000 <sup>b</sup>
Residual	5.776	68	.085		
Total	28.140	71			

a. Dependent Variable: Performance

b. Predictors: (Constant), Debt Collection Policies, Credit Appraisal Policy, Credit Risk Control Policies

From the multiple regression coefficients in Table 4.7, the regression model is:

$$Y = 0.914 + 0.112X_1 + -0.111X_2 + 0.777X_3$$

If institutional factors are held to a constant zero, the financial performance is 0.914. A unit increase in credit appraisal efficiency would lead to an increase in financial performance by 0.112, a unit increase in credit risk controls would lead to a decrease in financial performance by -0.111 and a unit increase in debt collection efficiency would lead to an increase in financial performance by 0.777 as shown in Table 4.7.

**Table 4.7: Coefficients**

**Coefficients<sup>a</sup>**

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
(Constant)	.914	.305		2.997	.004
1 Credit Appraisal Policy	.112	.075	.086	1.483	.143
Credit Risk Control Policies	-.111	.095	-.131	-1.170	.246
Debt Collection Policies	.777	.086	.981	9.023	.000

a. Dependent Variable: Performance

The regression coefficients also indicate that the relationship between credit appraisal policy ( $t = 1.483$ ,  $p=0.143$ ) and credit performance is not statistically significant at 95% significance

level. The coefficients show that there is an inverse relationship between credit risk control policy ( $t = -1.170$ ,  $p=0.246$ ) at 95% significance level. However, there was a significant relationship between debt collection policies and credit performance ( $t = 9.023$ ,  $p=0.000$ ) at 95% significance level

Credit appraisal is the first stage in loan application. Ditcher (2003) demonstrated that the success of lending out credit depends on the methodology applied to evaluate and to award the credit. The importance of appraisal controls reported in this study is supported by earlier studies. Weston (2003) noted that the aim of collection efforts is to accelerate collection from slow payers, reduce bad debt and losses, and improve turnover. On the contrary, Kiplimo and Kalio (2014) reported that client appraisal significantly increased loan performance among MFIs in Baringo County.

The findings on credit risk management are corroborated by Musyoki and Kadubo (2012) which investigated the impact of credit risk management on the financial performance of banks in Kenya between 2000 and 2006. The study reported that credit risk management had an inverse relationship with financial performance. The study further indicated that default rate, as opposed to credit management controls, was a stronger predictor of financial performance. This disagrees with Benedikt, Marsh, Vall and Wagner (2006) who reported that credit risk management policies leads to a permanent increase in target loan level.

The findings in this study differ slightly with another study in Kenya by Gatuhu (2013) which investigated credit management policies in 59 MFIs and established that there was a significant relationship between credit appraisal ( $p =0.029$ ), credit risk controls ( $p=0.032$ ), and collection policy ( $p=0.012$ ). Comparatively, this study finds that only debt collection policies have a significant effect on financial performance.

Moti, Masinde, Mugenda, and Sidhani (2012) also investigated the effectiveness of credit management system on loan performance in the microfinance sector in Kenya. The study reported that debt collection measures has a higher and significant effect on loan repayment ( $p=0.000$ ) compared to client terms, client appraisal, and credit risk measures. Another study by Warue (2012) indicated that debt collection policies have a positive and significant effect on loan delinquency and overall microfinance performance. In general, these findings support CGAP (2009) report that loan delinquency, and by extension microfinance performance, is related to the inability of clients to repay their loans, poor appraisal and client tracking systems, and poor collection practices and domestic problems.

## **5.0.SUMMARY OF FINDINGS, CONCLUSION AND RECOMMENDATIONS**

### **5.1.Introduction**

The chapter presents the summary of the findings, conclusions and recommendation of the study. The presentation is aligned with the research objectives.

### **5.2.Summary of Findings**

Data was collected from credit officers at Faulu Kenya. Descriptive analysis showed that the number of male credit officers were the majority. Most respondents were aged between 31-40 years, with the highest educational level being an undergraduate degree, and had been with the MFI for more than three years.

On credit appraisal policies, the most important factor was evaluation of collateral before approval a loan. However, equal importance was placed on the client's worthiness, capacity to pay, capital invested in business, as well as the general conditions that were likely to affect the business being funded. Multiple regressions revealed that credit appraisal policies did not have a statistically significant effect on credit performance.

On risk control and management policies, the study examined the level of importance of loan size, regular credit checks, flexibility of loan repayment periods, penalties for non-payment, and the procedure of applications. The most important consideration was the use of customer credit forms in risk monitoring and management. Loan limits was also an important consideration. Flexibility in loan repayment, penalties for late repayment and routine credit checks on customers, were found to be of moderate importance. Multivariate analysis showed that there was an inverse but insignificant relationship between risk management and credit performance.

For micro financing institution achieving highest loan repayment performance enables to accomplish this mission for expanding and delivering quality services to the poor without suffering financial shortages. The poor loan repayment performance undermines the financial position of MFI, which further hinders the cyclical flow of funds between institution and borrowers. Debt collection policies encompass putting into place a policy framework, enforcing policies, regularly reviewing policies, and pursuing loan defaulters. Findings show a predominant focus on developing a policy framework, but enforcement, regular reviews,

and pursuit of defaulters are comparatively less prominent. Regression coefficients revealed that efficient debt collection policies positively affect credit performance at Faulu Kenya.

### **5.3. Conclusions**

The study sought to establish the relationship between institutional factors and credit performance, by examining credit appraisal, credit risk management and debt collection strategy. Descriptive analysis demonstrated the high level of importance placed on all the policies included in this study. For client appraisal policies, character, collateral, conditions, capital, and capacity when evaluating loan applications, were considered very important. The credit risk control policies encompassed loan size limits, regular credit checks, flexibility in loan repayment periods, penalties for late repayment, and use of credit application forms. Debt collection strategies included establishing of a policy framework, enforcement, regular reviews, and pursuing loan defaulters.

Regression statistics revealed that there was a statistically significant relationship between debt collection policies and credit performance. However, similar results were not demonstrated for client appraisal and credit risk control policies. The level of importance on these policies shows that financial institutions must establish strong frameworks for evaluating customers; minimize risks related losses through diligent management of portfolio and cash-flow by building robust institutional infrastructure with skilled human resources and inculcating client discipline, through effective coordination of stakeholders; and institutions regularly reviewed the policy and enforced guarantee policies to ensure effective debt collection.

### **5.4. Recommendations**

The study reports that there is no statistically significant association between client appraisal and credit performance. It is therefore necessary for the MFI to constantly review and strengthen client appraisal techniques. Accurate and objective assessment of the credit worthiness of the clients works towards reducing the level of non-performing loans.

There was no significant relationship between credit risk control and credit performance. Credit provision is a risky business hence there must be an effective credit control system to decrease loan defaults and improve financial performance.

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Debt collection policies were significantly related to credit performance. In addition to the policies in place, the MFi should ensure there is adequate monitoring of lenders to curb diversion of funds which is one of the main factors behind loan defaults.

### **5.5 Limitations and Areas for Further Research**

The study was limited to Faulu Kenya Ltd. Further research can expand the scope to establish the relationship between institutional factors and credit performance in other microfinance institutions in Kenya.

The study focused on a small set of institutional factors that impact on credit performance. While the study reports that client appraisal, credit risk control, and debt collection policies affect credit performance, there is need for further research on internal institutional mechanisms that may also affect credit performance but which have not been captured by the study.

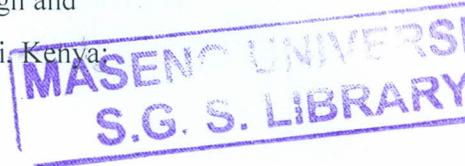
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