

**THE EFFECT OF LEVERAGE ON FINANCIAL PERFORMANCE
OF MICROFINANCE INSTITUTIONS IN NAKURU COUNTY**

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DECLARATION

I declare that this project is my original work and has not been submitted for examination in any other university.

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This project has been submitted for examination with my approval as the university supervisor

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DEDICATION

This project is dedicated to my family; my father Dr. George Nyameyo and my mother Anne Nyameyo, who both instilled in us the value and importance of education in our lives and to always strive to achieve the best in our endeavours. My siblings Beryl, Rachael Svetlana and Lyton who in one way or the other gave me the zeal and zest to soar to greater heights. May you achieve more than this.

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LIST OF ABBREVIATIONS

ANOVA	Analysis of Variance
CBK	Central Bank of Kenya
GMM	Generalized Method of Moments
MFIS	Microfinance Institutions
ROA	Return on Assets

ABSTRACT

The aim of this study was an attempt to determine the effect of financial leverage on financial performance of microfinance institutions in Nakuru County. The sample data was extracted from financial statements of seven licensed micro finance institutions in Kenya as at 31st June 2013. Census was used in getting the information. The study used secondary data since the nature of the data to be collected was quantitative in nature. The study used secondary data sources of a five year period from 2009-2013 based on the accessibility and availability of data. Data collected was sorted, cleaned and coded and then entered into Statistical Package for Social science for analysis. A multiple regression model was used to show the relationship between the independent and the dependent variables. The model explains the relationship between four variables namely: debt to equity ratio, portfolio to assets ratio and operating expense ratio (Independent variables) with financial performance (the dependent variable). The Pearson's r for the correlation between the Debts divided Equity ratio and ROA variables is 0.884. This means that there was a strong positive relationship between the two variables. Since the Sig (2-Tailed) value is less than 0 .05. It was concluded that there is a statistically significant correlation between the two variables at the 0.01 level. This means that there is a strong relationship between the two variables. According to the regression analysis, the findings revealed that 66.3% is explained by the variables under the study meaning that the model is a good predictor. Central banks of Kenya should encourage commercial banks to use leverage in managing risks. This is because the relationship between operating leverage and financial leverage is multiplicative rather than additive. Operating leverage and financial leverage can be combined in a number of different ways to obtain a desirable degree of total leverage and level of total firm risk. Future researchers may extend study period and may also take all the deposit taking Sacco that are regulated by SASRA. Researcher can also conduct comparative study by taking data from deposit taking Sacco's and Non deposit taking Sacco to check the relationship between financial leverage and financial performance. The study was limited to one county:Nakuru County and therefore the findings and recommendations made on this study cannot be used to make generalization of other microfinance institutions operating in the 47 counties in Kenya. It is therefore important for future researchers to test the same variables on all the microfinance institutions in all the counties then findings and conclusions can be made based on concrete facts and evidence.

CHAPTER ONE

INTRODUCTION

1.1 Background of Study

In the current business environment financial managers have adopted various capital structures as a means to that goal. A firm can finance its investment by debt and equity. The use of fixed-charged funds, such as debt and preference capital along with the owner's equity in the capital structure is described as financial leverage or gearing (Dare and Sola, 2010). An unlevered firm is an all-equity firm, whereas a levered firm is made up of ownership equity and debt (Olweny and Mamba, 2011).

Financial leverage takes the form of a loan or other borrowing (debt), the proceeds of which are (re)invested with the intent to earn a greater rate of return than the cost of interest (Chengand Tzeng, 2010). If the firm's marginal rate of return on asset (ROA) is higher than the rate of interest payable on the loan, then its overall return on equity (ROE) will be higher than if it did not borrow. On the other hand, if the firm's return on assets (ROA) is lower than the interest rate, then its return on equity (ROE) will be lower than if it did not borrow (Athanasoglou, Brissimis and Delis, 2006). Leverage allows a greater potential returns to the investor than otherwise would have been available, but the potential loss is also greater: if the investment becomes worthless, the loan principal and all accrued interest on the loan still need to be repaid (Andy et al., 2002).

This constitutes financial risk (Pandey; 2008). The degree of this financial risk is related to the firm's financial structure. The total combination of common equity, preferred stock and short and long term liabilities is referred to as financial structure. That is, the manner in which the firm finances its assets constitutes its financial

structure. If short-term liabilities are subtracted from the firm's financial structure, we obtain its capital structure. In other words, the firm's permanent or long-term financing consisting of common equity, preferred stock and long term debt is called capital structure (Van Horne, 2002). Hence, the objective of financial management in structuring a firm's capital components is to maximize the shareholders wealth, as a measure of performance. Based on the above, the problem of this study is to analyze the implications of financial leverage on performance. Also considering that maximizing accounting profit and maximizing shareholders value are not identical because of shareholders losses from agency costs, it is therefore pertinent to see how capital structure affect shareholders value (Molyneux and Thornton, 1992).

1.1.1 Leverage

Leverage, sometimes referred to as gearing is a general term for any technique to multiply gains and losses. Leverage is the use of fixed costs in a company's cost structure (Dare and Sola, 2010). Operating leverage relates to the company's operating cost structure and financial leverage relates to the company's capital structure. Most often it involves buying more of an asset by using borrowed funds, with the belief that the income from the asset will be more than the cost of borrowing. Almost always this involves the risk that borrowing costs will be larger than the income from the asset leading to incurred losses. The amount in which a purchase is paid for in borrowed money. The greater the leverage, the greater the possible gain or potential loss (Cheng and Tzeng, 2010).

Leverage allows a financial institution to increase the potential gains or losses on a position or investment beyond what would be possible through a direct investment of its own funds. There are three types of leverage; balance sheet, economic, and

embedded and no single measure can capture all three dimensions simultaneously. The first definition is based on balance sheet concepts, the second on market-dependent future cash flows, and the third on market risk. Balance sheet leverage is the most visible and widely recognized form (Hart, 2002).

The leverage ratio can thus be thought of as a measure of balance sheet or, to the extent that it also includes off-balance-sheet exposures economic leverage. A firm can finance its investment by debt and/or equity. The use of fixed-charged funds, such as debt and preference capital along with the owner's equity in the capital structure is described as financial leverage or gearing (Dare and Sola, 2010). An unlevered firm is an all-equity firm, whereas a levered firm is made up of ownership equity and debt. Financial leverage takes the form of a loan or other borrowing (debt), the proceeds of which are (re)invested with the intent to earn a greater rate of return than the cost of interest. If the firm's marginal rate of return on asset (ROA) is higher than the rate of interest payable on the loan, then its overall return on equity (ROE) will be higher than if it did not borrow (Molyneux and Thorton, 1992).

Leverage allows a greater potential returns to the investor than otherwise would have been available, but the potential loss is also greater: if the investment becomes worthless, the loan principal and all accrued interest on the loan still need to be repaid. This constitutes financial risk. The degree of this financial risk is related to the firm's financial structure. The total combination of common equity, preferred stock and short and long term liabilities is referred to as financial structure. That is, the manner in which the firm finances its assets constitutes its financial structure. If short-term liabilities are subtracted from the firm's financial structure, we obtain its capital structure (Naceur and Goaid, 2008).

1.1.2 Financial Performance of Microfinance Institutions

Performance refers to the accomplishment of a given task measured against preset standards of accuracy, completeness, cost, and speed. In other words, financial performance refers to the degree to which an achievement is being or has been accomplished. Most microfinance institutions apply the recommended measures for financial analysis that determine a firm's financial performance through grouping these measures into five broad categories namely liquidity, solvency, profitability, repayment capacity and financial efficiency (Bush and Kick, 2009).

Performance refers to how well a company is using its resources to make profits or create shareholder value. Financial measures are expressed in monetary units. The techniques used for analytical purposes include; ratios, trends analysis and cross sectional analysis (Van Horne, 2002). A ratio is a mathematical expression of an amount in terms of another. Financial performance in financial institutions refers to the ability to operate efficiently, profitability, survive grow and react to the environmental opportunities and threats. In agreement with this, performance is measured by how efficient the enterprise is in use of resources in achieving its objectives (Pandey, 2008).

When determining the financial performance of a firm most microfinance institutions review past and present financial information since they are not the only factors affecting a firm's financial performance rather measuring a group performance is more important than focusing on only one or two measures at the exclusion of others, (Crane, 2010). The financial indicators of financial performance applied by most microfinance institutions include: sales growth, return on investment (ROI), and return on sales, return on equity (ROE), and earnings per share. The ratios that

measure organizational performance can be summarized as profitability and growth: return on asset (ROA) and return on investment (ROI) (Drago, 1990). Return on average assets and return on equity are used as financial measures when determining the level of financial performance of microfinance institutions (Olwenyand Mamba, 2011).

1.1.3 The Relationship between Leverage and Financial Performance of Microfinance Institutions

Microfinance institutions often use leverage when constructing their capital structure, which helps lower total financing cost. In addition to the relatively lower cost of debt financing, using debt has other advantages compared to equity financing, despite potential issues that using debt may cause, such as ongoing financial liabilities and potential bankruptcy risk (Bourke,1989).Therefore leverage can magnify both gains and losses of the microfinance institutions. A firm can utilize its debt to invest in profitable investments to make profits or create shareholder value this increases the financial performance of a firm

Use of leverage helps microfinance institutions to improve on their financial performance since they are able to keep profits within a company and increases returns on equity for current company owners and helps secure tax savings (Dang 2011).The importance of using leverage to finance assets by microfinance institutions compared to equity is because debt requires lower financing cost, this positively impacts on financial performance of firms (Bikkerand Hu, 2002).Most microfinance institutions often mix debt into their capital structure to bring down the average financing cost. Using debt, microfinance institutions are contractually liable to make periodic interest payments and return debt principal at maturity (Molyneuxand Thorton, 1992).

As a result, the firms bear less risk, compared to firms that finance their assets using equity. Upon liquidation of the firm, debt holders have more claiming rights to company assets; this gives them security for their investments (Boyd and Rankles 1993). Microfinance institutions that finance their projects using leverage might easily retain profits and financial performance within the firm as compared to using equity, firms prefer leverage to finance stable business operations in which they can more easily make ongoing interest payments and retain the rest of the profits to themselves.

Firms that use leverage to finance their assets are likely to pay low taxes due to allowable interest deductions. Tax rules permit interest payments as expense deductions against revenues to arrive at taxable income. The lower the taxable income, the less taxes a company pays. For instance dividends paid to equity holders are not tax-deductible and must come from after-tax income. Tax savings help further reduce a company's debt financing cost, which is an advantage that equity financing lacks which might significantly lead to financial performance (Lazarus, 1997).

1.1.4 Microfinance Institutions in Nakuru County

Microfinance refers to all types of financial intermediation services; savings, credit funds transfer, insurance, pension remittances, provided to low-income households and enterprises in both urban and rural areas, including employees in the public and private sectors and the self-employed (Robinson, 2001). It can be considered at several levels of institutional, group, and individual and can relate to organizational, managerial, and financial aspects (Rao, 2001). As of 2007, the Central Bank of Kenya, CBK reported the existence of 56 micro finance institutions (MFIs) operating in Kenya. MFIs in Nakuru County are mostly branches or units whose headquarters are domiciled in the capital, Nairobi Kenya (CBK, 2013). Nakuru County has seven

micro finance institutions which are dispersed in major towns where they have operational footprint.

Most of these MFIs have branches countrywide, enhancing their outreach to deserving Kenyans, and thus deepening financial inclusion as a way of expansion and growth. In Kenya, MFIs face challenges between achieving financial performance and contribution to poverty reduction, this negatively affects their financial performance. The performance of micro finance institutions can be affected by internal and external factors. These factors can be classified into specific (internal) and macroeconomic variables. The internal factors are individual characteristics of the microfinance institution which affects its financial performance; these factors are basically influenced by the internal decisions of management and board. The external factors are sector wide or country wide factors which are beyond the control of the firm and thus negatively affect the profitability of any financial institution for example change of technology (Robinson, 2001).

1.2 Research Problem

High leverage may initiate clashes between managers and shareholders due to selection of investment equity, debt or hybrid. When the leverage is relatively high to a certain limit, it leads to an increase in debt and it will increase cost of debt, including an increase in cost of bankruptcy or financial distress due to conflicts between equity holders and bondholders. To make distinction between these two sources of agency costs empirically is very difficult (Naceur and Goaid, 2008). Argument of free cash flow predicts that higher leverage might raise financial performance due to the reason that managers of such firms are lesser able to initiate with projects showing negative net present value.

In Kenya, microfinance institutions in Nakuru County may consider to use leverage to finance their projects. Leverage is a keystone mechanism that can be deployed by management to maximize shareholder return and boost financial performance of microfinance institutions. When cash is not available for investing in projects that create value for the microfinance institutions, firms may apply leverage in order to tap into opportunities that generate additional returns for the organization. These kinds of projects should maximize value for shareholders in the long run. The use of leverage in the capital structure lowers the firms weighted average cost of capital and provides tax gains for most microfinance institutions in Kenya that lack adequate finances to finance their projects and purchase assets.

Leverage comes at a price. When leverage increases, studies indicate that the risk attributable to the firm also increases. Leverage raises the chances of bankruptcy for the organization. Cash-flows are directed towards the servicing of debts regardless of whether the company makes a profit or not. Bikerand Hu (2002) in their study concluded that debt was one of the cheapest sources of financing a firm. It was found that firms that used debt to finance their assets performed better than those that used equity. Other researchers; Bourke(1990), investigated on the relationship between expenses and profitability, the study revealed that the higher the expenses of a financial institution the lesser the profitability of a financial institution. This negative relationship between expenses and profitability has been supported by Bourke (1989) implying that profitable banks are able to operate at lower costs.

Studies have been done in relation to financial performance of microfinance institutions in Kenya: Njoroge (2008) found that the size of loan to members relative to total asset was positive and highly significant predictor of performance, confirming

the priori premise that loan is the most productive asset of any financial institution. Other researchers:Adongo (2012) in his study found that there was an insignificant relationship between returns adjusted by risk and financial leverage on firms listed at the Nairobi Securities Exchange.Nduati (2010) investigated on the relationship between leverage and financial performance; it was found that there was a positive correlation between leverage and financial performance.

The above studies have not addressed or examined the relationship between leverage and financial performance of microfinance institutions.This study therefore attempts to answer the following researchquestion: what is the effect of leverage on financial performance of microfinance institutions in Nakuru County?

1.3 Objective of the study

To determinethe effect of leverage on financial performance of microfinance institutions in Nakuru County.

1.4 Value of theStudy

The findings of this study will be resourceful to microfinance institutions; it will shed more light on how a firm can finance its assets and projects using leverage. Firms that lack sufficient capital to invest in projects might also benefit from the findings of this study since they can gain more knowledge on the advantages of financing assets by use of debt.

This study may be useful to the government and other policy makers in setting policies that encourage financial institutions to issue debts to their customers in order to grow and expand businesses. Debt is one of the cheapest sources of income if the processes of issuing loans by financial institutions are well managed.

Researchers and academicians interested in this topic or other related topics stand to benefit from the findings of this study since they can learn on the importance of using leverage as a source of financing. Researchers can also use this study as a basis for further research.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

The section covers the theories in relation to leverage and financial performance; it also provides the determinants of financial performance, empirical studies and the summary of the literature review.

2.2 Theoretical Framework

This section covers theories that show the effect of leverage on financial performance of firms. These theories are namely: portfolio theory, theory of finance and trade off theory.

2.2.1 Portfolio Theory

This theory was put forward by Markowitz (1952); the portfolio theory provides a normative approach to the investor's decision to invest in asset or securities under risk. It is based on the assumption that investors are risk averse. This implies that investor hold well diversified portfolio instead of investing their entire wealth on single asset or security (Nawrocki, 1997). Portfolio is a combination of individual assets or securities. Profit is the ultimate goal of commercial banks. All the strategies designed and activities performed thereof are meant to realize this grand objective. However, this does not mean that commercial banks have no other goals. Microfinance institutions could also have additional social and economic goals (Myers and Stewart, 1984).

Modern Portfolio Theory is a normative theory that asserts that investors should choose investments based on discounted future expected returns and that for

maximum risk adjusted returns, investors should diversify across industries and asset classes. The theory is simple, but application requires many variations and refinements to accommodate circumstances and can be quite difficult to achieve (Black, Jensen and Scholes, 1972).

Modern portfolio theorists argue that firms should diversify their portfolios in order to achieve financial performance. It is possible for an investor to always have a fund available for withdrawals that would be up in the current market, thus avoiding permanent loss of value due to bad timing (Israelson, 2001). MPT was further refined by Sharpe and Tobin (1988) into the Capital Asset Pricing Model (CAPM). In the CAPM, mean variance analysis by investors is assumed. The CAPM decomposes the risk of an investment into two kinds of risk, systematic and specific. In the CAPM, Sharpe (1988) said that “the market does not reward specific risk, since specific risk can be offset by diversifying the portfolio”. In contrast to the normative nature of MPT, the CAPM is a descriptive theory of equilibrium relationships between expected rates of return and risk (Black, Jensen and Scholes, 1972).

2.2.2 Theory of Finance (Financial Intermediation)

This theory was put forward by Martin, Cox, and MacMinn (1988). The theory of finance in a modern sense starts with the Modigliani and Miller (1958) capital structure irrelevance proposition. Before Modigliani and Miller, there was no generally accepted theory of capital structure. They start by assuming that the firm has a particular set of expected cash flows. When the firm chooses a certain proportion of debt and equity to finance its assets, all that it does is to divide up the cash flows among investors. Investors and firms are assumed to have equal access to financial markets, which allows for homemade leverage. The investor can create any leverage

that was wanted but not offered, or the investor can get rid of any leverage that the firm took on but was not wanted. As a result, the leverage of the firm has no effect on the market value of the firm (Mossin, 1973).

As a matter of theory, capital structure irrelevance can be proved under a range of circumstances. There are two fundamentally different types of capital structure irrelevance propositions. The classic arbitrage-based irrelevance propositions provide settings in which arbitrage by investors keeps the value of the firm independent of its leverage (Stiglitz, 1981). Finance theory stresses cash flow and the expected return on competing assets. The firm's investment opportunities compete with securities stockholders can buy. Investors willingly invest, or reinvest, cash in the firm only if it can do better, risk considered, than the investors can do on their own. Finance theory thus stresses fundamentals. It should not be deflected by accounting allocations, except as they affect cash taxes (Miller, 1991).

The proponents of this theory of finance explain how much profit a company earned compared to the total amount of shareholder equity invested or found on the balance sheet. ROE is what the shareholders look for in return for their investment. A business that has a high return on equity is more likely to be one that is capable of generating cash internally.

2.2.3 Trade off Theory

This theory was propounded by Modigliani and Miller (1958); the term trade-off theory is used by different authors to describe a family of related theories. In all of these theories, a decision maker running a firm evaluates the various costs and benefits of alternative leverage plans. Often it is assumed that an interior solution is obtained so that marginal costs and marginal benefits are balanced (Ball, 1994). The

original version of the trade-off theory grew out of the debate over the Modigliani-Miller theorem. When corporate income tax was added to the original irrelevance proposition (Modigliani and Miller, 1958) this created a benefit for debt in that it served to shield earnings from taxes. Since the firm's objective function is linear, and there is no offsetting cost of debt, this implied 100% debt financing (Andrews, 1979). To avoid this extreme prediction, an offsetting cost of debt is needed. The obvious candidate is bankruptcy (Nawrocki, 1996).

Copeland, Weston and Shastri (2003) provide a classic statement of the theory that optimal leverage reflects a trade-off between the tax benefits of debt and the deadweight costs of bankruptcy. According to Cook and Campbell (1979), a firm that follows the trade-off theory sets a target debt-to-value ratio and then gradually moves towards the target. The target is determined by balancing debt tax shields against costs of bankruptcy. Several aspects of Myers' definition merit discussion (Brealey, Richard, Stewart and Myers, 2003).

First, the target is not directly observable. It may be imputed from evidence, but that depends on adding a structure. Different papers add that structure in different ways. Second, the tax code is much more complex than that assumed by the theory (Cissell, Cissell and Flaspohler, 1990). Depending on which features of the tax code are included, different conclusions regarding the target can be reached.

Oviatt (1989) provides a useful review of the literature on tax effects. Bankruptcy costs must be deadweight costs rather than transfers from one claimant to another. The nature of these costs is important too. For the adjustment to be gradual rather than abrupt, the marginal cost of adjusting must increase when the adjustment is larger. This assumed form of adjustment cost is rather surprising since one expects to see

large fixed costs and perhaps roughly constant marginal costs. This implies a very different adjustment path. Martinand MacMinn (1988) describe the implications of alternative adjustment cost assumptions. For these reasons, we break Myers's dentition into two parts. The first part we call the static trade-off theory. The second part we call target adjustment behaviour (Markowitz, 1952).

2.3 Determinants of Financial Performance

There various determinants of financial performance that have an effect on the level of leverage of microfinance institutions namely, technological innovations, size of the firm, risk profile of the firm, liquidity and leverage of the firm.

2.3.1 Technological Innovations

The factors that have been mentioned in some studies that determine the performance of MFIs namely return on asset and yield of portfolio. Technology for example product innovation, plays an important role in enhancing financial performance of the firm (Olwenyand Mamba, 2011).

Product innovation enables the microfinance institutions to develop products that are user friendly and this leads to an increase in customer deposits since customers can easily access financial services conveniently. This leads to an increase in financial performance of microfinance institutions (Naceur and Goaid, 2008). To achieve financial performance microfinance institutions should put in place proper credit management practices to prevent financial losses that might be attributable to defaults leading to financial loss (Molyneux and Thorton, 1992).

2.3.2 Size of the Firm

The other determinant of financial performance is the size of the firm. Large firms are more likely to manage their working capitals more efficiently than small firms. Most large firms enjoy economies of scale and thus are able to minimize their costs and improve on their financial performance (Chengand Tzeng, 2010).

2.3.3 Risk Profile of the Firm

Risk profiles a significant determinant of financial performance. Proper management of working capital management components helps in reducing the costs of the firm. This highly contributes in reducing the liquidity risk of the firm and thus mitigating any financial losses that might be attributed to lack of finances to take advantage of profitable investments (Dareand Sola, 2010).

2.3.4 Liquidity of the Firm

Liquidity of the firm is a key determinant of the firm's financial performance. Liquidity risk can be measured by two main methods: liquidity gap and liquidity ratios. The liquidity gap is the difference between assets and liabilities at both present and future dates. At any date, a positive gap between assets and liabilities is equivalent to a deficit. Liquidity ratios are various balance sheet ratios which should identify main liquidity trends (Dareand Sola, 2010).

2.3.5 Leverage of the Firm

Leverage of the firm is a key determinant of financial performance of the firm. The firms leverage decisions centres on the allocation between debt and equity on financing a firm (Staikourasand Wood, 2004).Leverage affects the level and variability of the firm's after tax earnings and hence, the firm's overall risk and return.

The study of leverage is significant due to the following reasons. Operating risk refers to the risk of the firm not being able to cover its fixed operating costs. Since operating leverage depends on fixed operating costs, larger fixed operating costs indicates higher degree of operating leverage and thus, higher operating risk of the firm. High operating leverage is good when all Empirical studies have been performed to analyze the relationship between leverage and corporate performance. Gweyi, Minoos and Luyali (2013) in their paper "Determinants of leverage of Savings and Credit Co-operative Societies in Kenya". The study sample included 40 Saccos registered by Sacco Society Regulatory Authority (SASRA). High operating leverage is good when sales are rising but a risk when the sales are falling (Short, 1979).

2.4 Empirical Studies

Empirical studies have been performed to analyze the relationship between leverage and corporate performance. Gweyi, Minoos and Luyali (2013) in their paper "Determinants of leverage of Savings and Credit Co-operative Societies in Kenya". The study sample included 40 Saccos registered by Sacco Society Regulatory Authority (SASRA) extended from the period 2010 to 2012. For the data analysis, regression model was employed; the explanatory variables comprised of firm size, growth rate, liquidity profitability and tangibility, whereas the explained variable was the leverage ratio. The results show that for Saccos; there were statistical significant relationships. The results from the study revealed that firm size has significant relationship with leverage at 99% confidence level, whereas liquidity and tangibility have significant relationship with leverage at 95% confidence level.

Obradovich and Gill (2013) had researched on the impact of corporate governance and financial leverage on the value of American Firms. For this purpose a sample of

333 firms listed on New York Stock Exchange (NYSE) for a period of 3 years from 2009-2011 was selected. The co-relational and non-experimental research design was used to conduct this study by taking firm value as dependent variable and CEO, Duality, Board Size, Audit Committee and Financial Leverage as independent variables. The purpose of this study was to find the impact of corporate governance and financial leverage on the value of American firms. Overall outcomes show that larger board size negatively impacts the value of American firms and CEO duality, audit committee, financial leverage, firm size, return on assets and insider holdings positively impact the value of American firms.

Andy et al.(2002) had investigated the Effects of Financial Leverage on Future Stock Value at the Stock Exchange. The research statistical population which consisted of those from Tehran stock exchange listed active cement industry companies analyzed from 2005 to 2008. By taking financial leverage and market to book value ratio as variable and to analyze data and test hypothesis of the present research, descriptive and inferential analyzing methods and SPSS statistical software were applied. They concluded that leverage does not affect future stock value of the firm. The results indicate non-response of capital market against levered nature of the firm. Lack of relationship between leverage and firm value approves net operational income (NOI) theory and Miller and Modigliani (M.M) theory.

Akhtar et al. (2012) had investigated the impact of influence on shareholders return. In their paper “Relationship between Financial leverage and Financial Performance: Evidence from Fuel and Energy Sector of Pakistan, they demonstrated that financial leverage has got a positive relationship with financial performance”. Hence, the companies in the fuel and energy sector may enhance their financial performance and

can play their role for the growth of the economy while improving at their optimal capital structures. In their study they employed a sample of 20 listed public limited companies from Fuel and Energy sector listed at Karachi Stock Exchange (KSE). The study aimed at measuring the relationship between financial leverage and the financial performance. To test the hypothesis, the main variables used in the study consist of a dependent variable which is financial performance of fuel and energy sector while the independent variable is financial leverage in fuel and energy sector. It was revealed that there was a statistically positive relationship between financial leverage and financial performance of firms.

The Effect of Financial Leverage on Corporate Performance of Some Selected Companies in Nigeria (Ojo (2012), empirically examines the effect of financial leverage on selected indicators of corporate performance in Nigeria. Leverage therefore significantly affects corporate performance in Nigeria. Other detailed objectives are to: Examine the impact of leverage on the earnings per share and net assets per share of corporate firms in Nigeria. The econometric findings presented in this study evidence that leverage shocks (debt/ equity ratio) have significant effect on corporate performance especially when the net assets per share (NAPS) is used as an indicator of corporate performance in Nigeria over the period covered by the study. Earnings per share depend on feedback shock and less on leverage shock. Also, the outcome exposed that the influence of shock on earnings per share indirectly disturb the net assets per share of firms as the majority of the shocks on the net assets per share was received from earnings per share of the firms.

Adongo(2012) conducted a study to establish the effect of financial leverage on profitability and risk of firms listed at the Nairobi Securities Exchange (NSE) for the

periods 1 January 2007 to 31 December 2011. A casual research design was adopted for the study. Population consisted of fifty eight companies out of which thirty companies were sampled. Sample exclude fifteen companies listed under banks and insurance because these companies are regulated and are to meet certain liquidity and leverage ratios. Six companies were suspended. Three companies were newly listed and therefore not continuously listed over the period of study. Four companies had information missing for some years required for the computation of the variables. Secondary data was used and data collected from the thirty companies sampled. Source data included NSE database, Capital Markets Authority (CMA) and Annual Audited Financial Statements of sampled companies. Data was analyzed using Statistical Packages for Social Sciences (SPSS) version 17. Cross-sectional time series fixed model was used with the regression and correlation analysis to determine the nature and the strength of the relationship between the independent and dependent variables. Based on the regression and correlation analysis, the findings of the first model indicated that 14.2% of variation in profitability was explained by financial leverage and there existed a negative relationship. This means that for every 1% change or increase in financial leverage, there is a 14.2% decrease in profitability and vice versa. The second finding showed that 23.5 % variation in risk was explained by financial leverage and there existed a positive relationship. Meaning that as financial leverage increases by 1%, risk increases by 23.5%. The third finding indicated a 3% variation of returns adjusted by risk being explained by financial leverage and there existed a negative relationship. As financial risk increases by 1%, returns adjusted by risk decreases by 3% and vice versa. This indicates an insignificant relationship between returns adjusted by risk and financial leverage. The findings of the study did not reveal what was expected.

Nduati (2010) carried out a study to establish the relationship between leverage and performance of listed companies at the Nairobi Stock Exchange with reference to the period 2003-2007 when the NSE experienced an unprecedented boom. Companies at the market did take up different forms of debt to maximize returns and the researcher will seek to find out the extent of relationship between the debt and the resulting performance. The main sources of literature will be: books, internet sources, journals, annual financial reports and press reports. A descriptive research design will be adopted in the collection of data. Data will be collected using interviews and secondary sources such as annual financial reports of the targeted companies. Analysis will be done with the use of SPSS and findings presented in the form of pie charts, graphs and tables.

Njoroge (2008) conducted a study to identify the determinants of financial performance of Savings and Credit Cooperative (SACCO) societies in Kenya. A cross-sectional time series data covering the period 2002-2007 was compiled from audited financial records of the sample societies. Random-effects generalized least square (GLS) regression was used to relate financial performance to factors hypothesised to be determinants of performance. The study found that the size of loan to members relative to total asset was positive and highly significant predictor of performance, confirming the a priori premise that loan is the most productive asset of any financial institution. Similarly the proportion of equity capital relative to asset was positive and significant, indicating that capital structure is important. High growth in assets and loan to members is related to high financial performance. The ratio of operating expenses to total asset was negative and highly significant indicating that better cost management could improve performance.

Kawiche (2013) conducted a study on the relationship between selected factors and performance of Microfinance institutions in Tanzania by integrating financial performance measures. The study used a descriptive survey. The study used the following variables: debt ratio, portfolio to assets ratio and operating expense ratio as key measures of performance. The study was analyzed using a regression model. The findings of the study show that the financial performance of the MFI's reviewed was low. This low financial performance was due to the low profit margin. In addition, the high amounts of operating expenses and liabilities drained down the amount of net income of the MFI's.

Salim (2012) carried out a study on the relationship between size and financial performance of commercial banks in Kenya. The study adopted the Descriptive Design, Correlation Analysis, and Multiple and Simple Linear regressions were applied to secondary data collected from available financial statements of all the 43 commercial banks in existence in Kenya as at 31st December, 2011. The period the study covered was the year 2000 to the year 2011. The main findings of the study established strong correlations between all the studied factors of Bank Size. Total Deposits, Total Loans, Total Assets and Branch Network Size were all found to be correlated. The relationship between three of the size variables, namely, Total Loans, Total Deposits, and Total Assets and the Financial Performance of commercial banks were all found to be weak but statistically significant. Total Deposits and Total Assets had relatively stronger effects on Financial Performance compared to Total Loans. No relationship was found between Branch Network Size and Financial Performance for commercial banks in Kenya.

2.5 Summary of Literature Review

The chapter presents theoretical and empirical literature on the effect of leverage on financial performance of microfinance institutions. From the above literature it is evident that leverage is a cheaper source of capital to finance projects, assets and other key activities of the firm. There are certain advantages that make leverage an attractive source of capital since it can magnify profits and gains of the firm. A firm that finances its assets through leverage enjoys tax deductions. The firm might easily retain profits and financial performance within the firm as compared to using equity, firms prefer leverage to finance stable business operations in which they can more easily make ongoing interest payments and retain the rest of the profits to themselves. This is supported by Gweyi, Minoos and Luyali (2013) and Andy et al. (2002) who have revealed that a positive relationship exists between leverage and financial performance of firms.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

This chapter provides an outline of the research methodology that was used in achieving the objective of this study. It presents the research design, target population, data collection, data analysis procedures and the analytical model that was used in data analysis.

3.2 Research Design

The study used a descriptive survey. A descriptive survey is usually concerned with describing a population with respect to important variables with the major emphasis being establishing the relationship between the variables and determining the frequency with which something occurs or the extent to which two variables co-vary (Kothari, 2004).

3.3 Population

According to Cooper and Schindler (2003) a population refers to an entire group of individuals, events or objects having a common observable characteristic. The population of the study comprised of seven licensed micro finance institutions in Kenya as at 31st June 2013. Census was used in getting the information. A census is an attempt to collect data from every member of the population being studied rather than choosing a sample.

3.4 Data Collection

The study used secondary data since the nature of the data to be collected was quantitative in nature. The secondary data will be got from Central Bank of Kenya.

McNeilland Chapman (2005) explain that there are many methods of data collection and the choice of data collection depends on the nature of the data to be collected by the researcher. The study used secondary data sources of a five year period from 2009-2013 based on the accessibility and availability of data. This enabled the researcher to get quantified data that is helpful in drawing conclusions and giving recommendations on the effect of leverage on financial performance of microfinance institutions in Nakuru County.

3.5 Data Analysis

Secondary data from the audited financial statements was reviewed for completeness and consistency for purposes of analysis. McNeilland Chapman (2005) explains data must be cleaned, coded and properly analyzed in order to obtain a meaningful report. Data collected was sorted, cleaned and coded and then entered into Statistical Package for Social science for analysis. A multiple regression model was used to show the relationship between the independent and the dependent variables as provided below:

3.5.1 Analytical Model

This study sought to extend the model as advanced by Kawiche (2013).Below is the regression model that was used to determine the effect of leverage on financial performance of microfinance institutions in Nakuru County. The model explains the relationship between four variables namely: debt to equity ratio, portfolio to assets ratio and operating expense ratio (Independent variables) with financial performance(the dependent variable). The model of this study is explained below:

$$Y=\alpha+\beta_1 X_1+\beta_2 X_2+\beta_3 X_3 + \varepsilon$$

Where:

Y = Financial performance was measured using Return on Assets which is measured as Net income/ Total assets

X_1 = Debt to equity ratio, was measured using total liabilities/stakeholders equity

X_2 = portfolio to assets ratio, will was measured using gross loan portfolio/total assets

X_3 = Operating expense ratio, was measured using operating expense/Revenue

β = is a regression constant

α = Constant Term

ε = Error term normally distributed about the mean of zero

3.5.2 Tests of Significance

Whereby Y is the dependant variable financial performance, β_0 is the regression constant or Y , $\beta_1 \dots \beta_3$ are the coefficients of the regression model. Coefficient of determination was used to test whether the model is a good predictor; correlation was used to show the relationship between the independent variables and the dependent variable. The test of significance was analysis of variance test (anova).

CHAPTER FOUR

DATA ANALYSIS, RESULTS AND DISCUSSIONS

4.1 Introduction

This chapter presents the results of the data analysis. Secondary data in the form of published financial reports of microfinance institutions in Kenya was obtained from the AMFI. This data was then converted to the desired form and entered into SPSS version 22. Data analysis was then conducted to generate descriptive and correlations output. These results are as shown in the proceeding sections.

4.2 Response Rate

The study sought to collect data from all the seven (7) Microfinance institutions in Nakuru County. The researcher managed to collect data from all the seven(7)Microfinance institutions in Nakuru County in a period of five years between 2009-2013.

4.3 Descriptive Statistics

In order to determine the relationship between leverage and financial performance, the study used descriptive statistics by use mean, median and the standard deviation.

Below are the results of the findings provided in the table 4.1:

Table 4.1: Descriptive Statistics

	Minimum	Maximum	Median	Mean	Std. Deviation
Debt Equity Ratio	2.92	668.05	33.48	56.1817	7.49544
Portfolio to Assets Ratio	.03	59.47	25.07	29.75	5.4544
Operating Expense Ratio	.52	24.61	12.56	12.43	3.5256
Return on Assets	.45	18.1	12.07	9.275	3.045
Financial Performance	0.4	12	6	6.5	2.49

Source:Research Findings

In table 4.1 statistical analysis of financial performance indicator is shown. The maximum value of debt to equity ratio is 668.05 while the minimum value is 2.92 while the average for the industry is 56.1817 with a standard deviation of 7.9495.

The maximum value of portfolio to assets ratio is 59.47 while the average for the industry is 29.75 with a standard deviation of 54.544. The maximum value of operating expense ratio is 24.61 while the minimum value is .52 while the average for the industry is 12.43 with a standard deviation of 3.5256. Return on Assets had a maximum value of 18.1 and the average for the industry is 9.275 with a standard deviation of 3.045

4.4 Correlation Analysis

Correlation measures the strength between the variables. Below is the correlation between leverage and financial performance of microfinance institutions in Nakuru County. The results of the findings are presented in table 4.2.

Table 4.2: Correlation of the Study Variables

	Debt to Equity Ratio	Portfolio to assets Ratio	Operating Expense Ratio	Financial Performance
Debt to Equity Ratio	1			
Portfolio to assets Ratio	.926	1		
Operating Expense Ratio	.764	.561	1	
Financial Performance	.884	.634	.554	1

Source: Research Findings

Table 4.2 shows the relationship between debt to equity ratio and various financial performance indicators. The Pearson's r for the correlation between the Debt/Equity ratio and ROA variables is 0.884. This means that there is a strong positive

relationship between the two variables. Since the Sig (2-Tailed) value is less than 0 .05. We can conclude that there is a statistically significant correlation between the two variables at the 0.01 level. This means that there is a strong relationship between the two variables.

4.5 Regression Analysis and Hypotheses Testing

In determining the relationship between the independent and the dependent variable a multiple regression was conducted. The research study aimed at evaluating the relationship between financial leverage and financial performance of microfinance institutions in Nakuru County. Below are the results of the findings:

4.5.1 Model Summary

The researcher used the model of the summary in establishing the coefficient of determination (R^2) and the coefficient correlation (R) between the variables. Below are the results of the findings in table 4.3

Table 4.3: Model Summary

Model Summary				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.814 ^a	.663	.771	0.211
a. Predictors: (Constant),debt to equity ratio, portfolio to assets ratio, operating expense ratio				

Source: Research Findings

The findings revealed that 66.3% is explained by the variables under the study meaning that the model is a good predictor. $R=0.814$ is the correlation between the variables which shows that there is a positive correlation between leverage and financial performance of microfinance institutions in Nakuru County.

4.5.2 Analysis of Variance

Analysis of variance shows the relationship between the two variables. This section shows you the p-value (“sig” for “significance”) of the predictor’s effect on the criterion variable. P-values less than .05 are generally considered “statistically significant. In this case the researcher will observe the relationship between liquidity and financial performance.

Table 4.4: ANOVA

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	2.107	3	0.7023	21.947	.031(a)
	Residual	0.832	26	0.032		
	Total	3.209	29			

Source: Research Findings

From the above findings, it was observed that the probability value is 0.031, meaning that the regression model was statistically significant in predicting the relationship between financial leverage and financial performance of microfinance institutions in Nakuru and the predictor variables since this value is less than 5%. With the help of the F-Test table (5%, 3, 26) tabulated value was 2.98 which is smaller than $F = 21.947$ as well indicated that the model was significant.

4.5.3 Tests of Coefficients

The study carried out the statistical significance of the overall relationship between the dependent variable and the independent variables, SPSS provides us with the statistical tests of whether or not each of the individual regression coefficients are significantly different from 0, as shown in the table below:

Table 4.5: Tests of Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
1 (Constant)	1.157	0.214	.321	0.122	.000
Debt to equity Ratio	.347	.215	.116	1.325	.003
Portfolio to assets	.221	.116	.127	.124	.021
Operating expense ratio	.423	.057	.113	.312	.011

a. Dependent Variable: ROA

Source: Research Findings

The study used a multiple regression analysis so as to determine the relationship between leverage (Independent variable) and financial performance (Dependent variable) of microfinance institutions in Nakuru County. Below are is the regression model that was obtained:

$$ROA = 1.157 + .347X_1 + .221X_2 + .423X_3$$

From the regression model holding all the other factors constant, an increase in one unit of the independent variables (Debt to equity ratio, portfolio to assets ratio and operating expense ratio) results into a corresponding increase in the dependent variable (ROA). This means that there exists a direct relationship between the dependent and the independent variables. The analysis was undertaken at 5% significance level. The criteria for comparing whether the predictor variables were significant in the model was achieved by comparing the corresponding probability value obtained and $\alpha=0.05$. If the probability value is less than α , then the predictor variable is significant. Therefore, from the above analysis financial leverage was significant in the model as its corresponding predictor variables were less than 5%.

4.6 Discussion of Research Findings

From the findings obtained, the regression equation further implied that there was a direct relationship between financial leverage and financial performance of Microfinance Institutions in Nakuru County. The analysis was undertaken at 5% significance level. Therefore, from the above analysis financial leverage was significant in the model as its corresponding predictor variables were less than 5%. This shows that the model is a good predictor which is well explained by the coefficient of determination $R^2=76.3\%$.

These findings are consistent with these studies: Akhtar et al. (2012) had investigated the impact of influence on shareholders return. In their paper "Relationship between Financial leverage and Financial Performance: Evidence from Fuel and Energy Sector of Pakistan, they demonstrated that financial leverage has got a positive relationship with financial performance". Hence, the companies in the fuel and energy sector may enhance their financial performance and can play their role for the growth of the economy while improving at their optimal capital structures. In their study they employed a sample of 20 listed public limited companies from Fuel and Energy sector listed at Karachi Stock Exchange (KSE).

The study aimed at measuring the relationship between financial leverage and the financial performance. To test the hypothesis, the main variables used in the study consist of a dependent variable which is financial performance of fuel and energy sector while the independent variable is financial leverage in fuel and energy sector. It was revealed that there was a statistically positive relationship between financial leverage and financial performance of firms.

According to the findings, it was revealed that 66.3% is explained by the variables under the study meaning that the model is a good predictor. $R=0.814$ is the correlation between the variables which shows that there is a positive correlation between leverage and financial performance of microfinance institutions in Nakuru County. The unexplained variations by the model is only 33.7% which means that the model is a good predictor.

The results of the correlation between leverage and financial performance found that there was a strong positive correlation between leverage and financial performance of $R=0.884$. These findings are coherent with a study that was conducted by: Adongo(2012) on the effect of financial leverage on profitability and risk of firms listed at the Nairobi Securities Exchange (NSE) for the periods 1 January 2007 to 31 December 2011. Based on the regression and correlation analysis, the findings of the first model indicated that 14.2% of variation in profitability was explained by financial leverage and there existed a negative relationship. This means that for every 1% change increase in financial leverage, there is a 14.2% decrease in profitability and vice versa.

The second finding showed that 23.5 % variation in risk was explained by financial leverage and there existed a positive relationship. Meaning that as financial leverage increases by 1%, risk increases by 23.5%. The third finding indicated a 3% variation of returns adjusted by risk being explained by financial leverage and there existed a negative relationship. As financial risk increases by 1%, returns adjusted by risk decreases by 3% and vice versa. This indicates an insignificant relationship between returns adjusted by risk and financial leverage. The findings of the study did not reveal what was expected.

CHAPTER FIVE

SUMMARY OF FINDINGS, CONCLUSIONS AND DISCUSSIONS

5.1 Introduction

In the current business environment financial managers have adopted various capital structures as a means to that goal. A firm can finance its investment by debt and equity. The use of fixed-charged funds, such as debt and preference capital along with the owner's equity in the capital structure is described as financial leverage or gearing (Dare and Sola, 2010). An unlevered firm is an all-equity firm, whereas a levered firm is made up of ownership equity and debt (Olweny and Mamba, 2011).

5.2 Summary of Findings and Discussions

According to the findings, statistical analysis of financial performance revealed that the maximum value of debt to equity ratio is 668.05 while the minimum value is 2.92 while the average for the industry is 56.1817 with a standard deviation of 7.9495. The maximum value of portfolio to assets ratio is 59.47 while the average for the industry is 29.75 with a standard deviation of 54.544. It was revealed further that the maximum value of operating expense ratio is 24.61 while the minimum value is .52 while the average for the industry is 12.43 with a standard deviation of 3.5256. Return on Assets had a maximum value of 18.1 and the average for the industry is 9.275 with a standard deviation of 3.045.

In relation to correlation analysis, the relationship between debt to equity ratio and various financial performance indicators. The Pearson's r for the correlation between the Debt divided Equity ratio and ROA variables is 0.884. This means that there is a strong positive relationship between the two variables. Since the Sig (2-Tailed) value

is less than 0 .05. We can conclude that there is a statistically significant correlation between the two variables at the 0.01 level. This means that there is a strong relationship between the two variables.

According to the regression analysis, the findings revealed that 66.3% is explained by the variables under the study meaning that the model is a good predictor. $R=0.814$ is the correlation between the variables which shows that there is a positive correlation between leverage and financial performance of microfinance institutions in Nakuru County.

It was observed that the probability value of 0.031 meaning that the regression model was statically significant in predicting the relationship between financial leverage and financial performance of microfinance institutions in Nakuru County. From the regression model, holding all the other factors there exists a direct relationship between the dependent and the independent variables. The analysis was undertaken at 5% significance level. The criteria for comparing whether the predictor variables were significant in the model was achieved by comparing the corresponding probability value obtained and $\alpha=0.05$. If the probability value is less than α , then the predictor variable is significant. Therefore, from the above analysis financial leverage was significant in the model as its corresponding predictor variables were less than 5%.

5.3 Conclusions

From the above findings, it was revealed that there was strong correlation between leverage and financial performance of microfinance institutions in Nakuru County. This was evidenced by the Pearson's r for the correlation between the Debt to Equity ratio and ROA variables which was 0.884. This means that there is a strong positive relationship between the two variables. Since the Sig (2-Tailed) value is less

than 0 .05. We can conclude that there is a statistically significant correlation between the two variables at the 0.01 level. This means that there is a strong relationship between the two variables. The study highly contributes to the determinants of capital structure by adducing the effect of leverage on financial performance of microfinance institutions in Nakuru County.

From the study findings, the regression model confirmed that the coefficient of determination was a good predictor. This is explained by 66.3% of the variables under study meaning that the model is a good predictor. From the tests of coefficients holding all the other factors constant, an increase in one unit of the independent variables (Debt to equity ratio, portfolio to assets ratio and operating expense ratio) results into a corresponding increase in the dependent variable (ROA). This means that there exists a direct relationship between the dependent and the independent variables. The analysis was undertaken at 5% significance level. The study further concludes that leverage is an appropriate way of financing assets since it's more likely to boost the financial performance of the firm from the above findings.

The study concludes that a company with higher operating leverage has the potential to generate much larger profits than a company with lower operating leverage. For example, the variable costs for a software company, such as packaging and the cost of various media devices (like CDs), are very low compared to its fixed costs, such as research and development. Therefore, once a certain break-even point is reached, the contribution that sales make to profits is much higher than it would be if a greater portion of the costs were variable.

The study concludes that leverage is an essential tool which can be a risk if not properly managed. A risk management plan is a necessary step for firms looking to

help use leverage correctly. Managing risk is both the most challenging and the most important element in business, so it is important for firms to make appropriate investment decisions and guidance on how to best manage the firms risk profile in order to enhance financial performance.

The study also concludes that firms should properly manage their risks especially when they borrow finances to invest in assets. This is because financial leverage can expose the firms to huge financial losses if they fail to design and develop better ways of investing borrowed money in projects that can yield better returns in future.

5.4 Policy Recommendations

The Association of microfinance institutions should set policies to ensure that microfinance institutions take advantage of leverage to increase their profitability; this is because by the use of leverage a firm tries to show high result or more benefit by using fixed costs assets and fixed return sources of capital. It insures maximum utilization of capital and fixed assets in order to increase the profitability of a firm, it helps to know the reasons of not having more profit by a company.

Central banks of Kenya should encourage commercial banks to use leverage in managing risks. This is because the relationship between operating leverage and financial leverage is multiplicative rather than additive. Operating leverage and financial leverage can be combined in a number of different ways to obtain a desirable degree of total leverage and level of total firm risk.

The Association of microfinance institutions should encourage microfinance institutions to use leverage in designing an appropriate capital structure mix or

financial plan. This is one of the widely used means of examining the effect of leverage to analyze the relationship between EBIT and earning per share.

The association of microfinance institutions should conduct regular audits to ensure that all microfinance institutions maintain a proper balance between debt and equity in order to ensure that proper debt management practices are effected and the right investment decisions are made. This will help in regulating microfinance institutions especially in maintaining proper credit policies and making the right investment decisions.

The association of microfinance institutions should monitor and supervise microfinance institutions to ensure that they invest in profitable ventures especially when they borrow finances to invest in assets. They should make follow ups to ensure that microfinance institutions invest in projects that can yield higher returns in the short run and in the long run.

5.5 Limitations of the Study

This study focused on three variables only that is debt to equity ratio, portfolio to assets ratio and operating expense ratio (Independent variables) and financial performance (dependent variable). Future researchers and academicians should carry out further research and test more variables for example default ratio and gross loan portfolio in order to establish whether the relationship between the variables hold.

The study was limited to one county: Nakuru County and therefore the findings and recommendations made on this study cannot be used to make generalization of other microfinance institutions operating in the 47 counties in Kenya. It is therefore important for future researchers to test the same variables on all the microfinance

institutions in all the counties, then findings and conclusions can be made based on concrete facts and evidence.

The cotemporary business environment is characterized by risks and uncertainties due to its turbulent the macroeconomic factors for example regulations, technology and other microeconomic factors may affect the current results and thus these findings may not hold. The study therefore recommends that a study should be conducted after five years and then findings and conclusions can be compared.

The study used secondary data which is often not presented in a form that exactly meets the researcher's needs. This is because secondary data involves past information which may not be a true reflection of the current needs of the study. This could have exposed that study to bias and assumptions of the study findings.

The other challenge faced by the researcher was time and cost constraints. The researcher had to collect the right data to meet the objective of the study within a short period of time. In addition the researcher had to refine the data to ensure that it matched the measurement of the study variables. Later the data had to be cleaned, sorted and coded for analysis. This was however done within a short period of time.

5.6 Suggestions for Further Research

Future researchers may extend study period and may also take all the deposit taking Sacco that are regulated by SASRA. Researcher can also conduct comparative study by taking data from deposit taking Sacco's and Non deposit taking Sacco's to check the relationship between financial leverage and financial performance.

The research will provide a direction for further research on other sectors for example the Nairobi Securities Exchange regarding the impact of financial leverage on the

performance of companies operating, measuring a cause and effect relationship. It may lead to the future researches to be carried out by analyzing the individual company's performance and making a comparison with the whole industry by using the industry performance as bench marks. After measuring the relationship between the leverage and the financial performance, a further study to measure the significance of financial leverage for the sector under discussion can be carried out and what impact it would make on the financial performance if the financial leverage of the companies is increased or reduced and how the industry players can maximize their shareholders' wealth using leverage.

How the firm's stock value is influenced by using the different levels of leverage and how companies lying in such sector or the industry players can achieve the sustainable growth by implementing the leverage concept. What impact the leverage can make on the sectoral risks and the company specific risks and how to measure, evaluate, and control the systematic and systematic risks involved for levered companies in such industry.

Future researcher can consider determining, what impact would the increased risks by leverage make over the required rate of return of the companies. These are some questions which may be answered in several studies if future researchers consider investigating these variables and thus shed more light on how firms can make better use of leverage to boost their financial performance.

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APPENDIX:LIST OF MFI's IN NAKURU COUNTY

1. Bimas Ltd
2. Changamka Kenya Ltd.
3. Faulu Kenya Ltd
4. Kenya Women Finance Trust, KWFT.
5. Micro-Kenya
6. Smallholder Irrigation Schemes Development Organization (SISDO)
7. SMEP

Source: Central Bank of Kenya (2011)

APPENDIX II:SECONDARY DATA

	EQUITY									
	2009	2010	2011	2012	2013	min	max	mean	median	std dev
INTEREST RATE SPREAD	5.5	7.5	10	6	8.5	6	10	8	8	1.83711731
LEVERAGE	na	7.3	8.2	11.4	11.80	7.3	11.8	9.675	9.8	2.2588714
RATIO OF NPLs	0.051	0.0802	0.0528	0.053	0.051	0.051	0.0802	0.0576	0.0528	0.01266965
LIQUIDITY RISK	0.322	0.533	0.456	0.345	0.2	0.2	0.533	0.3712	0.345	0.12824469
ROA	na	-3	0.2	0.7	0.80	-3	0.8	-0.325	0.45	1.8025445
GDP	na	0.056	0.042	0.046	0.053	0.042	0.056	0.04925	0.0495	0.00639661
	KWFT									
INTEREST RATE SPREAD	13.4	14.4	8.4	8	8	8	14.4	9.7	8.2	3.13900196
LEVERAGE	na	10.70	7.90	7.90	8.10	7.9	10.7	8.65	8	1.36991484
RATIO OF NPLs	0.0114	0.1021	0.07	0.06	0.523	0.06	0.523	0.188775	0.0861	0.22353926
LIQUIDITY RISK	na	0.0442	0.0442	0.049	0.0513	0.0442	0.0513	0.047175	0.0466	0.00356125
ROA	na	1.40	1.30	0.90	0.80	0.8	1.4	1.1	1.1	0.29439203
GDP	na	na	na	0.032	0.043	0.032	0.043	0.0375	0.0375	0.00777817
	SMEP									
INTEREST RATE SPREAD	na	11	12	11.88	13.09	11	13.09	11.9925	11.94	0.8567915
LEVERAGE	na	5.3	6.8	2.7	4.9	2.7	6.8	4.925	5.1	1.69386147
RATIO OF NPLs	0.1047	na	0.1	0.19	0.154	0.1	0.19	0.148	0.154	0.04529901
LIQUIDITY RISK	na	na	0.21	0.3	0.35	0.21	0.35	0.286667	0.3	0.07094599
ROA	0.3	0.3	0.9	2.1	2.4	0.3	2.4	1.425	1.5	0.99121138
GDP	na	na	na	0.0345	0.037	0.0345	0.037	0.03575	0.0358	0.00176777
	SUMAC									

INTEREST RATE SPREAD		15.2	8.5	10.4	8.1	8.1	15.2	10.55	9.45	3.25832268
LEVERAGE	na	0.00	0.30	0.10	0.20	0.00	0.3	0.15	0.15	0.12909944
RATIO OF NPLs	0.08	0.15	0.07	0.05	0.059	0.05	0.15	0.08225	0.0645	0.04590116
LIQUIDITY RISK	na	na	na	0.21	0.33	0.21	0.33	0.27	0.27	0.08485281
ROA	na	5.30	4.60	2.70	5.30	2.7	5.3	4.475	4.95	1.22848145
GDP	na	na	0.035	0.038	0.039	0.035	0.039	0.037333	0.038	0.00208167