

THE UTILIZATION OF MICROFINANCE LOANS AND HOUSEHOLD WELFARE IN THE EMERGING MARKETS

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ABSTRACT

This study is a survey carried out in Bungoma County of Kenya. The aim of the study is to establish the relationship that exists between household welfare and utilization of microfinance loans. Stratified sampling was applied to pick the sample size from eight urban settlements in Bungoma County. Judgmental sampling was then applied in picking the respondents. Data was collected through questionnaires from 62 respondents. The same was analysed using frequencies and percentages. A regression analysis was also conducted to determine the relationship between micro finance loan utilization and households' welfare.

The findings indicate that utilization of microfinance loans results to improved education standards, improved healthcare, and improved sanitation, enhance consumption and living standards, earning of extra income as well as reduction of unemployment by providing an avenue for self-employment. The study determined the existence of a very strong relationship between household welfare and microfinance loans. The study recommended that it will be prudent for the government to ensure that the microfinance loans are more affordable and accessible to rural households. This will enable many households to get access to the loans. Rural households who fear utilizing microfinance loans should also be adequately trained on the best ways to do so. This will encourage many households to seek microfinance loans and thus enhance their incomes.

Keywords: *microfinance loans, utilization, household welfare, Bungoma, urban settlement.*

1.1 Background of the study

Microfinance refers to the practice of providing specialized financial services to the poor. One component of this is microcredit, in which small loans are granted to the poor, who typically do not have access to credit and other financial services. Many microfinance practices have still continued to focus on micro-credit: Micro-credit means providing the poor with small loans with the hope of improving their labor productivity and thereby lead to increment in their household incomes. Microfinance definition encompasses provision of other financial services like savings, money transfers, payments, remittances, and insurance, among others (Grades, 2007).

According to Paul (2004), empowerment theory represents an expansive view of individuals and collective behavior that includes active participation of individuals and group in altering and shaping the socio-environmental context. The study is based on the empowerment theory of microfinance which suggests that by enabling people to access microcredit, it is one way of reducing global poverty and enhancing economic development.

Micro-credit evolved in the mid-1970s as part of the paradigm shift in development from top-down approach to bottom-up approach that incorporates the participation of intended beneficiaries as key participants in sustainable development (Mac Namara 1973). Using the top-down approach, western countries and international donor agencies transferred funds and material to the third world to help improve the social and economic conditions. The bottom-top approach emerged as a result of the failure of the former, due to lack of participation by the intended beneficiaries of development projects in the process of designing, formulating and implementation of projects (Khandakar and Lutfor 2006). The Grameen bank credit program is one credit institution that followed this paradigm shift; by providing small loans of about US \$100, primarily through groups to poor rural women who have little access to conventional banking facilities. According to Yunus (2004), the founder of the Grameen bank; loans are given for the purpose of supporting income generating activities in the informal economy.

Microfinance industry in Kenya has grown over the past two decades in response to lack of access to formal financial services for most of Kenya's poor people. Currently the number of Known microfinance institutions (MFIs) operating in Kenya are approximately close to 100 serving over four million clients with an outstanding loan portfolio of more than Kshs.2.3 billion (Aron,2002). The lack of financial power is a contributing factor to most of the societal problems. Microfinance institutions therefore target the poor who are considered risky but whose repayment rate turns to be positive as compared with the regular commercial banks (Zeller and Sharma, 1998). The loans give people new opportunities by helping them to get and secure finances so as to equalize the chances and make them responsible for their own future. It also broadens the horizons and thus plays both economic and social roles by improving the living conditions of the people (Radio Netherlands, 2010).

1.1.1 The concept of microfinance loans

Robinson (1998) has defined microfinance as an organization that grants or provides financial services and products such as very small loans, savings, micro-leasing, micro-insurance and money transfer to assist the very or extraordinarily poor in establishing new businesses or expanding existing business ventures. Microfinance activities are common in developing countries such as Kenya where small and medium enterprises have limited or no access to conventional banking services. The dawn of micro financing dates back to 1983, when Muhammad Yunus of Bangladesh developed this concept as a poverty reduction tool in his home country. This led to the establishment of Grameen Bank, the first institution to realize the concept of micro financing and to operate in the microfinance business in the proper sense. This initiative won Yunus and Grameen Bank the 2006 Nobel Peace Prize award for their efforts through microcredit to create economic and social development from below (The Norwegian Nobel Committee, 2006).

In addition to provision of micro loans, Microfinance institutions provide social intermediation services such as the formation of groups, development of self-confidence and the training of members in that group on financial literacy and management. There are different providers of microfinance services and some of them are; nongovernmental organizations, savings and loans cooperatives, credit unions, government banks, commercial banks or non-bank financial institutions. The forms of loans offered include; individual consumer loans, group

loans and youth loans. The target group of MFIs is self-employed low income entrepreneurs who are; traders, seamstresses, street vendors, small farmers, hairdressers, rickshaw drivers, artisans and blacksmith (Ledgerwood, 1999).

1.1.2 Household Welfare

The term welfare refers to a set of specialized programs and services designed to meet the income security, social service, and related needs of persons who are unable to provide for their own basic social and material needs these such as the poor (Estes, 2004). In order to assess improvement of household welfare as a result of microfinance loan acquisition, there are various variables such as; monthly household income, Women empowerment (Gender), improved education, healthcare, Poverty reduction, number of Small business and consumption. According to the Human Development Report (2005), 2.5 billion people, or 40 percent of the world's population, live on less than \$2 per day, and their combined income equals only 5 percent of global income; looking at the other extreme, the income of the richest 10 percent of the global population accounts for 54 percent of global income. Furthermore, the 500 richest people in the world have an aggregate income greater than that of the poorest 416 million individuals.

1.1.3 Relationship between microfinance loans and household welfare

Microfinance is the source of finance for the poor or low income populations living in developing countries. The funds obtained from microfinance institutions assist poor households to run their micro-businesses and smooth their consumption. By giving microfinance loans to poor or low income households, it assists in bridging the financing gap that is created by conventional banking institutions that require collaterals of huge value (Yunus, 2001). Robinson (2001) asserts that microfinance loans assist low income households to improve enterprise and household management, increase productivity, smooth income flows for the households, enlarge and diversify their microenterprises as well as increase their incomes.

Bagchi et al. (2002) also indicates that microfinance loans have the ability to improve the level of education for the participating households. The health of the households that utilize microfinance loans is also improved by this facility. The other positive effect of microfinance on household welfare is its ability to assist in empowering women in low income households. Once these women are empowered financially, they are able to provide for their families thus improving the living standards of the low income people in the society.

Microfinance loans have also the ability to assist in poverty alleviation among developing countries. Most developing countries have confirmed that microfinance is indeed one of the strategies that can be used to alleviate poverty. By empowering low-income households financially, governments are able to reduce the unemployment rates and improve on income per capita. The microenterprises run by low income households provide employment to many unemployed people thus improving their lives as well as those of their immediate dependants (Yunus, 2001).

1.1.4 Bungoma County as an Emerging Market

Bungoma County is in the Western Part of Kenya. It borders the republic of Uganda, Busia, Kakamega and Trans Nzoia Counties. It is an example of the emerging markets in the Sub-Sahara. According to Commission of Revenue Allocation (2009), Bungoma County had a total population of 1, 630,934 people. In terms of population, it is ranked third in the Republic of Kenya. It is estimated that approximately 53 percent of the

population of Bungoma county lives below the poverty line. 22 percent of the population of Bungoma County resides in the urban centers in the county. Bungoma is well served with financial institutions that provide microfinance loans to the local population. The banks that currently operate in Bungoma include: Co-operative Bank of Kenya, Bank of Africa, and Consolidated Bank of Kenya, Kenya Commercial Bank, Barclays Bank, Equity Bank, Post Bank, Family Bank, National Bank of Kenya, Diamond Trust Bank Kenya limited and K-Rep Bank. Guide to Kenya, (2012).

1.2 The motivation of the study

Access to microfinance loans has been associated with higher household incomes in various countries around the globe. The assumption mostly made of all microfinance loans is that the intervention will change household welfare with regards to access to more income in a way that lead to achievement of higher household consumption of goods and services and overall socio-economic well-being. The biggest challenge in assessing the relationship between microfinance loans and household welfare is to determine whether the improvement is significant as without the loan intervention. Empowerment Theory states that enabling people to access microcredit is one of the ways of reducing global poverty and enhancing economic development Paul (2004).

There is evidence of research activity on microfinance. For instance, Mugabi (2010) conducted a study on micro-credit utilization and its impact on household income. It was a comparative study of rural and urban areas in Iganga district, Uganda. Sengsourivong (2006) conducted a study on the impact of microfinance on household welfare. Odell (2010) conducted a study on measuring the impact of microfinance in selected countries including Kenya. Diagne and Zeller (2001) conducted a study on access to credit and its impact in Malawi and suggested that microfinance loans did not have any significant effect on household income. This is a reverse of what other researchers had found out. It is upon this that the researcher is motivated to carry a replica study in one of the counties in Kenya to further ascertain the impact. These studies have not been widely conducted in Bungoma County and a number of years have passed and more changes might have come in place. This paper will address this gap by examining the relationship of microfinance loans to household welfare in Bungoma County. The study sought to: to determine the relationship and utilization between microfinance loans and household welfare.

2.0 LITERATURE REVIEW

2.2 Overview of Micro financing

The term microfinance was first introduced in 1990 with the specific connotation of encompassing microcredit and micro savings as well as other financial services, in response to Robert Vogel's claim that savings were the forgotten half of rural finance. While the term is new, the concept is old if not ancient, with institutional origins for instance in European countries in the 18th and 19th century, Nigeria in the 16th century and India around 1000 BC (Sygenta, 2007).

The Sygenta Foundation (2007) indicates that microfinance is that part of the financial sector which comprises formal and informal financial institutions, small and large, that provide small-size financial services in theory to all segments of the rural and urban population, in practice however mostly to the lower segments of the population. This bias is partly due to self-selection of clients and partly to the mandate of institutions according to the will of their owners or donors. Worldwide formal and semiformal Rural Micro financing Institutions (RMFIs) are in the hundreds of thousands; informal institutions are in the tens of millions. Sustainability is nothing new; without it the large numbers of informal MFIs could not have survived.

Microfinance institutions can offer their clients, who are mostly men and women who are slightly below or above the poverty line, a variety of products and services. The most prominent of their services is financial, that they often render to their clients without tangible assets and these clients mostly live in the rural areas, a majority of whom may be illiterate. Formal financial institutions do not often provide these services to small informal businesses run by the poor as profitable investments. They usually ask for small loans and the financial institutions find it difficult to get information from them either because they are illiterate and cannot express themselves or because of the difficulties to access their collateral due to distance (CIDA, 2002).

2.2 Theoretical Framework

There are a number of theories that try to explain the concept of microfinance and its role in improving the welfare of the households in the emerging markets. Governments and development partners have invested heavily in these economies to help alleviate poverty which is a hindrance to development of the financial markets and empowering the citizenry economically.

2.2.1 Neo-classical growth models

This theory emphasizes the importance of saving in order for a country's economy to grow. Todaro et al. (2003) found out that one of the main constraints for poor households in developing countries is the lack of access to financial services, which is a consequence of poorly developed financial markets and commercial banks tending to offer their services almost exclusively to medium and large companies that are thought to be credit worthy. Hence, implying that the accumulation of capital is hampered and the growth of the country's economy is restrained.

2.2.2 Welfarist theory

The Welfarist theory focuses on credit as a tool of reducing poverty. According to Robinson (2001) credit is provided to poor borrowers at below market interest rates in order to reach the extremely poor to help overcome poverty and empower them. The performance of the Microfinance institutions are measured through household studies with focus on the number of saving accounts, number of loans, productivity improvement, incomes, capital accumulation, social services such as education and health as well as food expenditures. (Congo, 2002)

2.2.3 The institutionist theory

This theory focuses on creating financial institutions which serve clients who are underserved by the formal financial institutions. The aim of this theory is to achieve institutional self-sufficiency. The theory, suggest that the Micro financing Institutions should operate according to the conditions of the market, where by high interest rates are charged due to high costs in order to operate in a sustainable manner. (Elsa and Stina, 2006)

2.2.4 Empowerment Theory

The empowerment theory has a more bias view since it advocates for empowerment of women. Proponents of the theory argue that women account for nearly 74 percent of the 19.3 million of the world's poorest people who are being served by microfinance institutions. Most women are able to access credit in order to invest in businesses that they own. Most of them have good credit history, in spite of the challenges they face, hence they have come out strongly to show that it is a good idea to lend to the poor (Cheston and Kuhn,2002).

2.2.5 Uniting theory

This theory advocates for joint liability in the repayment of microfinance loans. The aim of this theory is to improve repayment rates and the welfare of credit-constrained borrowers. In joint liability, when one borrower cannot repay a loan, group members are contractually required to repay for one of their members if he or she defaults to pay for his or her monthly installment. Borrowers believe that if a group member defaults, the whole

group will not be allowed to access future loans even if the lending contract does not specify this punishment (Ghatak and Guinnane, 1999).

2.3 Impact of Microfinance on welfare

The microfinance program has been designed in a way to reach the poor who are left out of the formal financial system. In addition to providing financial services, MFIs typically provide information related to basic education, health, child immunization, and environment. Microfinance is very important in poverty reduction as it raises income and consumption of poor households (Khandker, 2005). The multifaceted approach adopted by MFIs has a larger effect on any society in terms of achieving Millennium Development Goals (MDGs).

Accelerated human development can take place through financial and social empowerment of the poor, specifically, women. Microfinance programs are mainly directed towards women. Evidence shows that through microfinance women are empowered in terms of decision making, asset ownership and political and legal awareness (Cheston & Kuhn, 2002). This eventually enables women to make decision regarding the education and health of their children, specifically, of female children. Studies have found that the children of these women are guarded against starvation, disease and illiteracy (Afrane, 2002).

2.3.1 Impact of Microfinance on Households Income

Micro-loans that are advanced by Microfinance institutions in various continents have experienced explosive growth in the last three decades. It has been discovered that they have the potential to alleviate poverty among poor populations especially in the rural areas. Micro-credit is an essential input to increase productivity at household level. It has been argued that micro loans have the ability to boost income levels and increase employment of household members Okurut *et al* (2004). Ross (2002) argues that the impact of micro-credit on household income remains only partial and contested. Navajas *et al* (2000) asserts that the professed goal of micro-credit is to improve the welfare of the poor. However, Burger (1989) observed that microfinance tend to stabilize rather than increase income and tend to preserve rather than create jobs. In addition, Mosley and Hulme (1998) in their study of 13 MFIs in seven developing countries concluded that household income tended to increase at a decreasing rate, as the debtors income and asset position improve.

Microfinance loans assist households to be able to start small and medium enterprises thus propelling the growth of micro enterprises but also fueling the expansion of suppliers and vertical infrastructure needed by larger businesses. Because microfinance creates increased wealth for low-income individuals, it also creates new consumers and markets for businesses of all sizes. Financial sector access and microfinance loans and services are essential for growth in impoverished rural areas (UN, 2005).

2.3.2 Relationship between Microfinance Loans and Household Welfare

Microfinance institutions are well positioned to assist entrepreneurs and their households increase the amount, accessibility and security of accumulated savings. Evidence from Faulu Kenya and Faulu Uganda, microfinance institutions operating in East Africa, provides understanding of possible options and constraints. Both institutions require clients to make deposits into a mandatory savings account. Many clients deposit additional, voluntary savings. A trial was developed at Faulu Uganda to test the impact of increased access to the mandatory savings account. Clients responded favorably. There was some increase in the amount deposited. There was not a significant influx of additional withdrawals. Clients tend to use the account as a means for achieving long-term household objectives (Gudz, 1999). This embraces the culture of savings for future. Both micro-credit and micro-savings increase the levels of poor people's savings and clients' consumption and accumulation of assets. There is some evidence that microfinance enables poor people to be better placed to deal with shocks, but this is not universal. Further both microcredit and micro-savings have a generally positive

impact on the health of poor people, and on their food security and nutrition, although the effect on the latter is not consistent. While businesses can benefit from micro-credit, the longer clients remain within a micro-credit scheme, the less likely their business is to succeed.

2.4 Empirical Review

Sengsourivong (2006) conducted a study on the impact of microfinance on Household welfare in Lao. The research was a case study of a savings group in Lao PDR. The study included members of the savings groups and non-members as respondents for the study. The findings indicated that there was an increase in household income, expenditure, and education expenses for the households participating in the saving group programme.

Tilakarathna (2005) also conducted a study on the impact of Microfinance in Sri – Lanka. The study was an analysis of outreach of microfinance and impact on poverty in Sri-Lanka. The study found out that microfinance in Sri-Lanka has a wide outreach to low income people. It was also established that microfinance has assisted the poor people to smooth their income and expenditure. It was also clear that even though microfinance is meant to assist the poor, majority of those who had positively benefited from microfinance were non poor people from Sri-Lanka.

The ADB (2007) carried out a special evaluation on the effect of microfinance operations on poor rural households and the status of women. The main objective of evaluation study was to assess the extent to which selected Asian Development Bank (ADB) microfinance projects have reduced the poverty of rural poor households and improved the socioeconomic status of women in developing member countries. Bangladesh, Philippines, and Uzbekistan were selected for the study, representing three of the five operational regions of ADB. The projects selected for in-depth review were: Rural Microenterprise Finance Project in the Philippines; Participatory Livestock Development Project in Bangladesh; Second Participatory Livestock Development Project in Bangladesh; Rural Livelihood Project in Bangladesh; and Small and Microfinance Development Project in Uzbekistan. The results of the evaluation study show that the availability of microcredit loans had positive and mildly significant impacts on the per capita income of the beneficiaries. The income of those that received microcredit loans increased compared with those that did not receive a loan (ADB, 2007).

Nghiem et al., (2007) conducted a quasi-experiment survey on the welfare effects of microfinance in Vietnam. The study analyzed the effects of microfinance programs upon household welfare in Vietnam. Data on 470 households across 25 villages was collected using a quasi-experiment survey approach to overcome self-selection bias. In the study's econometric analysis, the welfare effects of microfinance are substituted using measures of household income and consumption. The empirical results indicate that participation in microfinance has a positive effect upon household welfare, with the size of the effect increasing at a decreasing rate as a household spends more time in the microfinance program.

A study carried out by Kondo et al., (2008) on the impact of microfinance on rural households in the Philippines. The study established that the impact of the availability of microfinance loans on per capita income is shown to be positive and marginally significant. This is also true for per capita total expenditure and per capita food expenditure. But it was also found that this impact is insignificant for poorer households and becomes only positive and increasing with richer households. It was also established that microfinance kept clients economically active with more enterprises and more employees. The study recommended that for microfinance to be an effective poverty-alleviation tool there is a need to review targeting procedures to know whether these are correctly identifying the intended beneficiaries.

Mahjabeen (2008) conducted a study on the micro financing in Bangladesh. The objective of the study was to assess the impact on households, consumption and welfare. The main findings of the study indicate that MFIs

raise income and consumption levels of households reduce income inequality and enhance welfare. This implies that microfinance is an effective development strategy and has important policy implications regarding poverty reduction, income distribution and achievement of millennium development goals.

2.5 Conclusion

Most studies have linked microfinance with positive impact on household welfare. This explains the reason why it is gaining popularity in most countries as one of the strategies of uplifting household welfare. However, there are also negative effects of the same. Some recipients of microfinance loans have indicated that the loans were used for consumption instead of directing the funds to income generating activities. Loans are also taken from one lender to repay another thus creating a vicious circle. The loans have also left most women in abject poverty especially where they have been used as conduits by male counterparts who run away with the funds leaving the women to pay.

3.0 RESEARCH METHODOLOGY

This study applied survey research design in establishing the relationship between microfinance loans and household welfare in Bungoma County. It is based on the understanding that it describes conditions or relationship that exists, opinion that are held, process that are going on, effects that are evidence or trends that are developing. It involves fact finding operation design to search for information. But it does not answer why phenomena behave as they do. It is appropriate in determining the degree of to which variables are associated.

3.1 Population and Sample Design

The study population consisted of all the people residing in the urban centres of Bungoma County, who have been advanced microfinance loans and are still servicing the loans from 2009. According to the Revenue Allocation Commission (2009), the total population of urban centres in Bungoma county was approximately 228, 630 as per the National census of 2009. The population was broken further into the following major urban centres of Bungoma County: Kimilili 94, 927, Bungoma 55, 867, Webuye 41, 344, Malakisi 17, 083, Chwele 7, 206, Kapsokwony 6, 152, Cheptais 3, 152 and Tongaren 2, 899.

The sample size was derived as follows; $n = \frac{Z^2 Pq}{d^2}$

Where:

n = the desired sample size (if target population is greater than 10,000); z = the standard normal deviate at the required confidence level. ; P = the proportion in the target population estimated to have characteristic being measured; q = 1-p; d = the level of statistical significance set. We assumed 95 percent of the population will have the characteristics being measured, q=1-0.95. We also assumed the desired accuracy at 0.05 level. Where the Z-statistic is 1.96 at this level.

Therefore $n = (1.96)^2 (.95) (.05) / (.05)^2 = 72$.

n = the desired sample size when population more than 10,000.

N = the estimate of the population size (Mugenda and Mugenda, 2003)

From the 8 stratas, a total sample size of 72 people was selected; the researcher then picked respondents through judgmental sampling from each of the strata.

3.2 Data collection

The study made use of primary data which was collected from households who have taken microfinance loans from microfinance institutions in Bungoma County. Those involved in the study included men and women who were perceived to be the heads of the households and who had accessed microfinance loans for a period not less than three years. Information was sought on the socioeconomic characteristics of households of Bungoma County, their sources and level of access to micro-finance loans. The researcher engaged microfinance officers in order to identify these households. The researcher was able to meet with the respondents face to face to collect the data and explain some of the concepts to them.

3.3 Data Validity and reliability

The instrument was tested to verify that it measured what it was supposed to. The self-administered questionnaire was validated using the content validity, which is a process of logical analysis that involves careful and critical examination of items in the questionnaire. The credit officers of the microfinance institutions were interviewed to validate the questionnaire and to determine the reliability, a pre-test was done in all the microfinance institutions.

3.4 Data analysis

Descriptive statistics and Regression model were used in the analysis of the data. The descriptive statistical method was used to explain the socio- economic characteristics of the households. This involved the use of frequency tables and percentages. The regression model was used to identify the determinants of the use of micro finance loans by the households. It measured the parameters of the probability of having access to required funds and the effects of the marginal changes in explaining variables on the micro finance status of the households.

The model was expressed as; $H_W = a + b_1x_1 + b_2x_2 + b_3x_3 + b_4x_4 + b_5x_5 + b_6x_6 + b_7x_7 + \epsilon_i$

H_W = Household welfare which was measured through ability to earn extra income, access to better healthcare and education; a = y intercept when x is at zero value; $b_1, b_2, b_3, b_4, b_5, b_6$ and b_7 are the weights associated with the independent variables; x_1 = Total monthly household income which was measured by evaluating income before and after use of microfinance loans; x_2 = Women empowerment which was measured by the rate of women seeking microfinance loans and its ability to enable them provide for their families; x_3 = improved education and healthcare which was measured by the ability of respondents to access healthcare and education before and after use of microfinance loans; x_4 = Poverty reduction by evaluating the general living standards of the before and after use of microfinance loans ; x_5 = No of Small business/self-employment (no of employed persons in household) ; x_6 = Total consumption which was measured through evaluating the level of household consumption enhanced by use of microfinance loans; x_7 = Improved housing measured by better housing due to microfinance loans and ϵ_i = Error term.

The significance of the above regression model was tested using the R^2 value. A higher percentage meant that the coefficients explained well the dependent variable while a low percentage would be the reverse. In this case therefore an R^2 value of more than 70% was significant to explain the dependent variable. In order to operationalize the variables, the researcher regressed the dependent variable (Responses on whether or not people had taken loans) against the above dependent variables.

4.0 DATA ANALYSIS RESULTS AND DISCUSSIONS

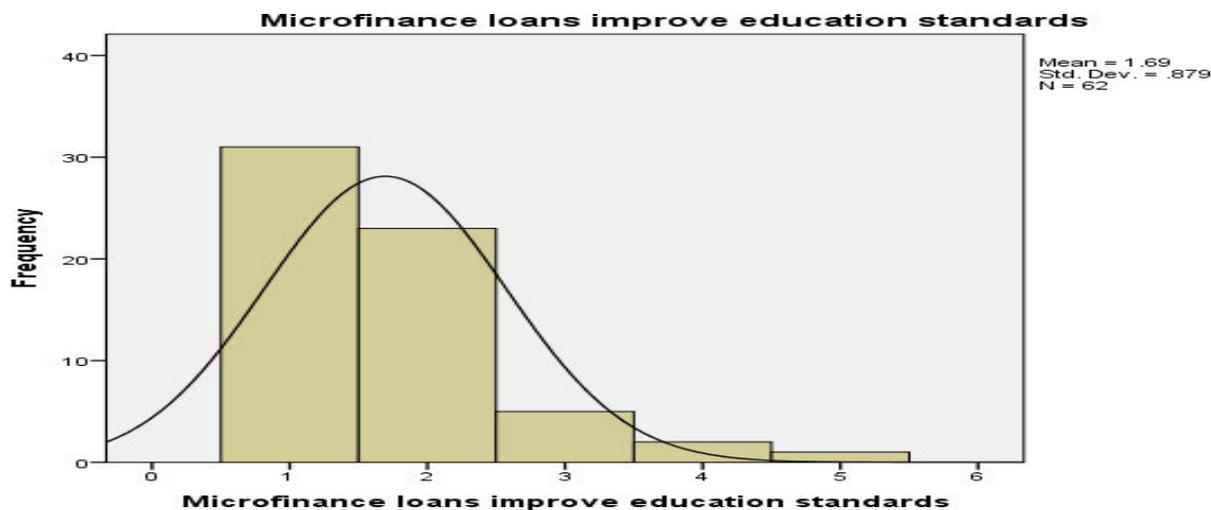
Data was successfully collected from 62 respondents out of the sample size of 72. This was a response rate of 86 percent which was considered to be enough for this study. The researcher sought to establish the number of

respondents that were from each of the eight urban settlements in Bungoma County. It is evident that from the findings that most of the respondents were from Kimilili. Bungoma had the second highest number of respondents at 29 percent. Webuye came in third with 21 percent of the respondents who participated in the study. The study also sought to investigate whether the respondents had taken any loan from microfinance institutions. It can be observed from the findings in Table 4.2 that 85.5 percent of the respondents agreed that they had taken loans from microfinance institutions. This is an indication that many rural households are making use of microfinance loans.

The study also established that majority of the respondents who participated in the study were females. They were represented by 51.6 percent of the respondents who took part in the survey. Male respondents constituted 48.4 percent of the respondents who participated in the survey. This is an indication that women are making use of microfinance loans more than men. The age distribution of the respondents was also of interest to the researcher. The main interest was to find out the age distribution among the respondents who took part in the study. It is evident from the findings in table 4.4 that approximately 50 percent of the respondents were between the age brackets of 31-40 years. This shows that these are people who are at their prime and energetic age. They are also people who are either unemployed and therefore try self-employment by starting businesses financed by microfinance loans.

4.1 Relationship between microfinance loans and household welfare

Figure 4.1: Microfinance loans improve education

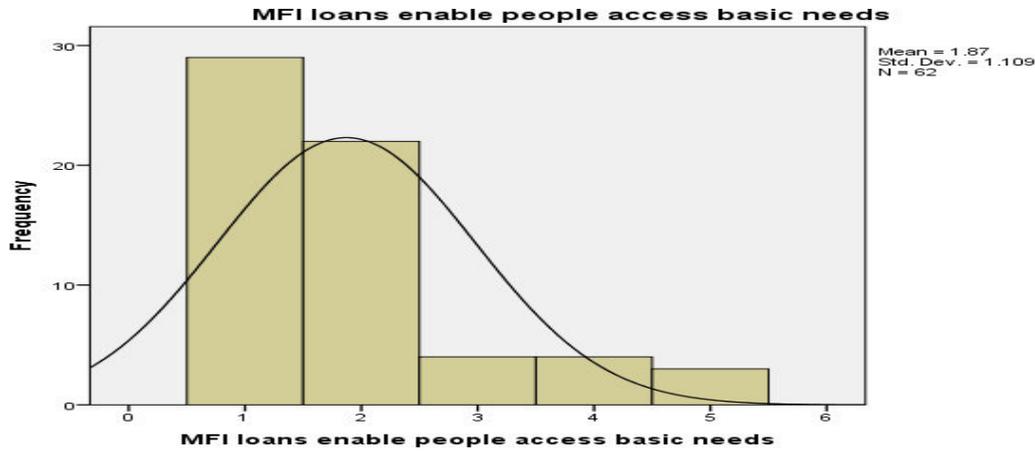


The respondents were required to give their views on whether microfinance loans improve education. The findings in the graph above indicate that most of the respondents agreed that microfinance loans assist rural households to improve education standards. This happens mainly when rural households who successfully start businesses are able to earn extra income to pay fees for their children. It can also be observed from the findings as illustrated in Table 4.5 that 50 percent of the households access and utilize microfinance loans to get access to improved healthcare.

Empowerment of women is usually considered as one of the strategies of poverty alleviation. The study sought to find out whether provision of microfinance loans is one of the ways of empowering women. It is clear from the findings as tabulated that 54.8 percent of the respondents are certain that MFI loans have played a

significant role in empowering women. This is possible when women are able to start income generating activities that place them in a position of providing for themselves and other members of the family.

Figure 4.2: MFI loans enable people access basic needs



The respondents were required to indicate whether microfinance loans play any role in enabling rural households to access basic needs. The findings presented in Figure 4.2 above confirm that majority of the respondents agree that microfinance loans assist rural households to afford basic needs. This is made possible when rural households are able to earn extra income once they utilize microfinance loans to engage in income generating activities. The study also investigated whether access to microfinance loans by rural households had any effect on the consumption patterns of the households. It can be observed from the findings illustrated in Table 4.7 that 27.4 percent agreed that microfinance loans have assisted them to enhance their consumption. However, it can also be observed that 25.8 percent of the respondents were not sure whether the loans are able to enhance consumption. The main reason behind this is because some households have not utilized the loans for long hence may not be able to ascertain the effects of the loan.

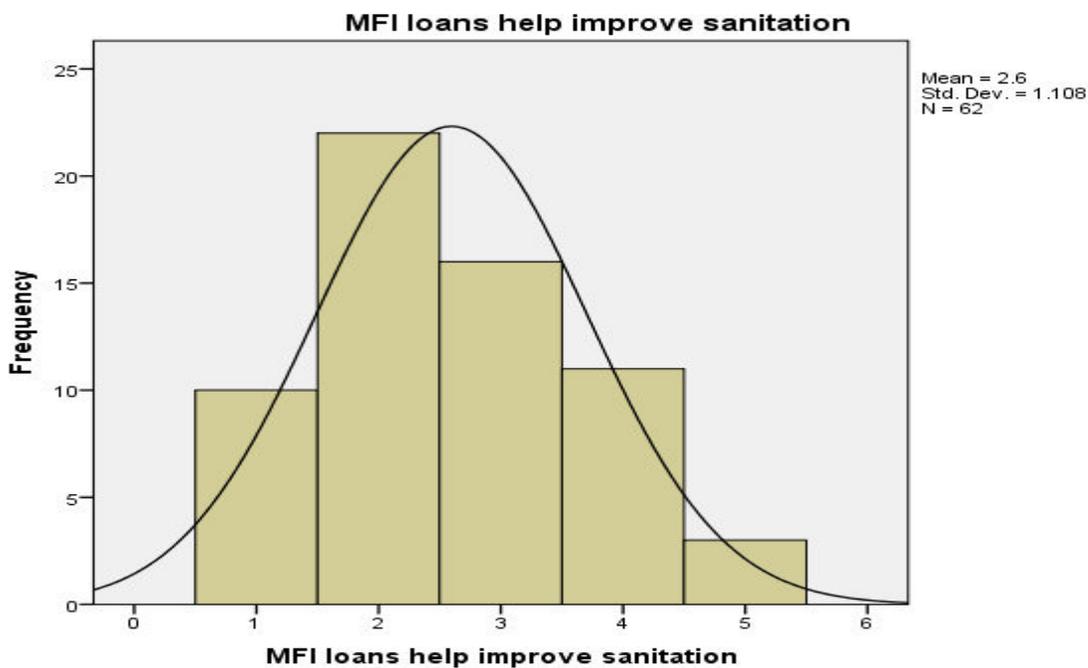
Figure 4.3: Families earn extra income through MFI loans



When the respondents were asked to state whether the utilization of microfinance loans have enabled the households in Bungoma county to earn extra income. As can be observed from the graph above, majority of the respondents confirmed that microfinance loans have enabled them to earn some extra income. This income is mainly from the businesses that are financed by the microfinance loans. The use of microfinance loans has the capacity to transform households and improve their living standards. The finding in Table 4.8 indicates that 37.1% of the households in agree that their living standards have been enhanced by microfinance loans.

It was also established from the study that access to microfinance loans by rural households in has positive effects on the level of farm produce. More than 30% of the respondents indicated that their farm produce has been enhanced by utilization of microfinance loan. When farm produce is enhanced then rural households are able to overcome the challenges of food security.

Figure 4.2: MFI loans help improve sanitation



The researcher wanted to find out from the households in Bungoma county whether their sanitation has improved as a result of utilization of MFI loans. It is evident from the findings in Figure 4.4 above that more than 20 percent of the respondents agreed that MFI loans have assisted that households to improve their sanitation. It is important for the researcher to find out whether the respondents thought MFI loans make households better or worse. The results illustrated in Table 4.10 confirm that 48.4 percent of the respondents agreed that microfinance loans make households better off. This is an indication that most households support the utilization of microfinance loans since they understand its potential to eliminate poverty and not going for the loan for the sake of it.

4.3 The Impact of Microfinance loans on house hold welfare.

In order to establish the impact of microfinance on household welfare, a regression analysis was conducted. Household welfare was the dependent variable, while MFI loans enable people access basic needs, MFI loans assist rural households start businesses, Microfinance loans improve education standards, MFI loans empower women, MFI loans assist in improving healthcare, Household consumption is enhanced by MFI loans,

Microfinance loans enhance living standards of households and Families earn extra income through MFI loans were the predictors or independent variables. The study adopted the following regression equation to illustrate the above explained relationship: $H_W = a + b_1x_1 + b_2x_2 + b_3x_3 + b_4x_4 + b_5x_5 + b_6x_6 + b_7x_7 + \epsilon_i$

a. Predictors: (Constant), MFI loans enable people access basic needs, MFI loans assist rural households start businesses, Microfinance loans improve education standards, MFI loans empower women, MFI loans assist in improving healthcare, Household consumption is enhanced by MFI loans, Microfinance loans enhance living standards of households, Families earn extra income through MFI loans

b. Dependent Variable: Household welfare:

It can be observed from the Model summary table that the R square figure is 0.801. This value when converted into a percentage will be 80.1 percent. This therefore implies that the eight predictor variables mentioned above contribute or explain up to 80.1 percent of the variance in household welfare in Bungoma County. This therefore means that 19.9 percent is explained by variable that are outside this study. From the Anova table, it is evident that the significance of our regression model is 0.000 and indication that there is a very strong relationship that exists between the dependent and predictor variable on this study. It therefore means that our model is a reliable one that can be used to establish household welfare in Bungoma County.

Table 4.11: Model Summary^b

Model	R	R Square	Adjusted Square	R/Std. Error of the Estimate
1	.895 ^a	.801	.771	.503

The table of coefficients gives the weights that are associated to the eight independent variables that explain the variance in household welfare. The constant value of 0.122 is the value assumed by household welfare when x has a value of Zero. Based on the above weights, the study came up with the following multiple regression equation that can be used to explain the impact of microfinance loans on household welfare: $H_W = 0.122 + 0.137x_1 + 0.212x_2 + 0.267x_3 - 0.011x_4 - 0.193x_5 + 0.383x_6 + 0.022x_7 + 0.340x_8 + 0.196$

5.0 Summary of Findings and Discussions

The study established that most of the households had taken microfinance loans from MFI institutions. A greater percentage of those who have taken these loans were found to be women. Men who make use of microfinance loans are fewer compared to the women who do the same in Bungoma County. Among the eight urban settlements of Bungoma County, Kimilili had the highest number of respondents who had taken microfinance loans. Majority of those taking microfinance loans were found to be between the ages of 31-40 years. This is considered the prime age when people are willing to engage in income generating activities in order to avoid the challenges of unemployment. This forms the majority of the productive group in Kenya.

It was clear from the study that microfinance loans have several effects on the wellbeing of households. The study findings revealed that improvement of education standards is one of the effects of utilizing microfinance loans. The other effect of microfinance loans on household welfare was the improvement of healthcare. When households make use of microfinance loans, they are likely to earn extra unit of income that can assist them get access to better healthcare and education. The study further determined that women are the ones who benefit

most from utilization of microfinance loans since this is one way of empowering them. This aspect helps in the achievements of the Millennium goals and Vision 2030 in Kenya.

The study established that when rural households utilize microfinance loans especially in starting income generating projects, it gives them an opportunity to earn some extra income. Extra income in the hands of households enables them to afford the basic needs, enhance their consumption patterns as well as improve the living standards of the households. Most of the households in this study agreed that their living standards had largely improved courtesy of the microfinance loans they had put into good use. Majority of the households also indicated that their consumption had been enhanced by the utilization of microfinance loans.

It was also discovered that households who have utilized microfinance loans have access to improved and better sanitation. The other area where microfinance loans have assisted to improve is farm produce. The households who participated in this study confirmed that the use of microfinance loans in farming has assisted them to increase farm produce hence creating food security for them. The respondents summed up the effects of microfinance loans on household welfare by confirming that they make families well off.

From the regression analysis results conducted with household welfare being the dependent variable and MFI loans enable people access basic needs, MFI loans assist rural households start businesses, Microfinance loans improve education standards, MFI loans empower women, MFI loans assist in improving healthcare, Household consumption is enhanced by MFI loans, Microfinance loans enhance living standards of households and Families earn extra income through MFI loans being the predictors or independent variables, it was established that there is a strong relationship between the variables. The independent variables are able to explain a larger percentage of the variance on household welfare. The study therefore adopted the following regression equation that can be used to explain the impact of microfinance loans on household welfare in Bungoma County: $H_w = 0.122 + 0.137x_1 + 0.212x_2 + 0.267x_3 - 0.011x_4 - 0.193x_5 + 0.383x_6 + 0.022x_7 + 0.340x_8 + 0.196$

5.1 Conclusions

Utilization of microfinance loans by households in Bungoma County has varied effects on the welfare of the participating households. Some of these effects include: improved education standards, improved healthcare, improved sanitation, enhance consumption and living standards, earning of extra income as well as reduction of unemployment by providing an avenue for self-employment. There also exists a very strong relationship between household welfare on one hand and various variables used in the study.

5.2 Recommendations

Due to the evidence gathered from the study that microfinance loans enhance household welfare, it will be prudent for the government to ensure that the microfinance loans are more affordable and accessible to rural households. This will enable many households to get access to the loans.

Rural households who fear utilizing microfinance loans should be adequately trained on the best ways to do so. This will encourage many households to seek microfinance loans and thus enhance their incomes. There is need for workshops that will equip the household with personal financial management skills.

5.3 Suggestions for further Research

From the regression results, there is a variance of 19.9% that is not explained by the independent variables in this study. It will be important to carry out a further study to establish the other factors that can explain this variance as far as household welfare is concerned. It will also be important to conduct a comparative or replica

study with other counties in Kenya so as to establish the similarities and differences that may exist. A comparative study will shed more light whether the utilization of microfinance loans on household welfare is uniform across the country.

6.0 Appendixes

Table 4.1: Frequency Table

Name of urban centre

	Frequency	Percent	Valid Percent	Cumulative Percent
Kimilili	23	37.1	37.1	37.1
Bungoma	18	29.0	29.0	66.1
Webuye	13	21.0	21.0	87.1
Malakisi	4	6.5	6.5	93.5
Chwele	2	3.2	3.2	96.8
Cheptais	1	1.6	1.6	98.4
Tongaren	1	1.6	1.6	100.0
Total	62	100.0	100.0	

Table 4.2: Loan from microfinance

	Frequency	Percent	Valid Percent	Cumulative Percent
Yes	53	85.5	85.5	85.5
No	9	14.5	14.5	100.0
Total	62	100.0	100.0	

Table 4.3: Gender

	Frequency	Percent	Valid Percent	Cumulative Percent
Male	30	48.4	48.4	48.4
Female	32	51.6	51.6	100.0
Total	62	100.0	100.0	

Table 4.4: Age

	Frequency	Percent	Valid Percent	Cumulative Percent
21-30 years	21	33.9	33.9	33.9
31-40 years	31	50.0	50.0	83.9
41-50 years	8	12.9	12.9	96.8
Above 50 years	2	3.2	3.2	100.0
Total	62	100.0	100.0	

Table 4.5: MFI loans assist in improving healthcare

	Frequency	Percent	Valid Percent	Cumulative Percent
Strongly agree	10	16.1	16.1	16.1
Agree	31	50.0	50.0	66.1
Neutral	14	22.6	22.6	88.7
Disagree	7	11.3	11.3	100.0
Total	62	100.0	100.0	

Table 4.6: MFI loans empower women

	Frequency	Percent	Valid Percent	Cumulative Percent
Strongly agree	34	54.8	54.8	54.8
Agree	20	32.3	32.3	87.1
Neutral	7	11.3	11.3	98.4
Disagree	1	1.6	1.6	100.0
Total	62	100.0	100.0	

Table 4.10: MFI loans make families better off

	Frequency	Percent	Valid Percent	Cumulative Percent
Strongly agree	18	29.0	29.0	29.0
Agree	30	48.4	48.4	77.4
Neutral	7	11.3	11.3	88.7
Disagree	4	6.5	6.5	95.2
Strongly disagree	3	4.8	4.8	100.0
Total	62	100.0	100.0	

Table 4.12: ANOVA^a

Model	Sum of Squares	df	Mean Square	F	Sig.
1 Regression	54.013	8	6.752	26.690	.000 ^b
Residual	13.407	53	.253		
Total	67.419	61			

a. Dependent Variable: Household welfare

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	.122	.196		.622	.537
Families earn extra income through MFI loans	.137	.179	.131	.767	.447
MFI loans empower women	.212	.169	.153	1.258	.214
Microfinance loans improve education standards	.267	.140	.223	1.901	.063
MFI loans assist in improving healthcare	-.011	.175	-.009	-.063	.950
Microfinance loans enhance living standards of households	-.193	.136	-.232	-1.419	.162
MFI loans assist rural households start businesses	.383	.104	.393	3.672	.001
Household consumption is enhanced by MFI loans	.022	.121	.028	.183	.855
MFI loans enable people access basic needs	.340	.127	.359	2.671	.010

a. Dependent Variable: Household welfare

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