MODERATING EFFECT OF FINANCIAL LITERACY ON THE RELATIONSHIP BETWEEN LOAN CHARACTERISTICS AND FINANCIAL PERFORMANCE OF SMES IN BUNGOMA COUNTY KENYA

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ABSTRACT

The so called small and medium sized firms has proven to positively contribute to social-economic threats arising from poverty, increased job opportunities and economic upscaling. Even with such a remarkable support, these small firms still have challenges on their future survival due to financial accessibility levels and financial performance deterioration. The main goal of the current study was to assess the extent to which financial literacy moderated the association between loan characteristics (composite) and financial performance of SMEs in Bungoma County Kenya. More specifically, the study aim was; to assess the moderating effect of financial literacy on the relationship between loan characteristics and financial performance of SMEs in Bungoma County Kenya. The study was underpinned by the following four theories, namely; credit rationing theory, information asymmetry theory and financial literacy theory. The study used explanatory research design. The 4,264 SMEs operating in Bungoma County represent the study population out of which a sample size of 366 SMEs firms were determined using Yamane formula of 1967. The sample elements were selected through stratified random and convenience sampling technique. To collect data, a drop and pick approach was utilized whereby all the structured questionnaires were distributed to research participants. Where this approach was not suitable, the researcher considered use of Covid-19 Pandemic protocols. Research findings portrayed that financial literacy had statistically significant moderating effect on the relationship between loan characteristics and financial performance of financial performance of SMEs in Bungoma County, Kenya for there was both moderator and interaction term significant influence. Policymakers need to establish lending-borrowing policies which are friendly to the SMEs so as to accommodate the smaller firms such as micro-small. Investment in capacity building by financial institutions need to be given pre-eminence for the acquired skills by the loan borrowers aid in financial sustainability of the businesses they run due to improved financial performance.

Keywords: Financial performance; Nature of Loan Collateral: Loan repayment period; loan repayment mode; Loan Characteristics

INTRODUCTION

Across most economies, whether advanced or growing category, small and medium firms have empirically proven to play a pivotal role of manifold economic perspectives. This is evident through the eye lenses of poverty level lessening, increased employment opportunities and economic upscaling. These medium sized organizations boost such countries in matters of economic growth and development (Muhammad, et al. 2019). For instance, SME in most of the countries are the ones responsible for creating jobs. A good scenario is that of the thirty members of Organization for Economic Cooperation and Development (OECD) which are characterized by being highly ranked

income earning capabilities where by the SMEs with less than 250 workers take care of more than 2/3 of the formal employability levels.

Whereas, those SMEs in both moderate and highly ranked income bracket countries contribute more than fifty percent (50%) of the national output in terms of Gross Domestic Product (GDP) (OECD, 2005). To portray this importance, a country like USA which is economically advanced draws a lot of support from SMEs with less than five hundred workers which is enough evidence that these firms are economic pillar to the respective country. To be more precise, this sub-sector represents 99% of all the enterprises in that country and they engage over fifty percent (50%) of the employees assimilated by the private sector.

The sub-sector also creates around 65% of the new jobs in the economy as compared to other mainstream sectors. For your information, over half of U.S.A non-farm GDP is associated with SMEs and on the side of export statistics, SMEs contributes 98%. This translates to thirty four percent (34%) of income generated from those exports (Aseem, 2014). In other countries such as Indonesia, SMEs have been taking the lead as compared to the mainstream sectors. For instance, for the last six years between 2014 to 2019, it was witnessed that economic growth levels gradually upraised as follows; 7.39(2014), 7.55(2015), 8.03(2016), 8.23(2017), 8.4(2018), and 8.4(2019) (Bank Indonesia 2019).

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In other countries such as Nigeria, SMEs contribute about 46% of the national GDP and they represent 97% of the total population of firms in that country. Again, the same SMEs create more job opportunities even more than a half ($^{1}/_{2}$) of the work force in that economy (Taiwo, Ayodeji & Yusuf, 2012). Ghana also registers similar trend as far as economic growth and provision of job opportunities is concerned. For instance, the SME firms in the manufacturing sector contribute almost 85% of employment and at the same time contributes between (70-90) % of the national income of that country. Further, as it pertains the Ghanaian government sources of revenue, the SMEs take the lead for 92% of all the businesses taxed in this country are in this category (Aryeetey et al. 2017). It was also projected by Bhorat et al. (2018), that by 2030, SMEs in South Africa will have contributed to around 90% of the jobs available in that economy.

The success of vision 2030 which is a flagship plan in Kenya is pegged on poverty level lessening, increased employment opportunities and economic upscaling and introduction of innovations by SMEs in the country. This, by extension, both skilled and unskilled employees are engaged in

boosting the country's economy and also these efforts have trickled down to capital formation and wealth creation in the long-run. As a result, simultaneous gender empowerment and revenue generation has been realized (Staelens et al., 2018). In 2015, it was estimated that the SMEs in the country had contributed around Ksh 3,371.7 billion as compared to the overall output of 9,971.4 implying a contribution of 33.8%. In the preceding year of 2016, the SMEs were found to contribute Ksh 1,780.0 billion as compared to the sum total for the whole economy Ksh 5,668.2 billion (Kenya National Bureau of Statistics, 2016).

The SME fraternity has faced critical financial performance even with the major role that these firms apparently seem to play in the economy for over sixty percent (60%) of those firms do not cerebrate their third birthday. Their financial performance which is pegged on the extent to which the firms are able to access credit facilities and the investment decision made by the management at large is a major gap towards imminent failure of those firms (Njagi, 2017). Again, the external financing perspective is further complicated by the characteristics associated to the debt facility the counter-parties are supposed to adhere to such as collateral or security attached to the loan facility, repayment grace period and the mode to be adopted when repaying the instalments. Other factors such as market failures and bottlenecks determine the extent to which the laid down strategies can be adopted by the business such as new skills, networking in knowledge acquisition and finance and on public investments in domains related to training, education and innovational infrastructure (OECD, 2017).

Statement of the Problem

Most emerging markets are dominated by the firms in the SME category which plays a vital role such as job creation and economic growth and development. It is already proven that these firms cut across most of the sectors in a country. Again, a similar pattern of occupancy has been witnessed globally (Geremewe, 2018). The same firms take the lead in creating jobs and innovations in both developed and developing economies. In Kenya, specifically 90 percent are firms classified as SMEs and they contribute between 50 to 100 percent of the job opportunities of the country. In fact, to be more precise, they contribute $^{7}/_{10}$ of all the jobs in the country (Kenya Bankers Association (KBA), 2019).

From the global viewpoint, around fifty percent of SMEs were not in a position to witness their 5th anniversary of their formation. It was further confirmed that around two thirds of these firms don't go beyond ten years of their operations (Yusoff et. Al., 2018). Despite the endless endeavors that the Kenyan government puts in catapulting SMEs to the next level, 60% of the latter has been facing closure annually due to financial performance go slow (Capital Market Authority, 2015). Further, over two million SMEs in Kenya have portrayed low financial performance for the last five years, 2016 inclusive (KNBS report, 2016). It was evident that the most of these firms brought to an end of their business activities between 3-8 years and out of the total number of those organizations, approximately 50% of them go under before celebrating their first year of anniversary came to an end (Economic Survey Report, 2017). In Bungoma town, it is clear that as per KIPPRA report of 2018, SMEs participation in economic growth had been dwindling since 2015 which was associated

with low financial performance. On the same breath, SMEs in Bungoma County portrayed a survival rate of 5.6% (KIPPRA, economic survey report, 2018).

According to (CBK, Bungoma SME Report, 2015), SMEs in Bungoma town have suffered a blow of low-quality financial records, characterized by inadequate (not enough) loan collateral requirements, and informality in financial processes in addition to the challenges these firms face from large organizations. According to the same report aforementioned, these SMEs experience retail customer inter-competition amongst themselves. Further, it was reported by the commercial banks serving these SMEs that the latter have a common problem of poor managerial practices and lack of skills to manage diverse risks. The challenges of accessibility to loan facilities from financial institutions due to predetermined collateral requirements, long government red-tape debt processes, and other unfriendly related terms and conditions have also posted a major challenge to SMEs which adversely have affected their financial performance (Muguchu, 2017).

According to past literature, it is empirically evident that the conceptual viewpoint of accessibility and productivity in terms of financial performance of SME controversy is yet to be resolved amongst scholars. Diverse debate has resulted to dissimilar empirical research findings. For instance, globally, loan characteristics to financial performance studies for SMEs under the so called Vise grad economies (ie countries), namely; the Republic of Czech, the Republic of Slovak, Hungary and Poland (Jianmu and Kulathunga, 2019), empirically proved that in cases where longevity matters, loans with a longer repayment period were most likely to be collateralized as compared to those categorized as having a shorter repayment periods. Hence longevity had collateral implications on the perspective of repayment of external debts. Contrariwise, it was established that risky borrowers in Bangladesh did not make any difference of being provided with more debt facility by small banks in that country by the virtue that they provided more collateral or their collateral represented a bigger monetary value than the previous one (Rahman, Rahman and Ključnikov, 2016). Further findings as per the study by (Buchdadi, 2020) in Indonesia, it was clear that financial literacy effectively moderated the conceptual view of finance accessibility levels and financial performance linkage of SMEs in that country.

Akiiza (2018) study in the context of Uganda locality which focused on the relationship between collateral and productivity level in terms of financial performance of SMEs portrayed that there was favorable connection between the collateral required by the bank because the availability of collagenized properties and client meeting the collateral requirements by commercial banks catalyzed provision of loans to SMEs which in return propelled the performance of these SME organizations in Uganda. Muhammad, et al. (2019) also did another empirical study in Kano City in Nigeria, where by the research findings demonstrated that there existed statistically significant direct connection on the aspect of size of the loans issued and loan repayment period.

In the Kenyan context, dissimilar research outcome has been realized as far as the joint association of loan characteristics, financial literacy and small firm productivity levels in terms of financial performance of SMEs is concerned. A good example is the investigation which was undertaken by Njagi (2017) whereby the end results was statistically significant effect on the short-lived debt facility and profitability aspect of SMEs in terms of financial performance which was direct. In

another study of Syomane and Wachira (2018) on loan payment and loan default it was revealed at 99% confidence level that the connection between the two study variables was moderate and a direct one.

The study carried out by Ayoo (2019) investigated on the conceptual linkage of loan repayment mode and financial performance viewpoint of SMEs located in Kenya. The research outcome depicted that the association was a negative one and it was not statistically significant. Therefore, this study aimed at providing a solution to the already existing research gaps on assessing the moderating effect of financial literacy on the relationship between loan characteristics which was a composite index and the financial performance of SME firms operating in Bungoma, County.

Research Hypothesis

The moderating effect of financial literacy on the relationship between loan characteristics and financial performance of SMEs in Bungoma County Kenya is not statistically significant.

THEORETICAL REVIEW

Theoretical focus is the dominating subject in this section. Therefore, the concentration in this segment is to highlight the underpinning theories which focus on; credit rationing, information asymmetry and financial literacy viewpoints.

Credit Rationing Theory

This is a theory which was suggested by a classical author in Corporate Finance in 1981 by the name Stiglitz and Weiss (1981). They are the mainstream author and the proponent of this theory. The theory portrays the conceptual framework for analyzing the financial inefficiencies that dominate financial markets which may have financing implications on SMEs such as being underfinanced.

The theory advocates that there exist inefficiencies in the market (that is financial) connected to issues to do with information asymmetry (uneven information distribution amongst the market players) which make financial markets to malfunction especially in the third world countries. The theory pinpoints that as a result of this anomaly, there arises the challenge of credit rationing which refers to extra demand levels for loan facilities for those loans dominated by loans with quoted rates which hit below the expected bourse clearing heights (Jaffee and Stiglitz, 1990). So, when the loan borrowers are turned down when they come over to borrow, there arises the loan amount proportioning where by the borrower is allowed to access less than the amount of loan initially applied for (Okurut, 2004).

When scenario of limited liability occurs in the financial market, such that only few borrowers access the financing facility, there are high chances of inclination for hazard amongst borrowers which goes together with antipathy amongst loan lenders. This is as a result of the restricted obligation with respect to loan borrowers who are for the opinion that in such a situation, then the

money lenders need to bear the entire drawback hazard. While on the other hand enjoy all the profits from the loans advanced to the borrowers being ploughed back to the loan borrowers which result to increased loan costs which make such clients drop from the pool of borrowers. As a result of this action, there arises an antagonistic compositional effect such as higher financing costs and increased borrowing risks (Parikshit et. al., 1999). Under such conditions of high borrowing fees results to the promising loan borrowers quitting the market.

The relevance of this theory is that when the terms of the loan facility provided by the financial institution is favorable, the SMEs are able to financially get equipped which positively contribute to their financial performance. Contrary, if the terms are harsh, then there is loan credit rationing which lower financial performance of these SMEs. For instance, if the credit terms are favorable such as availability of enough loan amounts which is also affordable due to low interest rates, then there is an assurance of fuser friendly schedule for making the payments needed. So, this helps SMEs maintain sufficient financial liquidity so as to run their activities affiliated to working capital without straining. Further, the action makes it easier for the SME owners or operators to promote the productivity of their respective SMEs profitability (i.e., financial performance). The reason being that there exists an opportunity cost of undertaking another investment avenue from their sales proceeds so as to improve on profitability. As a result, these firms of SME nature will experience an upward movement of net profit margin which by extension lifts the capital base as opined by (Kuria, and Willy, 2014).

Information Asymmetry Theory

As pertains the aforementioned theoretical viewpoint, it is of paramount importance to this study for it was developed by Akerlof, 1970 with the intention of portraying how lack of enough or full information across all market players can contribute to the aspect of mispricing of the products on sale. Akerlof, (1970) argued that the parties involved in a transaction should have equal information between themselves so as to make well-informed decisions. So, one of the key assumptions that need to hold so that the theory may work is that the information pertaining the product in question should be symmetric between the parties. However, when this axiom fails to work, then there occur price distortions which sway away the objective of the optimal allocation of the economic resources available.

Information asymmetry theory observes that sometimes market participants hold this information at the state of asymmetry (Messai, 2013). Further, the author of this theory, that is, Akerlof (1970) guided on the alternative course of action once such a scenario occurs. He was of the opinion of obtaining adverse section in the market. Also, Murumba (2013) portrayed that it is doable in such a situation such that the market players can purchase solutions externally by paying incentives to economic agents with full knowledge of what is happening in the market.

For the firms under the SME categorization umbrella, it is assumed that managers of this firms have insider private information concerning the enterprise characteristics or maybe they possess private information pertaining streams of returns of the firm the financing institution is not aware of at the time of lending. The financial institution may be aware of the credit risk breakdown for the whole

lot of borrowers but may not know exactly the individual borrower's characteristics. This is information asymmetry state which when it lacks on the side of one party, this may lead to loan default occurrences. Such a scenario arises where information asymmetry exists and the financial institution lack information pertaining the individuals' amounts of default costs especially for a particular client due to the fact that the monitoring and control systems affiliated to a particular institution may be imperfect.

The information asymmetry theory is in support of the current study for the SMEs management structures are such that the secrets of the organization are in privy of the owner or members of the family who run the organization and therefore it is hard for the privy information for the business to be released to a third party. On the other hand, the lenders are not thoroughly known by their clients. All these circles of missing information to one party and not the other results to lending terms such as loan repayment mode has to be revised upwards or downwards based on the available information. Therefore, the more uncertainty the available information level is the shorter the repayment instalments are set by the bank and this may adversely affect the financial performance of the business. This theory addresses the third specific objective on the loan repayment mode.

Financial Literacy Theory

The theory of financial literacy advocates for training of consumers of financial products to be well versed on how to make well-informed decisions especially on matters of investment and financing of the business or otherwise. The theory has a supposition that financial literate people will behave in accordance to dual-process theories of intuition and cognition. In this case, the individual behavior is controlled by the instinctive and reasoning which guide him or her to make the final decision according to (Evans 2008).

Many market players have made use of this theory which entails a combination of how the investors conceptualize on a financial product and their ability to accommodate the risk of that product in the process of making a rational decision on the same. The theory acts as a yard stick when seeking for guidance on ways or courses of action to undertake to scale up on their productivity through financial fitness (Atkinson & Messy, 2005). So, the matter of financial literacy theory advocates for impartation of the relevant knowledge and skills to the market participants so as to promote their financial management decision making processes.

The theory underpins the challenges the investors face by equipping the latter to strategize on how to overcome financial crisis by being enabled to mitigate risks such savings accumulation, asset diversification through use of portfolios and insuring of projects. The theory equips the market players with logic behind some actions like timely or prompt bill payments, effective management of debt where by as a result it translates to building of a good name for the sake of creditworthiness of potential borrowers and improvement of other aspects such as proper systems of finance, and reduction of poverty.

Financial literacy or supposition has played a pivotal role in financial product consumption due to the fact that this supposition has increased the effectiveness of financial product utilization amongst

investors and also curbed the high-risk appetites with most of the financial product retailers. The theory has also proven to equip the educated lot to stand their ground and push for promotion of the aspect of efficiency and quality in that order of financial services through the relevant regulators. On the same breath, the financial literate persons are in a better position to establish competitive edge in the financial institution fraternity for them to provide well price-valued products. This is achievable through comparing the product options available such as bank account terms and conditions, savings products and debt credit options offered by those financial institutions. Other products made available due to health competition is the payment instruments, investments and insurance covers (Miller, Godfrey, Levesque, & Stark, 2009).

The current study is underpinned by this theory of financial literacy for it portrays the moderating role in the relationship between loan characteristics on productivity of the SMEs in terms of financial performance for this aspect is an eye opener to the managers of SMEs which helps them to manage almost all aspects of loan characteristics such as the nature of collateral to attach to a loan facility, assessment of lending terms such as installments payable and the timing of installments made. This guided handling of the loan characteristics components in a well-informed manner minimizes the risk of loan default whose history trail by the lenders may translate to denial of a loan facility which can adversely affect the financial performance of the SMEs.

RESEARCH METHODOLOGY

Target Population and Sampling

Sample Size and Sampling Procedure

Yamane formula, (Yamane formula, 1967) which is a scientific formula was used to arrive at the sample size. In this study, a sample size of 366 SMEs in Bungoma County was identified to represent the whole study population which was 4,264 SMEs. Table 1 below provides a summary to that effect.

Table 1: Sampling Procedure

	Business Category	Population	Sample	%
1.	MANUFACTURING	24	2	0.5
2.	AGRICULTURAL	86	7	1.91
	SERVICE:			
3.	HOTELS	927	79	21.6
4.	EDU/ INSTITUTIONS	1476	126	34.4
5.	ICT SERVICE PROVIDERS	31	3	0.81
6.	RETAILER	1571	135	37
7.	DISTRIBUTORS	31	4	1.1
8.	CONSTRUCTION FIRMS	118	10	2.7
	TOTAL	**4,264**	**366**	**100**

As per Table 1, out of 4,264 SME businesses, 366 of them were involved in the study. This comprised of the following registered SMEs located in Bungoma Town, falling under different sub-sectors/stratas namely; Manufacturing, 24; Agricultural, 86; Hotels, 927; Educational Institutions,

1476; ICT Service Providers, 31; Retailer, 1571; Distributors, 31 and Construction, 118. The SMEs firms were obtained by using the Yamane formula (Yamane, 1967).

According to (Yamane, 1967), in a case or circumstances where the population is a finite one, in other words the population size is well-known, like in this case where it is 4.,264, then the Yamane formula is the most Scientific method of determining the suitable sample size. This is undertaken as per the formula below:

n = N / (1 + Ne^2)

n = (N 1+ℕe 2)

$$n = \frac{N}{1 + Ne^2}$$

$$n = \frac{4{,}264}{1+4262 * .05^2} = 366$$

Whereby;

n is the selected size of the sample as per Yamane formula of 1967 used. N is population size, and e represents the Margin of error (i.e., M. o. E.), e = (.10, .05 or 0.01 which can be pegged on the prevailing research circumstances. For the current study, the confidence level of 0.05 is considered more appropriate.

To select the sample size after applying the Yamane formula of 1967, further, stratified random sampling methodology was now applied to select the 366 SMEs in Bungoma town. The researcher was careful to adopt or adhere to the already set stratus by the regulatory body, namely; Bungoma County Department of Trade. The study utilized convenience sampling technique to select samples from every stratum which had all the relevant components of loan characteristic, financial literacy on financial performance under study, namely; nature of loan collateral, mode of loan repayment, repayment period, financial literacy with physical/ or on-line team business workshops viewpoint on financial performance.

Data Analysis

The next step in this chapter was data analysis which was undertaken after the data had been collected. This started with data editing activities, coding process, categorizing of the items useful in analysis and the keying in of the data in to the SPSS program ready for actual data analysis. data analysis was undertaken as follows; test for general movement of the study variables to seen whether the trend is a normal one or otherwise. In this case, descriptive data analysis was used where by both measures of central tendency and measures of dispersion were considered which include mean, frequency, and standard deviation. To achieve the objective of assessing the weakness or strength and direction between study variables, the researcher engaged Pearson Product Moment correlation Coefficient model.

RESEARCH FINDINGS

Pearson's Product Moment Correlation

Correlation coefficient measure was utilized by this study (i.e., Pearson Product-Moment correlation coefficient) to assess the strength and the direction of the various study variables used. The linearity correlation of the main study variables is represented by r. The three study variables

considered were; loan characteristics which is a composite score of nature of loan collateral, loan repayment period and loan repayment mode which is the key predictor variable. Then the dependent variable is financial performance. The outcome was as indicated in the correlation matrix as per Table 2 below

Table 2: Correlation Analysis Results

		FP	LC	FL
FP	Pearson Correlation	1.000		
	Sig. (2-tailed)		.	
LC	Pearson Correlation	.814**	1.000	
	Sig. (2-tailed)	.000		
FL	Pearson Correlation	.727**	.678**	1.000
	Sig. (2-tailed)	.000	.000	

**. Correlation is significant at the 0.01 level (2-tailed).

Loan characteristics had a strong link with financial performance as per Table 2 which was significant with r=0.814 and (p=.000). Such that, a one-unit favorable variation in Loan characteristics translated to a direct favorable alteration in SME firm productivity in terms of financial performance of 0.814 units. Again, the aspect of financial literacy had a significant association with productivity level in terms of financial performance with ***r***=0.727 and ($p < .01$). Such that, a favorable one-unit adjustment in financial literacy training translated to a direct change of 0.727 units in financial performance. The association between loan characteristics and financial literacy was positive and significant. Such that a unit change in financial literacy aspect will result to 0.678 direct units change in the level of financial performance with ($p < .01$).

Multiple1Regression

To test the null hypothesis one which stated that "*There is no significant moderating effect of financial literacy on the relationship between loan characteristics and financial performance of SMEs in Bungoma County, Kenya.*

The following moderating conditions applies as follows;

Moderation is said to be occurring if significant change is observed in the adjusted R^2 and new interaction term.

Full moderation is assumed to have occurred if both the predictor factor and the moderator are statistically insignificant with interaction term being present. That is interaction term is statistically significant. It is dominating the relationship

Partial moderation is assumed to have occurred if both the predictor factor and the moderator are significant, and the main effects are still significant according to the suggestion of (Aiken & West, 1991).

Table 3 below represents the outcome of the moderation process carried out.

Table 3: ANOVAa

Model		Sum of Squares	Df	Mean Square	F	Sig.
	Regression	146.191	2	73.095	273.830	.000[b]
1	Residual	74.476	279	.267		
	Total	220.667	281			
	Regression	153.943	3	51.314	213.800	.000[c]
2	Residual	66.723	278	.240		
	Total	220.667	281			

a. Dependent Variable: FP
b. Predictors: (Constant), FL, LC
c. Predictors: (Constant), FL, LC, LC_FL

From Table 3, the F statistics was 273.83 with (p=0.00). This portrays that the overall model used to estimate the financial performance of SMEs in Bungoma County was appropriate for it was statistically significant at 95% confidence level. Test for moderation was then undertaken and the outcome was as indicated in Table 4.

Table 4: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.814[a]	.662	.660	.51666	.662	273.830	2	279	.000
2	.835[b]	.698	.694	.48991	.035	32.300	1	278	.000

a. Predictors: (Constant), FL, LC
b. Predictors: (Constant), FL, LC, LC_FL
c. Dependent Variable: FP

From Table 4 on model summary, it was portrayed that moderation has occurred for there was significant change in the adjusted R^2 and new interaction term. For as per model 1 and 2, the change observed was 0.627(0.662-0.035). This is statistically significant. Further, test for moderation effect was evident in Table 5 which have the coefficients for both moderator and the interaction term. the results are as follows

Table 5: Coefficientsa

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	.016	.090		.178	.859
	LC	.985	.094	.839	10.496	.000
	FL	-.031	.088	-.028	-.351	.726
2	(Constant)	1.962	.353		5.559	.000
	LC	.137	.174	.117	.791	.430
	FL	-.695	.143	-.632	-4.842	.000
	LC_FL	.242	.043	1.306	5.683	.000

a. Dependent Variable: FP

From Table 5 above, model one, before introducing the interaction term portrays that the predictor variable which in this case is loan characteristics statistically significantly estimated the financial performance of SMEs in Bungoma County Kenya in the presence of the moderator which is the financial literacy.

In model two, after introducing the interaction term (LC_FL) partial moderation occurred for both the moderator and the interaction term are significant, and the main effect is not significant (Aiken & West, 1991).
The second model developed from this analysis was presented as follows;

FP= 1.962 + .117LC-0.632FL+ 1.306LC*FL
Where;
FP is Financial Performance.
LC is Loan Characteristics
LF is Financial Literacy
LC*FL is interaction term

Kariuki and Muturi (2017) undertook a bivariate study where they investigated on education level gauged using financial literacy indicator and the dependent variable which was loan repayment conceptual point of view. The outcome portrayed that all the explanatory variables had negative effect on the repayment aspect of the loan and was significant. Buchdadi (2020) aim was to find out the causes of the managers' financial educational level in terms of literacy on SME profitability. Outcome thereof portrayed that in the case of direct model, financial literacy level of the managers statistically significantly influenced profitability of the SMEs in terms of financial performance.

Further, the study by Menike, (2019) was based on SMEs in Sri Lanka whereby financial literacy and performance of SMEs association was interrogated. Findings portrayed that SME owners' financial knowledge on how their firms performing, the financial influence and financial behaviors had statistically significant positive influence on the productivity.

CONCLUSION

Failure to accept the null hypothesis one (H_{01}) resulted to acceptance of the alternative hypothesis which states that; "the moderating effect of financial literacy on the relationship between loan characteristics and financial performance of SMEs in Bungoma County Kenya is statistically significant.". This implies that engaging of SME officials such as managers, CEOs and managing directors or owners in financial literacy trainings positively and statistically contributed to financial performance. This significant prediction could be due to the "value addition" capacity building skills for managing the debts that was acquired by the trainees. This in turn boosted the level of operations through increased profitability and efficient and effective borrowing approaches to eliminate misappropriation of borrowed debts by the SMEs.

RECOMMENDATIONS

Policymakers need to establish lending-borrowing policies which are friendly to the SMEs so as to accommodate the smaller firms such as micro-small. This will increase the level of coverage or market share of the financial institutions as far as those who are eligible to debt borrowing is concerned. As a result, the level of financial deepening will be enhanced which translate to economic growth and development.

Investment in capacity building by financial institutions need to be given pre-eminence for the acquired skills by the loan borrowers aid in financial sustainability of the businesses they run. This reduces the rate of closure of those businesses and hence sustain employment opportunities to many citizens of a country. By extension, the financial institutions are in a position to plan for the ways of optimizing their financial resources when funding the aforementioned financial trainings.

REFERENCES

Aiken, L. S. & West, S. G. (1991). Multiple regression: Testing and interpreting interactions. Thousand Oaks, CA: Sage.

Akerlof, George A. 1970. "The Market for 'Lemons': Quality Uncertainty and the Market Mechanism." *Quarterly Journal of Economics, 84*(3): 488–500.

Akiiza, B (2018). Effects of credit terms on the financial performance of small and medium scale enterprises: A case study of Nansana Town Council, Uganda.

Aryeetey E., Baah-Nuakoh, T., Duggleby, T., Hettige, H., and Steel, W.F (2017) "Supply and Demand for finance of small enterprises in Ghana".World bank Discussion papers No.251,African Technical Department Series, World bank,Washington DC.

Aseem, G., & Kati, S. (2014). State of SME Finance in the United States. White paper.

Atkinson, A. & Messy, F. (2005), assessing financial literacy in 12 countries an OECD Pilot Exercise, Paris: OECD Financial Affairs Division.

Ayoo, O.P. (2019). Effect of mobile phone-based loans on performance of small and Medium size enterprises in Kisumu County. Unpublished MBA project of University of Nairobi.

Bank of Indonesia (2019), Database from Bank Indonesia.

Bhorat, Haroon, Zaakhir Asmal, Kezia Lilenstein, and Kirsten van der Zee. (2018). SMMES in South Africa: Understanding the Constraints on Growth and Performance. Development Policy Research Unit Working Paper 201802. Cape Town: DPRU, University of Cape Town.

Buchdadi, A.D. (2020). The influence of financial literacy on SMEs performance through access to finance and financial risk attitude as mediation variables. *Academy of Accounting and Financial Studies Journal, 24*(5), 245-595.

Capital Market Authority (CMA) Report, (2015).

CBK, Bungoma SME Report, (2015).

Economic Survey Report, (2017).

Evans, J. St. B. T. (2008). Dual-processing accounts of reasoning, judgment and social cognition. *Annual Review of Psychology*, 10(59), 255-278.

Geremewe, Y. T. (2018). The role of micro and small enterprises for poverty alleviation. International Journal of Research Studies in Agricultural Sciences, 4(12), 38–47.

Jaffee, D. M. and J. Stiglitz (1990): Credit Rationing, in: B. M. Friedman und F. H. Hahn (Hrsg.): Handbook of Monetary Economics, Vol. 1, S. 837-888, Elsevier, Amsterdam.

Jianmu, Y, and Kulathunga, KMMCB (2019). How Does Financial Literacy Promote Sustainability in SMEs? A Developing Country Perspective.

Kariuki, J.W. and Muturi, W. (2017). Effect of financial literacy on loan repayment a case of ecumenical churches loan fund, Kenya. *International Journal of Social Sciences and Information Technology, 3*(2), 1657-1675.

KBA. (2019, November 6). Banking sector unveils credit platform for small and medium enterprises. Kenya Bankers Association. https://www.kba.co.ke/news97.php.

Kenya Economic survey report (2017).

Kenya National Bureau of Statistics. (2016). Micro, Small and Medium Establishmen (MSME) Survey: Basic Report. Retrieved February 6, 2019, from http://www. knbs.or.ke/index.php?option=comphocadownload&view= category&id=137: micro small and-medium-enterprises-msmes&Itemid=599.

KIPPRA, economic survey report, 2018).

Kuria, M.M. and Willy, M. (2014). The effect of MFI credit on revenue of SMEs, a survey of Small Medium Enterprises in Nakuru Town. *International Journal of Science and Research (IJSR),* 10(14),123-135.

Menike, L.M.C.S. (2019). Effect of financial literacy on firm performance of small and medium enterprises in Sri Lanka, Financial Markets & Corporate Governance Conference, Availableat SSRN.

Messai, A. S., & Jouini, F. (2013). Micro and Macro Determinants of Non-Performing Loans, International Journal ofEconomics and Financial Issues., 3(4), 8.

Miller, M., Godfrey N, Levesque, B. & Stark, E. (2009). The Case for Financial Literacy in Developing Countries: Promoting Access to Finance by Empowering Consumers. World Bank, DFID, OECD, and CGAP joint note, Washington, DC: World Bank.

Muguchu, M. (2017). Relationship between access to credit and financial performance of small and medium enterprises in Nairobi, Kenya (Doctoral dissertation, University of Nairobi).

Muhammad, I. B., Bambale,A. J., & Ibrahim, M.A. and Sulaiman, S. A. (2019). Loan Characteristics, Loan Repayment and Performance of Small and Medium Enterprises in Kano Metropolitan: A Mediating Model. *Journal of Finance, Accounting and Management, 10*(1), 43-56.

Murumba, I. (2013). The Relationship between Real GDP and Non-Performing Loans: Evidence from Nigeria (1995–2009)". *International Journal of Capacity Building in Education and Management., 2*(1), 7-24.

Njagi, I.K(2017). Capital structure and financial performance of small and medium enterprises in Embu County, Kenya. Unpublished MBA Project of Embu University.

OECD (2017), Small, Medium, Strong. Trends in SME Performance and Business Conditions, OECD Publishing, Paris.

OECD, (2005). SME and Entrepreneurship Outlook. Paris: OECD.

Okurut. (2004). Credit demand and credit rationing in the informal financial sector in Uganda. Paper to the DPRU/TIPS/ Cornell conference on African development and poverty reduction: Development Policy Research unit. Kampala.

Parikshit G, Mookherjee D, Debraj R. (1999). Credit rationing in developing countries. To be published in Dilip Mookherjee and Debraj Ray (eds), A Reader in Development Economics, London: Blackwell, 2000.

Rahman A., Rahman M.T., Ključnikov A. (2016). Collateral and SME financing in Bangladesh: an analysis across bank size and bank ownership types, *Journal of International Studies, 9*(2), 112-126.

Staelens, L., Desiere, S., Louche, C., & D'Haese, M. (2018). Predicting job satisfaction and workers' intentions to leave at the bottom of the high value agricultural chain: evidence from the Ethiopian cut flower industry. *The International Journal of Human Resource Management, 29*(9), 1609–1635.

Stiglitz, E. J., & Weiss, A. (1981). Credit rationing in markets with imperfect information.

Syomane, F.S. and Wachira, K. (2018). Lender Characteristics Influencing Loan Default by SMEs in Kitui Central Sub-County. *International Journal of Business Management and Economic Research (IJBMER), 9*(6), 1501-1509.

Taiwo, A., Ayodeji,A.M., & Yusuf , A.B. (2012). Impact of Small and Medium Enterprises on economic growth and development. American journal of business and management,1(1),18-22.

Yamane, T. (1967). Statistics, an introductory analysis, 2nd Ed., New York: Harper and Row.

Yusoff, T., Wahab, S. A., Latiff, A. S., Osman, S. I., Zawawi, N. F., & Fazal, S. A. (2018). Sustainable Growth in SMEs: A Review from the Malaysian Perspective. *J. Mgmt. & Sustainability,*(4) 8, 29