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Analysis of equity capital structure financing levels on financial performance: A cross sectional survey of Savings and Credit Co-operative Societies (SACCOS) in Kiambu County, Kenya

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Abstract

SACCO societies have more complex financial structures given their localization of capitalization and liquidity albeit mutual guarantee capital structure. This study sought to analyze the effect of equity capital financing structure levels on financial performance of SACCOs. The study targeted 27 SACCOs in Kikuyu Sub County, Kenya. The study adopted a cross sectional survey research design to capture the opinions of SACCO societies' owners and/or managers at a specific time. Using stratified purposive sampling technique, 5 SACCOs and 10 key respondents were selected for the study. The study obtained primary data from the key respondents and secondary data from SACCO accounting records for the years 2013 to 2016. Data collected was presented and analyzed qualitatively and quantitatively using content analysis, and regression and analysis of variance (ANOVA) respectively. Based on the results, equity financing varied significantly in the specified period. The SACCOs' financial performance increased whenever there was a decrease in equity and increase in debt capital levels up to optimal level. The study further revealed that majority of the SACCOs did not employ debt financing in the previous years' compared to the current period. They significantly relied on members' deposits and retained earnings as prime sources of capital financing. The study recommends that Sub County co-operative officers should train the central management committee members and executive managers on capital financing strategies with the aim of enhancing effective and reliable financial performance of their SACCO societies.

Key words: equity capital, debt capital, financing levels, financial performance

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Introduction:

According to Mills and Davies (2013), a cooperative society is defined as an autonomous association of persons united voluntarily to meet their common economic, social and cultural needs and aspirations, through a jointly owned and democratically controlled enterprise. In agreement with this, Chandra, (2011), explains the key issues in equity structure decisions by asking: What is the optimal equity ratio for a firm (SACCO)? Which specific instruments of equity financing should the firm employ? Which capital markets should the society access to acquire equity financing? When should the co-operative raise equity finance and at what price should the firm offer its securities in order to acquire the necessary and rightful equity financing?

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Further, Zerfeshewa (2010) study in Ethiopia reiterates the importance of transformation mechanism of SACCOs into modern service delivery practice, financial product diversification and improving appropriate collateral system, adopting financial standards and the need for formulation of SACCOs Act are essential for effective performance. financial He recommends that his findings should get the attention of SACCOs' development workers and policy makers in order for them to improve the current situation of SACCOs financing through equity. This provides SACCOs not only with the advantage of members but also for the development of equity financial markets at the community level.

Mills and Davies (2013) reveal a number challenges faced by Co-operative of enterprises. The challenges include: limited access to equity finance, a lack of entrepreneurial skill, lack of general managerial skills, marketing and financial planning, lack of working business plans, poor record keeping, deficient corporate governance, a short term business outlook, poor borrowing and banking history among others. As this is not enough, SACCO Societies are also confronted with limited access to business equity financing, limited information access to on market opportunities and sources of competitive technology, local international and competition.

SACCO societies should meet workingcapital requirements that they need to fund their long-term business (Mills and Davies 2013). They need some form of long-term risk or loss-absorbing capital. The Cooperative Officer in Kikuyu Sub County cites that Co-operatives have an over reliance on members deposits, members share capital and retained finances compared to borrowed funds (Malinda, 2013). Due to unreliable source of equity capital, SACCOs are not able to function financially as expected. This gives the incompetency in the money market, not forgetting that they are not allowed to float their shares to the public.

Statement of the Problem: Many SACCOs are unable to acquire the necessary equity capital for their operations. This owing to the fact that, SACCOs operate the Back Office Saving Activities (B.O.S.A) for funds mobilization. SACCOs solicit funds through savings and lending to the registered members. Due to this, SACCOs experience difficulties when borrowed funds exceed the SACCOs own equity. This leads to reduced activities and less returns. SACCOs operate Savings the Front Office Activities (F.O.S.A) which is a replica of a banking section in a commercial bank. Money deposited by members in the F.O.S.A accounts are withdrawn at their own pleasure. These savings cannot be used by a SACCO for lending purposes because a member who made the deposit may withdraw such amounts an expectedly.

Chandra, (2011), reveals that there is a direct relationship between equity capital structure financing levels and the financial performance of a firm. There is need to clearly analyze the equity capital structure influence on financial performance in SACCOs. The researcher did a cross sectional survey of the savings and credit co-operative societies in Kikuyu Sub County in Kiambu county in Kenya to an earth the influence of equity capital on financial performance of SACCO societies.

In order to assess the effect of equity capital structure financing levels on financial performance, the study formulated the following objectives:

- 1. To determine the influence of Share capital on the financial performance of SACCO societies in Kikuyu sub County.
- 2. To establish the effects of retained earnings on the financial Performance of SACCO societies in Kikuyu Sub County.
- 3. To do analysis on equity capital financing levels on financial performance SACCO

Societies in Kikuyu Sub County.

Theoretical anchoring

This part summarises the relevant theories. The theories discussed herein are: Trade-Off Theory of Capital Structure and Pecking Order Theory as described by Fischer, *et al* (1989).

Trade-Off Theory of Capital Structure: Wakida (2011) purports that the purpose of the trade-off theory of capital structure is to explain the strategy a firm uses to finance its investments which in this study is equity financing levels. The Trade-off theory predicts that a weak firm will rely exclusively on a bank for debt capital. That is, for weak firms, bank debt dominates the mix of market and bank debt regardless of the priority structure and do not embrace equity financing. This result contradicts the notion that small and young firms avoid public debt because they lack access to such markets or face prohibitive costs and thus engage in equity financing to enhance financial performance.

Ghazouani (2013) says that within the tradeoff theory, there is a debt "peckingorder" with bank debt being preferred to market debt due to the lower implied bankruptcy costs. When the bank holds all ex-post bargaining power, the desired level of debt tax shields can be achieved using bank debt. This theory does not consider the equity financing levels required by an organization in order to enhance finance financial performance and of which SACCOs are not an exception.

A firm experiences financial distress when the firm it is unable to cope with the debt holders' obligations and hence, the option available is to adopt the equity financing in order to catalyze the financial performance of business organizations, SACCOs inclusive. If the firm continues to fail in making payments to the debt holders, the firm can even be insolvent. The theory can be explained by costs of financial distress and agency costs, the reason why Pandey (2011) explains that direct costs of financial distress include costs of insolvency which may manifest in the form of demoralized employees, customers who eventually stop purchasing a Society's products, investors who may decline to supply capital of any nature or avail it at a high cost and lastly managers who may pass up profitable investment opportunities in order to avoid any sort of risk.

Pecking Order Theory: This theory is based on the assertion that managers have more information about their firms than investors. This is asymmetric information. Managers issue debt when they are positive about their firm's future prospects and will issue equity when they are unsure (Pandey, 2011). This theory assumes that there is no target equity capital structure that should adopted by the firms. As a result, a firm will go for the cheaper source of capital, thus embracing the equity capital which is internally generated. The firms choose a capital structure depending on the following preference order: internal finance (inclusive of share capital), borrowed or debt capital, and then equity (inclusive of retained earnings). According to Wakida (2011), the pecking order theory developed by Myers (1984) states that firms prefer internal sources of finance; they adapt their target dividend payout ratios to their investment opportunities although dividends and payout ratios are gradually adjusted to shifts in the extent of valuable investment opportunities. Myers (1984), says that, in the event that external finance is required, firms are most likely to issue the safest security. They start with debt then possibly convertible debt then equity comes as a last resort since share capital and retained earnings exhibit no or

less costs to the organization. In summary, Myers' argument was that businesses adhere to a hierarchy of financing sources and prefer internal financing when available. Where external financing is required, debt would be preferred over equity.

Conceptually, the relevant dependent and independent variables may be depicted as shown below:



Equity Capital financing levels in SACCO Societies

According to Zeuli and Cropp (2013), SACCOs need adequate capital in order to function efficiently in order to cultivate growth. Therefore, before a SACCO starts business operations, money will be needed to cover the costs of membership. Cheap capital is needed to purchase the necessary land, buildings, machineries and other essential facilities. The members provide money for the purchase of fixed assets. This gives the SACCO a strong financial beginning and a good credit base. However, money provided by the members is costly since rebates in terms of dividends and interest should be paid to the providers of the funds. It is not only desirable, but necessary to pay members rebates at the time or shortly after, the product is delivered. Dividend is payable to the members by the end of the accounting period. As a result, income generated by the SACCOs should not be subjected to a lot of debts coverage rest the SACCOs will not be able to meet their obligations. This connotes that equity financing has the tantamount role to play in the financial performance of the SACCO societies.

Oginda (2013) observes that it is important when finance directors and managing directors try to fund the firm's assets to understand the impact of capital structure on their financial performance as well as the cost of funds since equity capital reflected less costs compared to debt or borrowed funds. Oginda further avers that capital and asset structure analysis are very important and are used to boost a firm's competitive advantage and consequently profitability. This means that, how well equity financing is managed determines a lot the financial performance of the SACCOs.

Oginda (2013), concluded that SACCOs must, be encouraged or assisted to obtain equity by encouraging members to finance the operations of the SACCO through share capital and retained earnings. This is also possible through educating and sensitizing the business owners (the members), of the benefits of listing in the stock exchange and by granting special fiscal measures. Based on this fact, he recommends that a narrow study covering specific segment of a an organization should be done to find out the impact of equity structure financing levels on financial performance.

Equity Capital Financing Levels

Equity financing in SACCO societies is composed of two main financings: the share capital and the retained earnings. The share capital is an amount contributed by the members on an agreed basis. Such amounts belong to the SACCOs and this type of capital finances the assets of the SACCOs. Share capital is non-refundable and hence it is the core capital of the SACCO Societies. Thus share capital is a buildup of equity funds taken to mean the funds contributed by the members of the SACCOs on a nonrefundable term and is a representative of the SACCO assets both fixed and current assets (Mills and Davies 2013). Alternatively, retained earnings are the amounts of money

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that are a residue after payment of taxes, dividends and interests on members' deposits and share Capital respectively. The more the earnings retained the better in an organization. This is because, the retained earnings do not earn dividends or interest as compared to share capital. Moreover, the directors of an organization decide how much to be paid in terms of dividends or interests and thus controlling the amounts of residue income residue; (retained earnings) by the end of each accounting period.

Critique of existing literature

According to Kuang and Ching (2009), when a business enterprise makes profits, it looks for more funding to enhance generation of Where there are no profits, the profits. enterprise in question may not good for more capitalization. Oginda (2013) discloses that equity capitalization in business enterprises calls for expertise and he says, the impact that befalls an organization when it alters its capital structure should be understood and should not be a trial and error. Wakida (2011) avers that a change in an equity structure of an enterprise will not only lead to an increase in the cost of capital but also changes its financing covenants. These covenants may call for increased funding securities and collaterals, which may be a hiccup for a business enterprise.

According to Karanja (2012), there is a positive correlation between total assets and the efficiency level of operations. He did find that large sized enterprises and organizations have better business performance compared to small-sized enterprises. His findings are regardless of the amount of capital applied in a business equity enterprise. Wakida (2011) revealed that there was a positive correlation between equity capital structures, cost of capital and funding covenants. Her findings implied that a change in equity capital levels would result in an increase in the cost of capital and

financing covenants. Karanja (2012) said there is a positive correlation between total assets and the efficiency level. Large-sized SACCOs in terms of assets were found to be more efficient than both medium-sized and small-sized SACCOs. He therefore, finds out that big enterprises will in one way or the other experience a positive financial operational experience compared to young and small-capitalized enterprises.

The studies cited above are on funding levels, knowledge required for effective business capitalization, effects of alteration of the capital structure and correlation between assets and efficiency level of operations. Their weakness is that they are not specifically analyzing equity capital structure financing levels and components on financial performance of SACCOs. The studies are focused on companies listed on the Nairobi stock exchange and mediumsized enterprises. It is notable that SACCOs have no authority to list on the said stock exchange. They cannot issue share capital to the market and neither can they raise capital through bonds and debentures. However, available literature does reveal the influence equity capital structure financing levels have on financial performance in SACCOs. The studies on SACCOs leverage assume a SACCO is a company and this is not the case. Following the above study review, there was a need to analyze equity capital structures and applications on financial performance in SACCOs. This is a stepping stone towards more research that need to be conducted to establish an optimal capital structure which can earn the members the optimal returns. Financiers, need to earn enough returns because of providing equity capital. The cost of equity capital should be covered in the proceeds of a SACCO thus making sure that SACCO ownership is not diluted.

Methodology

The researcher used a cross sectional research design aiming at capturing the views of

SACCO Societies' owners and managers. This gave a cross sectional view of the population thereby enabling the researcher to draw conclusions across a wide population on equity capital structure financing levels and financial performance within a given point in time. The study used quantitative and qualitative data analysis. The qualitative data examined the meaningfulness and symbolic contents while the quantitative data analysis was to draw meaningful results from a large body of quantitative data. This involved examining, categorizing, tabulating, and recombining the findings for a sound decision making.

Target Population: The target population consisted of SACCO societies operating within Kikuyu Sub County. According to the Sub County Co-operative Officer-Kikuyu, there were Twenty Seven (27) SACCO Societies operating within the Sub County at the time of this research study (Table 1).

Sample Size: Using the American Marketing Association (2012) formula and the table for determining a sample size: at a confidence level of ninety-five percent (95%) and a significant level of five (5%), a population of twenty-seven SACCO societies yielded a population sample size of twenty-five (25) SACCO Societies. This meant in each ward in the Sub County, the study considered one SACCO Society. The data collected was homogenous in nature mainly from a given SACCO society hence

no need of interviewing more than two persons from one particular SACCO society.

Conceptual Model: To process the data, Karl Pearson's correlation Coefficient, the regression of Y on X equation was used to meet the objectives of the study. Use of statistical package for social scientists (SPSS) version 23 was put to place. A Multiple regression analysis was applied. The regression equation was: $Y = \beta_0 +$ $\beta_1 X_1 + \beta_2 X_2 + \epsilon$; Where Y is the dependent variable (Equity), β_0 is the regression constant, β_1 , and β_2 , are the coefficients of independent variables, X_1 is Share Capital, X_2 is Retained earnings, while ϵ is the error term.

Measuring the influence of Equity Capital Structure financing levels on **Financial Performance of SACCO Societies** in Kikuyu Sub County: The researcher Karl applied Pearson's Correlation Coefficient to determine the relationship between Equity Capital Financing Levels and Financial Performance of SACCO Societies in Kikuyu Sub County. The researcher identifies that a perfect correlation has a positive one (+1), while a non-perfect correlation is signified by a negative one (-1).

Data Response: The proportion of the female respondents was higher than that of the male with females accounting for 56% and male respondents at 44% of the total Population. The age distribution is shown in Table 2.

	No. of	10% Size	С.М.С 12 -	Number of
	SACCOs	selection per	Members per	Persons
Wards		ward	SACCO	interviewed
Kikuyu	7	1	12	2
Thogoto	6	1	12	2
Karai	4	1	12	2
Muguga	5	1	12	2
Kinoo	5	1	12	2
Total	27	5	60	10

Table 1: Presentation of the Target Population

	age	
	Freq.	Percent (%)
< 35Years	2	22
36-45Years	4	44
46-55Years	3	33
Total	9	100.0

Table 2: Distribution of respondents by

Source: Research data (2018)

These results show that a majority of the respondents were aged between 36-45 years old and accounted for 44% of the sample, followed by those aged between 46-55 years at 33%. Ages less than 35 accounted for 32%.

Findings

The study started by investigating the most preferred sources of raising capital for SACCOs in Kikuyu Sub County for the period 2013-2016. As shown below, Share Capital, Members' deposits and Retained Earnings were rated most popular sources of capital financing for the aforementioned financial institutions as indicated by 100% (9/9) of the employees, while Member Deposits 89% (8/9) and Debt as affirmed by 78% (7/9) of the surveyed employees came second (Figure 1). This is an indication that SACCO's preferred a Mixed Capital Raising Strategy. Though so, equity financing was a more common strategy of raising capital over debt or borrowed funds.

Equity Capital financing levels in SACCO Societies: The Equity data was obtained from historical books of accounts and was confirmed through the questionnaires administered by the researcher. The amount of equity raised had taken an upward trend since 2013. This was with an average of KES 51,030,724 having been raised from 2013 through 2016. Equity capital as envisaged in this study comprised of share capital and retained earnings.



Figure 1: Levels of sources of capital



Figure 2: Levels of equity financing.

From Figure 2, equity financing levels (share capital and retained earnings) obtained an incremental trend from year 2013 to 2016. Thus the SACCOs had realized the importance of applying equity capital in enhancing financial performance.

Preference of sources of capital: Further to the observed trend of increase in share capital and retained earnings, the respondents were asked to show the extent to which Equity Capital financing had influenced the financial performance of the SACCOs. The response was graded using a dichotomous (Yes, No). In this case 100% of the respondents did recognize that Equity Capital financing levels played a major role in SACCO's financial performance.

All of the respondents (100%) who confirmed the historical data collected, confirmed that equity capital had an influence on the financial performance of SACCO societies in Kikuyu Sub County. *The ANOVA analysis*: The ANOVA analysis to obtain the relevance of the equity capital in financial performance as shown in Table 3.

This hypothesis was applied. $H_0:\mu_{Debt}=$ $\mu_{Equity while}$ H₁: $\mu_{Debt} \neq \mu_{Equity}$; Where μ_{Debt} was the Average amount of capital raised through Debt while μ_{Equity} was the Average amount of Capital raised through Equity over the period 2013-2016. The results show that, amount of Capital raised through Debt was higher than that raised through Equity. At a confidence interval of 95% with а significance level of 5%, the null hypothesis was significant since it was less than 5%, which is 0.002 (0.2%). Due to costs related to the debt applied, SACCO managers' preferred the use of equity capital financing (share capital and retained earnings) compared to debt capital financings.

Table 3: The ANOVA analysis

F-Test Two-Sample for variances					
		T 1			
	Debt	Equity			
Mean	KES 268,574,115	KES 51,030,724			
Variance	1.4857E+15	3.48288E+12			
Observations	3	3			
df	2	2			
\mathbf{F}	426.5707023				
P(F<=f) one-tail	0.002338794				
F Critical one-tail	19				

Summary of findings: The finding show a relationship between equity financing (Share capital and retained earnings) on financial performance of SACCO Societies in Kikuyu Sub County for the period 2013-2016. The study revealed that Equity Capital financing had a significant relationship to Surplus Margins (a measure used for financial performance). This study also notes that in

the absentia of the external source of funds, the internal equity sources are preferred.

Conclusion

On the first objective which sought to establish the relationship between Share Capital financing on financial performance of SACCOs in Kikuyu Sub County, the study concludes that share capital had a significant influence on financial

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performance and retained earnings exhibit the same results on financial performance of SACCO Societies in Kikuyu Sub County. Hence share capital and retained earnings are good predictors of financial performance in SACCO societies. On the other hand, a weak insignificant negative relationship exists between Equity financing levels and surplus margins over SACCO's in Kikuyu Sub County, meaning, share capital and retained earnings are not good predictors of surplus as far as SACCO financial performance is concerned.

Recommendation

Where internal sourcing is recommended, share capital and retained earnings will be preferred compared to external funding. Thus, equity financing in SACCO Societies in Kikuyu Sub County, has a significant influence on financial performance. However, this equity influenced not the surplus in SACCO operations.

This study dealt with analysis of equity capital financing (share capital and retained earnings), a further research study can be done on influence of debt capital on financial performance of SACCOs. This research study was conducted in Kikuyu Sub County, meaning more other Sub Counties can be considered for an equivalent research.

References

- American Marketing Association (2012). Sample size Calculator, Demand Metrics Community, Chicago, U.S.A
- Chandra, (2011). Fundamentals of Financial Management, 15th Ed., New Delhi, Tata McGraw Hill education Private Limited.
- Fischer E, Heinkel R, and Zechner J, (1989). *Dynamic capital structure choice:* Theory and tests
- Ghazouani T. (2013). The capital structure through the trade-off theory. *International Journal of Economics and Financial Issues Vol. 3, No. 3, 625-636.*

- Karanja JN. (2012). The relationship between size and cost efficiency of SACCO with front office service authority in Kenya, University of Nairobi, Kenya
- Kuang HH. and Ching-YH. (2009). An Empirical Study on Capital Structure and financing decisions. Taiwan, National Taiwan University
- Malinda M. (2013). Kiambu Agriculture, Livestock and Fisheries 2013-2017, Strategic plan, Government Printers, Nairobi, Kenya
- Mills C. and Davies W. (2013). International blue print for cooperatives decade. University of Oxford
- Myers SC. (1984). Determinants of capital borrowing. *Journal of Finance Economics*, 5, 5147-5175.
- Oginda SR (2013), Effect of Capital Structure on Financial Performance of Firms Listed At the Nairobi Securities Exchange.
- Pandey, IM. (2011). *Financial Management*, 10th ed., New Delhi Vikas Publishing House PVT Ltd
- Sub-County Co-operative Office (2013), Annual Co-operatives Report, Kiambu Stationeries Printers, Kiambu
- Wakida RN. (2011). Capital Structure and Financial Performance in Medium Sized Enterprises. Kampala, Makerere University Publishers Ltd.
- Zerfeshewa, B. (2010). Determinants of Saving and Credit Cooperatives (SACCO's) financial Performance in Gondar town, Ethiopia (Unpublished doctoral dissertation). Mekelle Univ., Ethiopia.
- Zeuli, KA, and Cropp R. (2004). Cooperatives: Principles and practices in the 21st century. Madison: University of Wisconsin Extension. Available on-line at <u>http://learningstore.uwex.edu/assets</u> /pdfs/A1457.PDF.