# Influence of Equity Capital and Retained Earnings on Financial Performance of Deposit Taking Saccos in Nairobi County, Kenya

Kimani Moses Mathu <sup>1</sup>, Dr. Joshua Matanda<sup>2</sup>, Dr. CPA Hesbon N. Otinga<sup>3</sup>

(MBA Candidate, Jomo Kenyatta University of Agriculture and Technology, Kenya)

<sup>2,3</sup>(Lecturer, Jomo Kenyatta University of Agriculture and Technology, Kenya)

#### Abstract:

This study thus sought to assess the influence of financial structure on financial performance of Deposit Taking Saccos in Nairobi County, Kenya. This study was guided by the following specific objectives: to assess the influence of equity capital and retained earnings on financial performance of Deposit Taking Saccos in Nairobi County, Kenya. The study adopted descriptive research design and targeted 11 tier one deposit taking SACCOs in Nairobi. Nairobi County was selected because it hosts the largest number of SACCOs. Secondary data was collected using secondary data collection sheet. Descriptive and inferential statistics were analysed using STATA 15. Descriptive statistics entailed central tendency (means) and dispersion (standard deviation). Inferential statistics such as regression and correlation analyses were also used to determine both the nature and the strength of the relationship between the dependent and independent variables. Analyzed data was presented using tables and graphs. The findings revealed that equity capital and retained earnings have significant positive effect on financial performance of deposit taking Saccos in Nairobi County, Kenya. The study concluded that financial structure influence financial performance of deposit taking Saccos in Nairobi County, Kenya. The study recommended that it would be prudent to recommend that deposit taking Saccos adopt the use of equity capital and retained as a source of finance in most of their operations as compared to other sources of funds so as to maintain the positive relationship between financial structure and financial performance.

Key Word: Equity Capital, Retained Earnings, Financial Performance, Financial Structure, Saccos

Date of Submission: 07-05-2022 Date of Acceptance: 22-05-2022

## I. Introduction

SACCO's have been recognized worldwide as important avenues of economic growth (ICA Report, 2018). SACCOs play a significant role in the provision of financial services to the poor (target groups). They provide savings and credit and investment opportunities to individuals, institutions and group members. Sacco's perform an active financial intermediation function, particularly mediating from urban and semi-urban to rural areas, and between net savers and net borrowers while ensuring that loan resources remain in the communities from which the savings were mobilized (Gathurithu, 2017). In Kenya, most SACCO customers lack sufficient financial statement information to support their loan application and this hinder them from accessing loan. However, financing option is a concept that financial institutions need to consider as an alternative form of financing to their customers (Owino & Otieno, 2017). Mwanzia and Sakwa (2017) depict that loan based on assets improve the quality of loan portfolio and thus it can be used as a source of financial information to support loan application.

Saccos have developed different business financing solutions targeting the small sector and seeking to ensure access to finance for the poor at different stages and occasions. The common financing solutions offered by Saccos are the Asset Financing (Simple Alliance Kenya Limited, 2015; Hanii, 2018). Asset financing provides some form of capital for organizations to expand their businesses and grow (Manasseh, 2018). Asset finance mostly comprises of an agreed percentage of total asset cost with remaining repayments being done by instalments, which factor in, the capital value and accrued interest rates (Munene, 2017; Mac & Lucey, 2019). The function of the Saccos is centred on the financial intermediation theory of banking (Lewis, 2016). The clients deposit the money in Sacco's accounts and create a pool of money which will be available for lending. The borrowers, on the other hand, get the money through the Sacco in the form of loans (Gorton, 2015). Therefore, the Sacco, in this case, acts as an intermediary between the lender and the borrower. Sacco's, therefore, avoid making loses in the process through strategies such as securing the loan with a collateral that the

Sacco will acquire in case the borrower defaults in payment (Scott, 2018). The concept, therefore, forms the basis for financial structure which has been adopted by almost all the Sacco in Kenya

The choice among financial structure aims at finding the right financial structure that will maximize stockholders wealth. Most financial structure are dictated by necessity which requires in-depth analysis of financial structure, costs attracted and long-term implications. Chauhan and Patel (2013) argue that, firms' financial performance is based on firms' earnings ability and firms return on its net worth. Seidu and Andani (2013) assert that, a firm financial structure may be to choose from alternative sources, which may be internal or external. Internal financing includes use of retained earnings while external financing constitutes borrowing by issuing debt instruments and issue of new shares. The skills to identify financial variables which have the greatest impact on financial performance in an organization can facilitate establishment of criteria for appropriate strategies (Kumar, 2015). In addition, Hall (2013) opines that, for companies to maintain competitiveness and add value to wealth creation should make critical business and financial structure which will lead to long-run perspective. The choice among financial structure aims at finding the right financial structure that will maximize stockholders wealth. Oladele (2013) opines that organizations seek efficiency in performance and create value in terms of improved financial performance and increase satisfaction to their customers and other stakeholders.

In Ghana, Mason and Harrison (2018) claim financial structure are associated with high levels of risk, which refers to the uncertainty of the positive returns that may occur even after a number of years or never. Not only this, but short term debt may also embark on a new business strategy which defers from entrepreneur's one; the former can even throw the entrepreneur out of the firm. They argue that short term debt invest only in promising projects. At the very beginning, investors are deeply sceptical, bad mood reasoning with more answers 'no', rather than 'yes'. According to Africa Progressive Panel (APP), poor infrastructure has been a major stumbling block to home grown entrepreneurship and foreign investor alike on the continent (APP, 2018). In this respect, therefore, in order for Africa to become more competitive globally, it must bridge infrastructural gaps. Impliedly, obstacles that should be addressed include lack of access to formal financial services, weakness in Africa's infrastructure, and lack of funds for public investment. It is imperative to post that real estate is part of the infrastructure that Africa as a whole should strive to address.

It is postulated that commercial real estate development in Africa, specifically, SubSaharan Africa is on an upward trajectory (Metcalfe, 2014). On the same vein, it is stated that demand for housing is catalyzed by rapid urbanization, increased wealthy population particularly middle-class, re-location of business ventures, and also travel to Africa for both business and tourism. The identified factors have resulted in increased demand for modern offices, hotels, and retail malls among other real estate facilities. Metcalfe (2014) further argues that real estate development is not uniform across the continent. Ghana, Nigeria and Kenya are stated to be the most active jurisdictions in real estate development. Development in these countries is largely centred on urban areas with Accra, Lagos, and Nairobi respectively leading in construction of modern malls.

In Kenya, the lack of adequate access to credit is the leading factor stifling the growth of enterprises (Mwambili, 2018). According to HF Group, the assets funded in Asset Finance include motor vehicles, school buses, construction equipment, industrial equipment etc. with a minimum finance amount of Kes 300,000. The rates for business financing in Kenya are Commitment/appraisal fees - 1.0% for new units and 2.0% for used units plus excise duty. This is charged as a percentage of the financed amount. Rate of interest in business asset financing is 4.0% above the central bank rate (CBR). Musila (2015) showed an insignificant but positive relationship between Equity capital and financial performance. The study also showed a significant positive relationship between financial performance and growth opportunities and equity ratio. It can be concluded that firms which invest resources towards increasing growth in asset base show greater improvement in financial performance. Equity capital is important especially as far as raising capital for growth, expansions or acquisitions is concerned. In a recent study on the financial structure on SMEs in Kenya, Gikomo (2020) noted that there was a positive and significant relationship between growth of SMEs and short term debt.

Saxton (2015) documented that financial markets have been revolutionized over the past two decades by Kenyan real estate developers due to existence of mortgage brokers in the county, increase in risk based pricing of mortgage properties and growth of secondary mortgage market. The financial markets in Kenya experience increase in mortgage lending thus development of new emerging products at affordable rates. Mortgage boom and bust in the financial markets have been due to mortgage delinquencies where by potential homeowners took mortgage loans without any capacity to finance.

# Statement of the Problem

SACCOs play an integral role in the economic development as part of the financial systems. In Kenya 63% of the population benefit either directly or indirectly from the activities of SACCOs (Republic of Kenya 2017). The Kenyan government has embraced the SACCOs model that is more inclusive to improve on security and level of financial decision as the economy leads to cashless transaction model. Inspite of this, the level of

non-performing loans among SACCOs in Kenya seems to be taking an upward trajectory. Now in 2018, 6.62% in 2019 and 8.39% in 2020. The increase in the level of non-performing loans impacts negatively on financial performance of the firm. This is evidenced by the continuous decline in return of assets for the years under review, the return on asset for the period under study was 2.45% in 2016,2.69% in 2017,2.40% in 2018,2.60% in 2019 and 2.65% in 2020. This provides a very worrying trend as evidenced by collapse of SACCOs in recent times. If this trend of financial performance remains mis-checked then more SACCOs will continue closing shop and the realization of vision 2030 and the cashless economy will remain a pipe dream. On the same note the extent to which financial structure has impacted on financial performance. It has elicited mixed findings in related studies.

# Objectives of the Study

- i) To assess the influence of equity capital on financial performance of Deposit Taking Saccos in Nairobi County, Kenya
- ii) To find out the influence of retained earnings on financial performance of Deposit Taking Saccos in Nairobi County, Kenya.

# Research Questions

- i. How does Equity capital influence on financial performance of Deposit Taking Saccos in Nairobi County, Kenya?
- ii. How does retained earnings influence on financial performance of Deposit Taking Saccos in Nairobi County, Kenya?

### **II.** Literature Review

# Theoretical Framework

The study was guided by the following theories; market timing theory and Residual Theory of Dividend

#### Market Timing Theory

The market timing theory was postulated by Baker and Wurgler (2002). The theory of market timing states that the organisations capital structure is the cummulative results of the past financing decisions that were based on different market conditions, also referred to as timing of equity market (Baker & Wurgler, 2002). Equity market timing concept holds it that a firm issues ordinary shares when their market value is high and repurchases them when their market value has declined (Baker & Wurgler, 2002). Timing the debt market on the other hand refers to a situation where firms issue more debt capital if the prevailing interest rates are low and as insists goes to, the firm progressively reduces long term debt (Zavertiaeva & Nechaeva, 2017). This implies debt market timing depends on rates of interest charged and not the mispricing of equity shares.

The market timing theory being comparatively newer when compared to pecking order and trade-off theories, has made the timing of markets to be the core aspect that informs firms financing decisions (Mabrouk & Boubaker, 2020). According to Mabrouk and Boubaker, (2020), the market timing model does not appear to contradict the trade of theory as bot h models predicts that a firm issues more equity finance when the market value of shares is high. Baker and Wurgler (2002) argue that managers can minimize the cost of capital via market timing suggesting market rates have an influence on pecking order. However, in contrast to the trade-off and pecking order theories, equity timing issuance has a short term impact on capital structure (Hovakimian, 2006). In the market timing theory, firms issue debt or equity according to the best time condition in order to raise more finance but at a lower cost of capital in a bid to increase the value of the firm (Baker & Wurgler, 2002). The very few studies that observe market timing in these firms fail to concur if equity market timing can explain their behaviour. It is in this context therefore that this study sought to establish the effects of equity capital on the financial performance of SACCOs.

## Residual Theory of Dividend

The theory was by Lintner and Gordon (1956). The essence of the residual theory of retained earnings is that the firm will only pay dividends from residual earnings, that is, from earnings left over after all suitable (positive NPV) investment opportunities have been financed. Retained earnings are the most important source for financing for most companies. A residual approach to the retained earnings, as the first claim on retained earnings will be the financing of the investment projects. With the residual retained earnings, the primary focus of the firm's management is indeed on investment, not dividends. Retained earnings becomes irrelevant, it is treated as a passive rather than an active, decision variables.

The view of management in this case is that the value of firm and the wealth of its shareholders will be maximized by investing the earnings in the appropriate investment projects, rather than paying them out as dividends to shareholders. Thus managers will actively seek out, and invest the firm's earnings in, all acceptable (in terms of risk and return) investment projects, which are expected to increase the value of the firm. Dividends

will only be paid when retained earnings exceed the funds required to finance the suitable investment projects. Conversely when the total investment funds required exceed retained earnings, no dividend will be paid. The motives for a residual policy, or high retentions, retained earnings commonly include: A high retention policy reduces the need to raise fresh capital, (debt or equity), thus saving on associated issues and floatation costs. A fresh equity issue may dilute existing ownership control. This may be avoided, if retentions are consistently high. A high retention policy may enable a company to finance a more rapid and higher rate of growth. When the effective rate of tax on dividend income is higher than the tax on capital gains, some shareholders, because of their personal tax positions, may prefer a high retention/low payout policy. It is in this context therefore that this study sought to establish the effects of returned earnings on the financial performance of SACCOs.

# Conceptual Review

Conceptual framework is fundamental as it explains and incorporates methodological, philosophical, and pragmatic features of research thesis (Sykes & Piper, 2015). This is a diagram illustrating the linear relationship between independent variables (Retained earnings and equity capital) and the dependent variable (profitability of DTS).

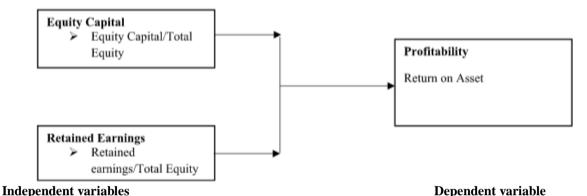


Figure 1.0: Conceptual Framework

Equity capital is associated with the concept of par value, which has more than 200 years of history and was created to counteract fraudulent practices that became popular in the nineteenth century after shareholders were released from their obligations to the company (Cook, 2015). The concept of par value has been criticized since its birth, as it is said not to be able to protect creditors effectively against the defrauding behaviour of shareholders. Equity capital can be considered the first legal capital because it initiated the principle of maintaining capital created to protect the company's creditors from the extra risk related to the limited liability of shareholders for the company's liabilities (Armour, 2020). Legal capital fulfils a similar role for creditors as a financial cushion which acts in the same way as financial adequacy provisions for financial institutions (Bachner, 2009; Handschin, 2012). The influence of equity capital on a company's achievements may result from two important features. First, it is the capital that companies must hold to secure creditors' claims. A company cannot redistribute its equity capital, and new shares may not be sold for less than par value. Its inviolable nature may therefore contribute to increasing the inflexibility of capital and thus negatively affect the company's performance. On the other hand, equity capital can be a measure of shareholder involvement and thus be a signalling tool (Mulbert & Birke, 2012) for a company wishing to improve its image in the capital market.

A company's retained earnings is a long term financial strategy with regards to deciding how much earnings to pay out as against retaining them for investment in the company. It leads to division of profits between dividend payment to shareholders and reinvestment in the company. There are no transaction and bankruptcy costs associated with retained profits (Altman, 1993). Thus, retained earnings constitute a major source of finance for companies. Investors prefer capital gains over dividends, because capital gain taxes can be deferred into the future and are taxed at a minimum rate while taxes on dividends must be paid as they are received and are taxed at a relatively higher rate. Whenever there is an increase in personal income tax of the shareholders, companies tend to retain and reinvest more of their earnings. Payment of earnings as dividend is associated with agency cost and an opportunity for existing shareholders is lost to reinvest their earnings for growth of the company. William Droms (1990) says that investors benefit more from reinvested earnings than dividends in the long-run. As ensured by Oscar Harkavy (1953), Plough back of corporate profits gives rise to appreciation in the value of corporate securities.

The financial performance has critical implications for economic growth of countries. Good financial performance rewards the shareholders for their investment. On the other hand, poor financial performance can lead to institutional failure and crisis which have negative repercussions on the economic growth (Flamini et al., 2019). The performance of firms can be affected by internal and external factors. While internal factors are individual characteristics which affect the financial institution's performance, macroeconomic factors are external to the institutions (Al-Tamimi, 2019). Hansen and Mowen (2015) assert that financial performance is an essential measure to management as it is an outcome which has been achieved by an individual or a group of individuals in an organization related to its authority and responsibility, not against the law, and conforming to the morale and ethic. Such performance is the function of the ability of an organization to gain and manage the economic resources in several different ways to develop competitive advantage. Naser and Mokhtar (2018) contend that high financial performance reflects management effectiveness and efficiency in making use of company's resources, and is often expressed in terms of growth of sales, turnover, employment, or stock prices.

## **Empirical Review**

Dudycz (2021) examined the impact of equity capital on companies' performance as well as the effect of accounting information on companies' market performance and the impact of pre-IPO information on the predictive power of companies' performance after an initial public offering (IPO). It shows that a large percentage of equity capital in equity reduces capital flexibility but can also be a signal to improve companies' market performance. It also shows that after an IPO, the market's information efficiency diminishes, which means, among other things, that pre-IPO accounting information has a negligible impact on the companies' market performance after the IPO. Musila (2015) sought to establish the relationship between equity capital and financial performance for firms in the energy and petroleum sector listed at the Nairobi Securities Exchange. The results of the study showed an insignificant but positive relationship between equity capital and financial performance. The study also showed a significant positive relationship between financial performance and growth opportunities and equity ratio. It can be concluded that firms which invest resources towards increasing growth in asset base show greater improvement in financial performance. Equity capital is important especially as far as raising capital for growth, expansions or acquisitions is concerned.

Kerosi, Mugo and Kalui (2018) investigated the extent to which internally generated equity affected profitability of quoted non-financial firms in Kenya. Findings from the study indicated that profitability, which was proxied by return on capital employed, had significant and positive correlation with equity capital. Achieng, Muturi and Wanjare (2018) examined the effect equity capital had on performance of 40 nonfinancial firms that were listed at the NSE between 2009 and 2015. The study findings indicated that total equity positively and significantly informed performance. Abdulazeez and Saif (2019) investigated the effect financial structure had on the shareholders 'value of 70 banking institutions that were listed in the stock exchanges of six gulf countries over the period 2000 to 2017. Findings of the study indicated a significant positive association between financial structure and shareholders value thus reflecting the state of financial soundness of Gulf countries banks. Kariuki, Jagongo and Muniu (2019) examined the influence of Equity capital on shareholders 'value creation of non-financial firms that were listed at the NSE in the period 2008 to 2014. The study used the ordinary least square regression to estimate the model and revealed that there existed statistically significant and positive relationship between Equity capital and shareholders' value creation.

Mbuvi and Gekara (2015) investigated the influence of retained earnings on shareholder value creation of listed companies in Kenya. The study adopted descriptive research design and had a population of 59 firms that were listed at the Nairobi Securities Exchange at the time. Findings of the study indicated a positive and significant relationship between retained earnings and value creation of shareholders of firms listed in the Nairobi Securities Exchange in Kenya. Boujjat and Rachid (2016) investigated the relationship that existed between retained earnings and firm performance of Morocco's listed firms. Finding of the study indicated a positive and significant relationship between retained earnings and firm performance. In Ghana, Ofori-Sasu, Abor and Osei (2017) examined the effect of retained earnings on financial performance on firms listed at the country's securities market. Results from the study indicated a positive and significant relationship between retained earnings and shareholders value.

Muhammad and Isah (2017) sought to investigate the determinants of shareholders 'value creation of listed building materials firms in Nigeria over a seven year period ranging from 2007 to 2014. The results from the study revealed the dividend had a positive and a statistically significant association with shareholders value creation. Similarly, long term debt was also found to have a statistically significant and positive relationship with shareholders value creation. Firm size was however found not to have a statistically significant association with shareholders value of listed building materials companies in Nigeria. Kariuki et al. (2019) considered all the 40 non-financial firms quoted at the Nairobi Securities Exchange.. Results from the study indicated a positive and statistically significant relationship between retained earnings and shareholder value creation.

#### III. Material And Methods

Descriptive research design was adopted. This research design is thus most appropriate since the objective of the study in establishing the influence of financial structure on financial performance of Deposit Taking Saccos in Nairobi County, Kenya. The target population of this study was all registered Saccos in Nairobi County; this formed the unit of analysis. According to SASRA (2021), Nairobi County has 11 tier one deposit taking Saccos. A census of all the 11 Tier one Deposit Taking SACCOs in Nairobi County was studied. Secondary data was collected from the audited financial statement submitted to SASRA by the DT Saccos after they have been registered by the commissioner of Cooperatives. Data was collected for the five year period ending 31st Dec 2020. The data which was of interest to the researcher included short Equity capital, return on Asset and retained earnings for 5-year period from 2016-2020. Data was analyzed by regression panel data analysis tool. Data analysis included both descriptive and inferential statistics where model specification estimation and rationale of variables were done. Descriptive statistics included measure of central tendency; mean and measure of variability; standard deviation, maximum and minimum. These descriptive statistics was used to develop indices and measures to summarize the collected data (Kothari, 2007). The study used inferential statistics which are regression analysis and correlation analysis to test null hypotheses. These statistical tests were at 5% significance level. Secondary data was transformed into natural logarithm. The level of significance of 5% was used as a benchmark. If the P value is less than 0.05 at 5% significance level, reject the null hypotheses and accept the alternative and vice versa. Standard multiple regression model was used to measure the influence of financial structure on financial performance. This included fixed and random effects regression model as well as multiple linear regression models. Fixed and random effects regression model was used for individual financial structure measures while multiple linear regressions for all financial structure measure as a block. All analyses were done using STATA 15.

## IV. Result and Discussion

#### **Descriptive Analysis**

The descriptive statistics entailed Minimum, Maximum, Mean and standard deviation between 2016 and 2020. The results also showed overall descriptive statistics as obtained from panel data of said periods.

**Table 1: Descriptive Statistics** 

- 11/10-1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1				
Stats	Financial Performance	Retained Earnings	Equity capital	
N	55	55	55	
Min	0.009332	0.000176	0.10952	
Max	0.10152	0.587278	0.696871	
Mean	0.038092	0.238465	0.403714	
Std Dev.	0.023288	0.176543	0.197676	
Skewness	0.675022	0.176308	0.051735	
Kurtosis	2.48304	1.750556	1.58277	

This study considered 11 tier one deposit taking SACCOs in Nairobi County in whose variables were studied over 5 years -2016- 2020 making a total of50 observations. Retained earnings ranged from 0.00017 to 0.587 with a mean of 0.238 and standard deviation of 0.1765. On the other, equity capital ranged from 0.1095 to 0.697 with a mean of 0.403 and a standard deviation of 0.1976. Observing overall statistics as obtained from panel data from 2016 to 2020, financial (proxied as ROA) ranged from 0.009 to 0.10152 with a mean of 0.0381. The distribution had a standard deviation of 0.0232. The trend analysis for financial performance as measured using return on Assets (ROA) within five years is as shown in Figure 4.1 in which there was high variability in 2016.

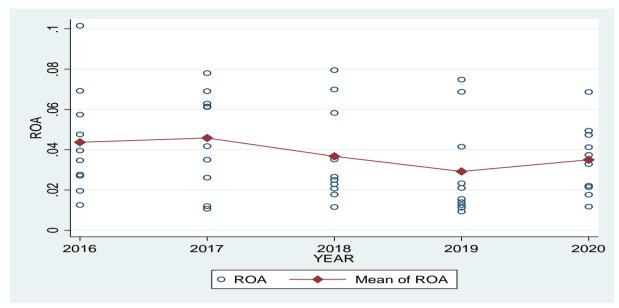


Figure 1: Trend Analysis for Return on Assets

#### **Inferential Analysis**

Inferential analysis entailed correlation and regression analysis. The purpose also conducted stationarity test using Philips-Perron and choice of model using Hausman test.

#### Unit Root Test

The study used Philips-Perron to test for the presence of unit roots in panels that combine data from the dimension of the time series with that of the cross-section dimension, so that fewer time observations are required for power to be available for the test. The results are indicated in Table 2.

**Table 2: Unit Root Test** 

Variable Philips-Perron unit-root Test		
Equity capital	11.9586 **	_
	0.0000	
Retained earnings	7.7950**	
	0.0000	
Financial Performance	5.7011**	
	0.0000	

<sup>\*</sup> sig at 5% level, \*\* sig at 1% level

A p-value above 0.05 indicates the presence of unit roots, whereas a p-value under 0.05 indicates that the unit roots were not present for Philips-Perron tests. The results indicated that there was absence of unit root for the study variables. This showed that all variables are stationery, there was no problem of unit root, and the results can proceed for further inferential statistics.

## Hausman Test

The study determined whether to run a fixed effects model or a random effects model when conducting panel data analysis. The null hypothesis is that the preferred model is random effects; The alternate hypothesis is that the model is fixed effects. The results are indicated in Table 3.

Table 3. Hausman Test

Table 3. Hausilian Test					
	(b) Fixed	(B) Random	(b-B) Difference	sqrt(diag(V_b- V B))S.E.	
Equity capital	0.117824	-0.02664	0.144469	0.038105	
Retained Farning	0.4914658	0.077226	0.41424	0.141421	

b = consistent under Ho and Ha; obtained from xtreg

B = inconsistent under Ha, efficient under Ho; obtained from xtreg

Test: Ho: difference in coefficients not systematic  $chi2(4) = (b-B)[(V_b-V_B)^{-1}](b-B)$ 

= 174.81

Prob>chi2 = 0.0000

Results of Table 3 showed a prob>chi2 value of 0.0000 that is less than the critical P value at a significance level of 0.05, which implies the non-random distribution of cross-sectional population units. Thereby rejecting the null hypothesis that the model of a random effect is the best. The study therefore employed a model of fixed effect regression.

#### **Correlation Analysis**

To explore the effect of independent variables on financial performance, a correlation analysis was conducted at 95% confidence level. The results of the correlation are summarized in Table 4.

**Table 4: Pearson Correlation Analysis** 

		Equity capital	Retained Earnings
Equity capital	Pearson Correlation	1	
	Sig. (2-tailed)		
	N	55	
Retained Earnings	Pearson Correlation	0.253	1
C	Sig. (2-tailed)	0.0763	
	N	55	55
ROA	Pearson Correlation	0.4278	0.6023
	Sig. (2-tailed)	0.0019**	0.0000**
	N	55	55

<sup>\*\*.</sup> Correlation is significant at the 0.01 level (2-tailed).

Table 4.0 presents the findings of Pearson correlation between financial structure and financial performance (ROA). As indicated in Table 4.0, there is significant positive relationship between equity capital and financial performance as indicated by .4278, p=0.0019. This implies that increase in equity capital would results to increase in financial performance of DTS in Nairobi County. Similarly, a correlation coefficient of 0.6023\*\* implied that there is significant positive relationship between retained earnings and financial performance. Therefore, increase in retained earnings would results to increase in financial performance of DTS in Nairobi. The correlation analysis outcomes are consistent with the finding of a research study by Muthui et al. (2017) who located that retained revenues had positive and significant impact on the monetary efficiency of commercial banks in Kenya.

## **Linear Regression Analysis**

Linear regression was conducted to establish changes in financial performance that is accounted for equity capital and retained earnings. This was achieved using R square and Regression coefficients *Influence of equity capital on financial performance (ROA)* 

Fixed effect model was estimated between equity capital and measure of financial performance (Return on Asset). Panel regression was conducted to determine whether there was a significant effect of equity capital on financial performance. Table 5 presents the regression model on equity capital with return on Asset as a measure of financial performance.

Table 5: Regression Fixed Effect of Equity Capital on financial performance (ROA)

Fixed-effects, using 55 observations Included 11 cross-sectional units

Time-series length = 5

Dependent variable: Financial Performance

	Coef.	Std. Err.	T	P>t
Equity capital	0.181239	0.087859	2.06	0.046
Constant	-3.78865	0.2534	-14.95	0.000
Within = 0.0984			Sigma_U 1.7792823	
Between $= 0.7271$			Sigma_E 1.518058	
Overall = 0.1830			Rho .57872861	
	Test of F(1,	on named regressors 43) = 4.26		
	Prob	> F = 0.045	58	

The analysis shows that the panels were strongly balanced for this bivariate analysis as shown by the number of observations per group. There were a total of 50 observations used in this analysis considering 10 groups of entities implying strongly balance panels. The result obtained from fixed effect model indicated that

<sup>\*.</sup> Correlation is significant at the 0.05 level (2-tailed).

equity capital accounted for 18.30% (Overall R square=0.1830) of the variation in financial performance of DTS in Nairobi County. The F-statistic to the model shows is F(1,43)=4.26 which is greater than 0 implying that the estimated parameters in the model are at least not equal to zero. This implies that equity capital is significant predicator financial performance of DTS in Nairobi County at p=0.0458 The estimated coefficient of equity capital is significantly not equal to zero ( $\beta$ =0.181239, t=2.06, p-value= 0.046). The P-value is less than 0.05 which implies that the estimated coefficient is significant at 5% significance level. The estimated coefficient of equity capital here implies that a unit increase in equity capital would initiate the levels of financial performance (ROA) to increase by 0.181239 units. The regression model is as shown below

## Profitability = -3.78865+0.181239Equity Capital

Panel data Pearson correlation results indicated a moderate significant positive relationship between equity capital and financial performance of DTS in Nairobi County. Fixed effect linear regression analysis indicated that equity capital significantly accounts for variance in financial performance of DTS in Nairobi County. The results are in agreement with Dudycz (2021) examined the impact of equity capital on companies' performance as well as the effect of accounting information on companies' market performance. Similarly, Kerosi, Mugo and Kalui (2018) investigated the extent to which internally generated equity affected profitability of quoted non-financial firms in Kenya. Findings from the study indicated that profitability, which was proxied by return on capital employed, had significant and positive correlation with equity capital. The findings of this study are supported by a study carried out by Bulle and Omagwa (2017) which indicated that capital structure had a significant impact on financial performance of firms listed under manufacturing and Allied sector at NSE. However, Musila (2015) sought to establish the relationship between equity capital and financial performance for firms in the energy and petroleum sector listed at the Nairobi Securities Exchange. The study showed an insignificant but positive relationship between equity capital and financial performance.

## Influence of Retained earnings on financial performance

Fixed effect model was estimated between retained earnings and measure of financial performance (Return on Asset). Panel regression was conducted to determine whether there was a significant effect of equity capital on financial performance. Table 6.0 presents the regression model on retained earnings with return on Asset as a measure of financial performance.

**Table 6: Regression Fixed Effect of Retained earnings on financial performance** 

Fixed-effects, using 55 observations Included 11 cross-sectional units Time-series length = 5 Dependent variable: Financial Performance

	Coef.	Std. Err.	T	P>t
Retained Earnings	0.556143	0.155193	3.58	0.000
Constant	-2.81303	0.497785	-5.65	0.000
Within = 0.0059			Sigma_U .76063091	
Between $= 0.7421$			Sigma_E 1.5940269	
Overall = $0.3628$			Rho .18546655	
Test on named regressors -				
F(1,43) = 12.84				
Prob > F = 0.0003				

The result obtained from fixed effect model revealed that retained earnings accounted for 36.28% (Overall R square=0.3628) of the variation in financial performance of DTS in Nairobi County. The ANOVA statistics measure the general significance of the model. The F-statistic to the model is F(1,43)=12.84 which is greater than 0 implying that the estimated parameters in the model are at least not equal to zero. This postulates that retained earnings is a significant predicator of financial performance of DTS in Nairobi County at P=0.000, P<0.05. The estimated coefficient of retained earnings is significantly not equal to zero ( $\beta$ =0.556143, t=3.58, p-value= 0.000). The P-value is less than 0.05 which implies that the estimated coefficient is significant at 5% significance level. The estimated coefficient of retained earnings here implies that a unit increase in retained earnings would trigger the levels of financial performance to increase by 0.556143 units. The p-value of the constant is less than 0.05 which shows a significant constant term. The regression model is as shown below

#### **Profitability = -2.81303+0.556143Retained Earning**

Panel data Pearson correlation results revealed a moderate and significant positive relationship between retained earnings and financial performance of DTS in Nairobi County. Fixed effect linear regression analysis revealed that retained earnings significantly accounts for variation in financial performance of DTS in Nairobi County. The results are in agreement with Mbuvi and Gekara (2015) who investigated the influence of retained earnings

on shareholder value creation of listed companies in Kenya. Findings of the study indicated a positive and significant relationship between retained earnings and value creation of shareholders of firms listed in the Nairobi Securities Exchange in Kenya. Boujjat and Rachid (2016) investigated the relationship that existed between retained earnings and firm performance of Morocco's listed firms. Finding of the study indicated a positive and significant relationship between retained earnings and firm performance. Ofori-Sasu, Abor and Osei (2017) examined the effect of retained earnings on financial performance on firms listed at the country's securities market. Results from the study indicated a positive and significant relationship between retained earnings and shareholders value. Kariuki, Jagongo and Muniu (2019) sought to find out if any relationship existed between retained earnings and shareholders value creation of quoted firms in Kenya. Results from the study indicated a positive and statistically significant relationship between retained earnings and shareholder value creation.

From the findings, short term debt had a regression co-efficient ( $\beta$ 3) of-0.09883, p=0.065 implying that when retained earnings, Long term debt and equity capital are controlled, a unit increase in retained earnings across time and among DTS in Nairobi County in Kenya would result in an insignificant decrease of 0.09883 units in financial performance (ROA). The findings are supported by García-Teruel and Martínez-Solano (2007) who refuteed by saying that short maturity of short-term debt may prove expensive to the firm hence increasing its cost of capital. This results contradicts a study conducted by Tailab (2014) the use of short-term liabilities such as trade payables and accruals can have a positive effect on a firm's profitability since such sources of financing may be less costly to the business than the long-term sources of funds. Further, short term sources of funds may have a positive influence on profitability due to the reduced contractual engagements that are involved (Krishnamurthy & Vissing-Jorgensen, 2013). Short term credit may have a positive influence on profitability.

## V. Conclusion and Recommendation

The study concluded that equity capital has significant positive effect on financial performance of DTS in Nairobi County as indicated by multiple linear regressions. An increase in equity capital would results to significant increase in financial performance of DTS in Nairobi County. Hence, equity capital is a significant predicator of financial performance of DTS in Nairobi County. The study concluded that retained earnings have significant negative effect on financial performance of DTS in Nairobi County. An increase in retained earnings would results to significant increase in financial performance of DTS in Nairobi County. Therefore, retained earnings are a significant influencer of financial performance of DTS in Nairobi County. It is also evident from the findings that equity capital financing seem to be the preferred choice by majority of firms. Firms are therefore at liberty to raise capital through equities since they have marginal negative impact on returns. In addition, the general preference of external equity over retained earnings and debt clearly negates the provision of the pecking order theory implying that it may not be applicable in practice.

The study recommends that it is necessary to retain part of the earnings to finance new investment capable of generating more wealth and having positive contributions to the shareholders. Also, corporate managers should endeavour to make judicious and efficient use of earnings to increase investor returns and that firms should retain when there are investment opportunities with a positive net present value (NPV). This requires that the managers should carry a succinct analysis of the available projects to ensure maximum returns are attained by investing in the most appropriate projects. To the investors, the study recommends that they should monitor and ensure that undistributed profit/earnings are judiciously used to create value in return. Also, they should invest in organizations which use retained earnings to finance investment opportunity and create value. According to the findings of the research, equity capital had a beneficial effect on financial performance of deposit taking Saccos. As a result, higher equity capital in DTS is required in order to improve their financial performance. In order to enhance their financial performance, the study recommended that management of DTS should attract more shareholders into their organizations, hence increasing the amount of shareholders' capital in the organization. To encourage shareholders to contribute more to the financial structure, management should guarantee that they get competitive dividends with minimal smoothing.

#### References

- [1]. Abata, T. & Adeolu W. (2018). Bank Management (8 ed.). Boston, USA: Cengage Learning.
- [2]. Alexander, G. (2016). Business Management. From: http://www.suite101.com/businessmanagement [accessed 26 February 2014].
- [3]. Amissah, (2019).. Dynamics of Growth and Financial performance (ROA) in Banking, *Journal of Money, Credit and Banking* 36, 1069-1090.
- [4]. Baeyens, R. & Manigart, G., (2017). A CAMEL Model Analysis of Private Sector Banks in India. *Journal of Gyan Management*, 2(1): 3-8.
- [5]. Bandyopadhyay, E. J. (2016). Analysis of factors influencing bank asset quality in Tanzania. *International Journal of Economics, Business and Management Research*, 201-213. Retrieved from http://ijebmr.com/uploads/ART\_01\_38.pdf
- [6]. Bardhan, S. & Edelstein, H. (2017). Financial Statement Analysis, 3rd International Edition, McGraw Hill, Singapore.

- [7]. Berger, M.C., & Udell R., (2016). South Africa's new Cooperative Act: a missed opportunity for small farmers and land reform beneficiaries. *Agrekon* 47(2):180-197.
- [8]. Bienert, K. (2016). Facts about the Co-operative movement. Nairobi, Kenya National Federation of Cooperatives.
- [9]. Carhart, G. (2017). The performance of Malaysian Islamic bank during 1984-1997: an exploratory study, *International Journal of Islamic Financial Services*, 1(4): 89-111.
- [10]. Dirnhofer Z. (2016). Determinants of Corporate Performance of Malaysian Companies, Paper presented at the Fourth Asia Pacific Interdisciplinary Research in Accounting Conference, July, Singapore.
- [11]. Donadelli, M. (2015). Uncertainty shocks and policymakers behavior: evidence from the Subprime Crisis Era. *Journal of Economic Studies*, 42(4), 578-607. doi:https://doi.org/10.1108/JES-01-2014-0016
- [12]. Dudycz, T. (2021). Does equity capital mater for company performance?. Economic Research-Ekonomska Istraživanja, 1-25.
- [13]. Dymski, I. G. (2017). The determinants of credit risk in commercial banks in Kenya. Unpublished MBA Project. University of Nairobi.
- [14]. Dymski, K. (2015). Finance & financial markets. Macmillan International Higher Education
- [15]. Engel, M. & Keilbach, S. (2016). Report of the Working Group on Restructuring Weak Public Sector Banks. RBI Publications.
- [16]. Erbas, K. (2015). Impact of the Sacco Societies Regulatory Authority. SASRA) Legislation on Corporate Governance in Co-operatives in Kenya, Public Policy and Administration Research, Vol.3, No.6.
- [17]. Gerson, N. (2017). Factors affecting non-performing loans: A Case Study of Commercial Bank of Africa—CBA (Kenya) (Doctoral dissertation, United States International University-Africa).
- [18]. Gorton, K. M. (2016). Effect of loan portfolio growth on financial performance of commercial banks in Kenya. Imperial Journal of Interdisciplinary Research, 2(11), 102-233
- [19]. Grinblatt, M. (2019). A comparison of financial performance in the banking sector: some evidence from Omani commercial banks, *International Research Journal of Finance and Economic*, 3(6): 112-119.
- [20]. Hakelius, C.U. (2016). Impact of Equity capitalization on Bank Financial performance (ROA) in Nigeria. African Development Review, 3(4): 56-78
- [21]. Hanii, G. (2018). The maze of banking: History, theory, crisis. New York: Oxford University Press.
- [22]. Harrison, P., Ndung'u, S., & Abayo, R. (2021). Effect of Financial Structure on Financial Performance of Listed Commercial Banks in Kenya. *Journal of Finance and Accounting*, 5(3), 60-72.
- [23]. ICA Report, (2018). Annual report -Central Bank of Kenya. Nairobi: Central Bank of Kenya.
- [24]. Kaliser, M. (2017). Microeconomics. New York, NY: Pearson.
- [25]. Keuschnigg, D.W. (2018). Bank runs, deposit insurance and liquidity, Journal of Political Economy, 91: 401-419
- [26]. Kiaritha, H.A. (2019). Factors Influencing Performance of UAE Islamic and National Conventional Banks', Global Journal Business Research, 4(2): 1-7.
- [27]. Kombo, M. & Tromp, R., (2016). *Understanding the Research Process and Methods*: An introduction to Research Methods Nairobi, Acts Press.
- [28]. Kombo, P. & Tromp M., C. (2019)06. Determinants of Banking Financial performance (ROA) in the South Eastern European Region, Bank of Greece Working Paper 06/47.
- [29]. Kothari, P., (2010). Concentration and Other Determinants of Bank Financial performance (ROA) in Europe, North America and Australia, *Journal of Banking and Finance* 13, 65-79.
- [30]. Lewis, M. (2016). Financial intermediaries: An analysis of essential articles. Northhampton, Mass: Edward Elgar Pub.
- [31]. Lipunga, A. (2018). Financial Practice as a Determinant of Growth of Savings and credit Co-Operative Societies, *International Journal of Business and Social Science*, 3. 2): 67-80.
- [32]. Lwali, K. S. (2016). Interest rates and loan portfolio performance in commercial banks: A case study of centenary bank Entebbe Road Branch (Uganda). Technical report, Lahti University of Applied Sciences.
- [33]. Mac, V., & Lucey, G. (2019). Credit crises, precautionary savings, and the liquidity trap. *The Quarterly Journal of Economics*, 132(3), 1427-1467
- [34]. Manasseh, L. (2018). Measuring concentration risk: a partial portfolio approach. Washington, D.C: International Monetary Fund.
- [35]. Mary, V. (2014). Can product returns make you money, MIT Sloan Management Review. Spring, 51(3), 8-11
- [36]. Mugenda, & Mugenda (2018). Research Methods, New York, NY: McGraw-Hill Education.
- [37]. Munene, S. G. (2017). Sources of financing: The development activities of enterprises in Poland. Warsaw: SGH Publishing House. SGH Warsaw School of Economics.
- [38]. Mwanzia, R., & Sakwa, R. M. (2017). Why does fast loan growth predict poor performance for banks? *The Review of Financial Studies*, 31(3), 1014-1063
- [39]. Mwaurah, P. (2017). Taxation of financial intermediation theory and practice for emerging economines. Washington: World Bank and Oxford University Press.
- [40]. Ngechu A. (2018). Research Methods: Qualitative and Quantitative Approaches, Acts Press, Nairobi.
- [41]. Nielsen, V. O. (2019). Managerial Response to Deregulation of the Co-Operative sector. The Case Study of Nairobi. Unpublished Thesis. University of Nairobi.
- [42]. Nyoro, P. K., & Ngugi, A. (2017). Effect of loan portfolio growth on financial performance of commercial banks in Kenya. Imperial Journal of Interdisciplinary Research, 8(2), 2114-2141.
- [43]. Options on Financial Performance of Firms Listed at the Nairobi Securities Exchange, Kenya. *Research Journal of Finance and Accounting*, 9(10), 150-164.
- [44]. Owino, M. & Otieno A. (2017). Asset quality and bank performance: A study of comm. Research Journal of Finance and Accounting, 5(18).
- [45]. Parkin, M. (2018). Asset quality and bank performance: A study of commercial banks in Nigeria. *Research Journal of Finance and Accounting*, 39-44.
- [46]. Pilbeam, R. E. (2018). A relational theory of secured financing. Columbia Law Review, 86(5), 901 977.
- [47]. Rampini, S. M., & Viswanathan, M. M. (2017). Influence of liquidity on loan portfolio performance amongst listed commercial banks in Kenya. *Imperial Journal of Interdisciplinary Research (IJIR)*, 588-601. Retrieved from https://www.onlinejournal.in/IJIRV3I5/090.pdf
- [48]. Roberts, J. (2018). Asset securitization: Theory and practice. Singapore: John Wiley & Sons
- [49]. Saxton, S. (2015). Financial Intermediary Capital. Cambridge, Mass: National Bureau of Economic Research. Roberts, M. (2014). Principles of administrative theory. *Business Process Management Journal*, 4(9),34-51.
- [50]. Scott, M. (2016). Research methods in language acquisition: Principles, Procedures, and Practices. Berlin; Boston: De Gruyter Mouton.

[51]. [52].	Smith, D. A. (2017). <i>Entrepreneurship</i> . New York, NY: McGraw-Hill Education.  Taylor, M. & Yoder, C. (2018). <i>CAMELS and banks performance evaluation: the way forward</i> , Working Paper Series, retrieved from SSRN: http://ssrn.abstract=11 on 13th August 2018.

Kimani Moses Mathu, et. al. "Influence of Equity Capital and Retained Earnings on Financial Performance of Deposit Taking Saccos in Nairobi County, Kenya ." *IOSR Journal of Economics and Finance (IOSR-JEF)*, 13(03), 2022, pp. 27-38.