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Abstract

Decline in performance deter investor from investing in firms. As such, the firms struggle to raise funds for their operations. The purpose of this study was to establish the effect of financial structure on financial growth of financial firms listed at Nairobi Securities Exchange. The study aimed to evaluate the effect of short term debt, long term debt retained earnings and share capital on financial growth as well as how they are moderated by firm size on financial firms. The theories informing the study included Modigliani-Miller theory, Trade-off Theory, Pecking Order Theory and Agency cost theory. This study was guided by the positivism philosophy and a descriptive research design. The target population of the study comprised of 21 financial firms listed at the NSE for a period of 8 years from 2010 to 2017. The findings indicated that a positive and significant relationship between short-term debt and financial growth of the financial firms. Long-term debt had a negative and insignificant relationship with financial growth of the financial firms. Retained earnings had a positive and significant relationship with financial growth of the financial firms. Share capital indicated a positive and significant relationship with financial growth of the financial firms. Firm size was found to be a significantly moderator of the relationship between the financial structure and financial growth of financial firms. The study recommends that policy makers in the financial sector to embrace indicators on short term debts, long term debts, retained earnings, the share capital and firm size on their strategic decision-making. These indicators will further guide in expanding the interpretation of the financial structures in the listed firms at the Nairobi securities exchange and other related firms. Firm size is thus crucial in a finance company due to their market power larger firms are able to charge higher prices and hence earn higher profits.

Keywords: *Short Term Debt, Long Term Debt, Retained Earnings, Share Capital & Financial Growth*

1.1 Introduction

The financial growth of listed firms in Kenya have not been impressive since several of these firms have been making losses due to exposure arising from their financing decisions (Opungu, 2019). Their financing decisions differ from firm to firm and sector to sector. This explains the varying financial growth and performance gaps among the listed firms. The financial structure of these firms is not uniform and firms make financing decisions depending on how they view the various financing models and how they perceive the various capital structure theories (Githire & Muturi, 2018). While others do not take regard of the various financing models and the optimal capital structure mix. Firms faced with such challenges require that their management make informed financing decisions to manage their financial structure in a way that it enhances financial growth and stakeholders' wealth (Muchiri, Muturi & Ngumi, 2016). The financial firms listed at NSE include banking and insurance companies (NSE, 2019). The financial services sector, banking and insurance sectors are highly regulated by Central Bank prudential guidelines and Insurance Act respectively on issues of liquidity, asset and capital holding, and provision for bad debts. The financial firms listed at NSE formed the focus of the study.

Listed firms contribute in many ways to the Kenyan economy. They provide employment in the firms thus reducing unemployment problems. They pay taxes to the government which is utilized to provide the necessary products and services to the citizen of the country and also contribute to the research and development thus increasing innovation (Ongore & Kusa, 2018). Therefore, firms' growth is critical if they are to fulfill their stakeholders interest (Kopyakova, 2017). Financing decisions result to some form of financial structure. Financing choices are major corporate decisions because an optimal capital structure, representing the corporate financing mix, can maximize the market share price and the value of the company (Buvanendra, Sridharan & Thiagarajan, 2017). Modigliani and Miller (1958) demonstrated the irrelevance of capital structure in firm value, although the assumption is valuable only in perfect market conditions, where all investors have free access to market information, there are zero transaction costs and no tax difference between dividends and capital gains.

Firms finance only a part of their assets with equity (ordinary, preference and retained earnings) capital, while the other part is financed by other resources such as long term financial debt or liabilities (like bonds, bank loans and other loans) and other short term liabilities for example trade payables (Gambacorta, Yang & Tsatsaronis, 2020). Firms can choose among many alternative financial structures. For example, short term debt financing, long term debt financing, share capital and retained earnings. A firm can also arrange lease financing, use warrants, issue convertible bonds, sign forward contracts or trade bond swaps. Firms can also issue dozens of distinct securities in countless combinations to maximize overall market value (Dare & Sola, 2019). Financial structure is therefore very critical and fundamental in the business life cycle not only to maximize shareholders wealth but also due to the impact it has on firm growth (Ishaya & Abduljeleel, 2018).

Nairobi Securities Exchange plays an important role in mobilizing domestic savings which bringing about the reallocation of financial resources. It has also facilitated transfer of securities between shareholders by making long-term liquid (NSE, 2019). It also enabled companies to engage local participation in their equity, thereby giving Kenyans a chance to own shares. Companies can also raise extra finance which is essential for expansion and development. Nairobi

Securities Exchange also enhances the inflow of international capital. They can also be useful tools for privatization programs. The financial firms are those companies that are involved in the provision of financial intermediary services (Muiruri, 2014). The financial firms listed at NSE include banking and insurance companies (NSE, 2019). The financial services sector, banking and insurance sectors are highly regulated by Central Bank prudential guidelines and Insurance Act respectively on issues of liquidity, asset and capital holding, and provision for bad debts. The financial firms listed at NSE formed the focus of the study.

1.2 Statement of the Problem

The growth of financial firms listed at Nairobi Securities Exchange was 3.7% in 2017 against 4.2% in 2019 (NSE, 2020). Decline in performance deter investor from investing in such firms (NSE, 2020). For instance, Standard Chartered bank reduced its profits by Sh3.7 billion in 2020 compared to Sh1.8 billion in 2019. In insurance, two-thirds of the listed firms recorded a drop in profits comparing the 2017 to 2018 performance (NSE, 2019). According to Maina and Sakwa (2017), firms list with the Stock exchange to raise more money and gain access to the capital markets. The capital markets offer a ready form of funding for these listed companies, enabling them to embark on growth and expansion plans or to fund their working capital with greater ease. However, some of the financial firms listed at Nairobi Securities Exchange have been experiencing decline in financial growth and thus reporting lower returns to the investors (Muchiri, Muturi & Ngumi, 2020).

Empirical studies present contentious results on the effect of financial structure on firm growth measured as either return on assets or return on equity. Muchiri *et al.*, (2016) did a study to determine the effects of financial structure on performance of listed investment firms in Kenya and the findings revealed that, long term debt and ordinary share capital had a significant positive relationship with ROA and ROE. The study did not explicitly indicate to what extent long term debt and ordinary share capital influences the growth of listed investment firms. Further, the study focused only on investment firms listed at the Nairobi Securities Exchange therefore creating a methodological and contextual gap. Akbarpour (2019) investigated the relationship between financial structure and accounting measurement for evaluating performance (ROA, ROE) for the period 2005-2010 in listed firms in Tehran and the results indicate that there was a significant relationship between financial structure and ROA, but there isn't such a significant relationship between financial structure and ROE.

Majority of the studies conducted; Akbarpour (2019), Muchiri, Muturi and Ngumi (2016), Shubita and Alsawalhah (2017), Habib, Khan and Wazir (2016) and Chen (2014) focused on capital structure while basing their argument on accounting concept. Unlike non-financial structure, short term liabilities do not contribute to capital structure (Opungu, 2016; Muchiri, Muturi & Ngumi, 2016) thereby creating a conceptual gap. There are also inconsistencies of results from previous empirical studies on the effects of long term debt and short term debt of financial performance of financial firms listed (Ferati & Ejupi, 2018; Menike & Prabath, 2014; Muchiri, Muturi & Ngumi, 2016). The study intended to fill this conceptual gap by focusing on the effect of financial structure on financial growth of financial firms listed at Nairobi Securities Exchange.

1.3 Specific Objectives

- i. To establish the effect of short-term debt on financial growth of financial firms listed at Nairobi Securities Exchange.
- ii. To assess the effect of long-term debt on financial growth of financial firms listed at Nairobi Securities Exchange.
- iii. To determine the effect of retained earnings on financial growth of financial firms listed at Nairobi Securities Exchange.
- iv. To examine the effect of share capital on financial growth of financial firms listed at Nairobi Securities Exchange.
- v. To explore the moderating effect of firm size on the relationship between financial structure and financial growth of financial firms listed at Nairobi Securities Exchange.

1.4 Hypothesis Testing

H₀₁: There is no significant effect of short term debt on financial growth of financial firms listed at Nairobi Securities Exchange.

H₀₂: There is no significant effect of long term debt on financial growth of financial firms listed at Nairobi Securities Exchange.

H₀₃: There is no significant effect of retained earnings on financial growth of financial firms listed at Nairobi Securities Exchange.

H₀₄: There is no significant effect of share capital on financial growth of financial firms listed at Nairobi Securities Exchange.

H₀₅: Firm size does not significantly moderate the relationship between financial structure and financial growth of financial firms listed at Nairobi Securities Exchange

2.1 Literature Review

2.2 Theoretical Review

This study is guided by the Modigliani-Miller theory, Trade-off Theory, Pecking Order Theory and Agency cost theory. Each theory is stated, explained and related to the study.

2.2.1 Modigliani and Miller theory

Modigliani and Miller (1958) advanced the capital structure irrelevance theory. The Modigliani-Miller theorem on the irrelevancy of financial structure implicitly assumes that the market possesses full information about the activities of firms and that information asymmetry influences firm growth (Miller, 1988). Two capital irrelevance propositions were advanced by Modigliani and Miller. Proposition I states that the market value of any firm is independent of the amount of debt or equity in capital structure. Proposition II states that the cost of equity is directly related and incremental to the percentage of debt in capital structure. The first proposition was the arbitrage-based irrelevance proposition which indicated that investors would engage in arbitrage to ensure that firm growth would not be affected by its leverage (Cline, 2015). The theory also assumed symmetric information among the various classes of investors in perfect capital markets. Miller and Modigliani (1963) advanced the second capital structure irrelevance proposition that posited that when a firm chooses a given investment policy, the financing structure it will select would not influence its value. This however assumed perfect markets. The theory is relevant to the study as

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Modigliani-Miller theorem Theory asserts that there is perfect information flow among various players in the market. The study examined whether the mix of long term debt and Short term debt that financial firms apply in their financial structure influence their financial performance as well as financial growth.

2.2.2 Trade-off theory

Trade-Off theory postulated by Myers (1984) emphasize a balance between tax saving arising from debt, decrease in agent cost and financial distress and firm growth (Shahar, Shahar, Bahari, Ahmad, Faisal & Rafdi, 2015). Myers (1984) finds that the benefit of tax shield is offset by the firm costs of financial distress and agency cost. In other word, optimal level of leverage is achieved by balancing the benefits from interest payments and costs of issuing debt (Jahanzeb, Bajuri, Karami, & Ahmadimousaabad, 2014). The balance between tax saving arising from debt, decrease in agent cost and financial distress has a significant effect of firm growth. Sheikh and Wang (2010) argue that the Trade Off theory is expected to choose a target financial structure that maximizes the firm growth by minimizing the costs of prevailing market imperfections. The Trade-off theory is also referred to as tax based theories and bankruptcy costs. It assumed each source of money has its own cost and return. These are associates with the firm's earning capacity and its business as well as insolvency risks (Awan & Amin, 2014). Therefore, firm with more tax advantage will issue more debt to finance business operations and the cost of financial distress as well as benefit from tax shield are balanced (Chen, 2011). Trade-off theory is relevant for the study as it explains the fact that corporations are usually financed partly with debt and partly with equity. It states that there is an advantage to financing with debt, the tax benefits of debt and there is a cost of financing with debt, the costs of financial distress including bankruptcy costs of debt and non-bankruptcy costs. The marginal benefit of further increases in debt declines as debt increases, while the marginal cost increases, so that a firm that is optimizing its overall value focused on this trade-off when choosing how much debt and equity to use for financing.

2.2.3 Pecking order theory

Donaldson (1961) postulated this theory but it received its first rigorous theoretical foundation by Myers and Majluf (1984). Myers and Majluf (1984) said that firms have a particular preference order for capital used to finance their business. Pecking order theory predicts that due to the information asymmetry between the firm and outside investors regarding the real value of both current operations and future income stream and prospects, external capital will always be relatively costly compared to internal capital (Olakunle & Oni, 2014). Myers and Majluf (1984) argued that if firms issue no new security but only use its retained earnings to support the investment opportunities, the information asymmetry can be resolved. This implies that issuing equity become more expensive as information asymmetry between insiders and outsiders increases hence leading to undervalued securities. The pecking order theory is applied in this study to establish whether high profitable firms in the financial sector select to have retained earnings as their preferred mode of financing its operations. If this theory applies in the financial firms listed in the NSE, it is expected that financial firms would have lower interest payments since they are expected to use equity (retained earnings) as their major source of financing. The ones that are not highly profitable are expected to use more debt and hence pay more in interest expenses. The scenario in the long run tends to influence firm growth. The study hence sought to answer objective three by anchoring it onto pecking order theory.

2.2.4 Agency theory

Jensen and Meckling (1976) advanced the agency theory which states that a firm has an optimal financial structure that stimulates optimum firm growth. This optimum financial structure is obtained by ensuring that agency costs that arise from the conflicts between the managers and owners of the business are reduced by having a certain proportion of debt in the capital structure (Leland, 1998). This lowering of agency conflicts would lead to reduction in agency costs which would lead to improved firm growth. The use of debt in the firm as observed by Jensen and Meckling can be used to control and monitor managers in the firm to ensure that they follows objectives that are beneficial to the firm (Aliu, 2010). The agency theory is relevant to the study as it plays a crucial role in financing decisions because of the problems that arise between the debt holders and the shareholders. Stock mispricing is significantly and positively related to agency costs. Further, stock options, which mainly designed to resolve the conflicts of interest between agents (managers), and principals (shareholders), amplify the problem and this incident is obvious particularly, when companies are overvalued.

2.3 Empirical review

Forsberg (2018) conducted a study on short-term debt financing during the financial crisis. The study data showed that the financial crisis caused firms to increase the amount of short-term debt they employed from 1.3% of assets in 2006 to 2.2% in 2017. This increase in short-term debt financing was completely reversed by the end of 2018 suggesting that the increase in short-term debt financing was undesired and was reversed as soon as the financial crisis abated. The proximate causes of the spike in short-term debt financing include a reduction in accounts payable financing from suppliers and a decline in long-term debt and equity financing. A significant decrease in asset sales also contributed to the need for more short-term debt financing. A regression analysis indicated that almost all of the increase in short-term debt financing was caused by the financial crisis and not the simultaneous recession. The study focused on the recession in the United States and overseas while the current study was conducted locally.

Teruel and Solane (2018) analyzed the Spanish SMEs Corporate cash holdings and found that firms with a higher amount of short-term debt will hold higher levels of cash, because it might lower the risks of the non-renewal the short-term debt. The specific objectives were to establish the effect short-term debt, long-term capital and tangibility on firm's profitability. The study adopted descriptive survey research design. Teruel and Solane (2018) in their study on debt financing suggest that aggressive liquidity policy combine the higher levels of normally lower cost short-term debt and less long-term capital. Although capital costs are reduced, this increases the risk of a short-term liquidity. They established that total and short-term debt is positively related to firm's profitability, which might be the most important factor in accessing outside financing in countries with weak collateral laws. From their studies they also found out that a negative relation between tangibility and short-term debt and a positive relationship between tangibility and long-term debt exists. The study was conducted in the in Spanish SMEs while the current study was conducted in the listed firms.

Mohammadzadeh (2019) conducted a study in Iran on how capital structure affects the profitability of firms in the pharmaceutical industry. Top 30 Iranian pharmaceutical companies were defined as study samples and their financial data were gathered for the period of 2010-2018. The study

focused on firms that were quoted in the Tehran Stock Exchange (TSE). The study established the effect of short term debt and long term debt on profitability of the pharmaceutical companies. The variables used in this study are divided into three groups. The first is related to the capital structure including: the Debt to Total Asset ratio (TD/TA), short-term Debt to Total Asset ratio (ST/TA), and the long-term Debt to Total Asset ratio (LD/TA). The study revealed that both short term and long term debt had significant negative effects on profitability of the pharmaceutical companies. Moreover, the study determined that pharmaceutical firms in Iran followed the pecking order theory where they preferred financing their activities using in-house generated funds rather than using external funds and also preferred using debt rather than issuing stock. The study was conducted in Iran while the current study was conducted locally.

Opungu (2016) conducted a study to investigate the effect of capital structure on profitability of financial firms listed at Nairobi Stock Exchange (NSE). The study tested the null hypotheses that there is no relationship between short term debt-equity ratio, long term debt-equity ratio and equity on profitability of financial firms listed at NSE. The theoretical basis of the study was on agency theory, static trade off theory, pecking order theory and Modigliani-Miller capital structure irrelevance theorem. Descriptive research design was applied in this research study. The study findings indicate that short term debt equity ratio negatively and significantly affects ROA, ROE and ROCE. Long term debt equity ratio has a negative effect on return on assets and return on equity but has an insignificant effect on ROCE. Equity has a positive and significant relationship with ROE and ROCE but has an insignificant effect on ROA. The study was measured against profitability while the current study was measured against financial growth.

Nsukka and Adeniyi (2017) conducted a study on the effect of capital structure on the performance of Nigerian listed manufacturing firms from 2004-2013. This is to determine the overall impact of capital structure on corporate performance of Nigerian quoted firms by establishing the relationship that exists between the capital structure choices of firms in Nigeria and their return on assets, return on equity, sales growth and earnings per share (as proxies to measure corporate performance). This study utilized correlation design as it attempts to correlate the effect of capital structure on corporate performance of quoted Manufacturing firms in Nigeria using the four widely used proxies (i.e. Return on Equity, Return on Assets, Sales Growth, and Earnings per share) for measuring firm performance. Multiple regression were used as a tool of data analysis and result of the findings revealed that, capital structure has no significant effect on return on equity but has significant effect on return of assets, earnings per share and sales growth of listed manufacturing firms in Nigeria. The study used manufacturing listed companies while the current study covered financial listed firms.

Muchiri, Muturi and Ngumi (2016) conducted a study on relationship between financial structure and financial performance of firms listed at East Africa Securities Exchange (EASE). The specific objectives were the influence of short term debt, long term debt, retained earnings and share capital on financial performance of firms listed at EASE. The study also evaluated the moderating effect of GDP growth rate on the relationship between financial structure and financial performance of firms listed at EASE. The study employed explanatory research design with secondary panel data from the financial statements of 61 firms retrieved from the securities exchanges hand books for the period December 2006-2014. The study found out that in isolation, short term debt, long term debt, retained earnings and external equity had insignificant negative relationship with return on assets but insignificant positive relationship with return on equity. While combined, financial structure had a significant positive and negative relationship with return on equity and return on

assets respectively. On moderation of the relationship between financial structure and financial performance, it was found out that gross domestic product growth rate had a significant moderating effect. However, the current study used only the financial listed firms.

Younus *et al.* (2014) identified the impact between financial structure and financial performance of Sugar companies listed in Karachi Stock Exchange Pakistan (KSE Pakistan). This research includes 33 sugar companies listed in KSE Pakistan from the year of 2006-2011. This study tested these hypotheses; capital structure and financial performance have the negative relationship, there is a significance impact of capital structure on financial performance and that capital structure and financial performance have the positive relationship. Panel data research design was used. Secondary data was utilized from company's financial reports, annual reports and state bank of Pakistan in financial review for the period of six years (2006-2011). The results showed that there was weak positive correlation. The study was conducted in Pakistan while the current study was conducted locally.

Arulvel and Ajanthan (2014) conducted a study on capital structure and financial performance of listed trading companies in Sri Lanka. This study investigated the relationship of capital structure and financial performance of trading companies which are listed in CSE (Colombo Stock Exchange) from 2007 to 2011. The study employed panel design. The results show that debt ratio is negatively correlated with all financial performance measures [Gross Profit (GP); Net Profit (NP); Return on Equity (ROE) and Earnings Per Share (EPS)] similarly debt-equity ratio (D/E) is negatively correlated with all financial performance measures except GP and only (D/E) ratio shows significant relationship with NP. The study was conducted in Sri Lanka while the current study was conducted locally. Ater, Sifunjo, Kisaka, Iraya, Mwangi (2017) did a study on the moderating effect of firm size on the relationship between capital structure and firm value among financial listed firms at the Nairobi Securities Exchange. A target population of 36 financial firms at the NSE was selected. The study used stepwise multiple regression analysis and in testing of hypothesized variables. Findings pointed that firm size has a significant moderating effect and is thus a critical tool that can be used by management when doing capital structures adjustments to ensure efficiency and optimality as firms grow.

Muigai (2016) conducted a study on the effect of capital structure on financial distress of financial companies listed in Nairobi Securities Exchange. The study investigated the moderating effect of firm size and the listing sector on the relationship between capital structure and financial distress of the firms. The study used quantitative research design. The study employed secondary data extracted from audited financial statements and annual reports of individual companies for the ten - year period covering 2004 – 2013. The study was undertaken using quantitative research design. The study established that the firm size and the listing sector have significant moderating effect on the relationship between capital structure and financial distress. The study was measured against financial distress while the current study was measured against financial growth.

2.4 Conceptual Framework

The conceptual framework bring into focus the following variables; the independent variables namely; short term debt, long term debt, retained earnings, share capital and firm size as the moderating variable. The dependent variable is the financial growth of financial firms listed at Nairobi Securities Exchange in Kenya.

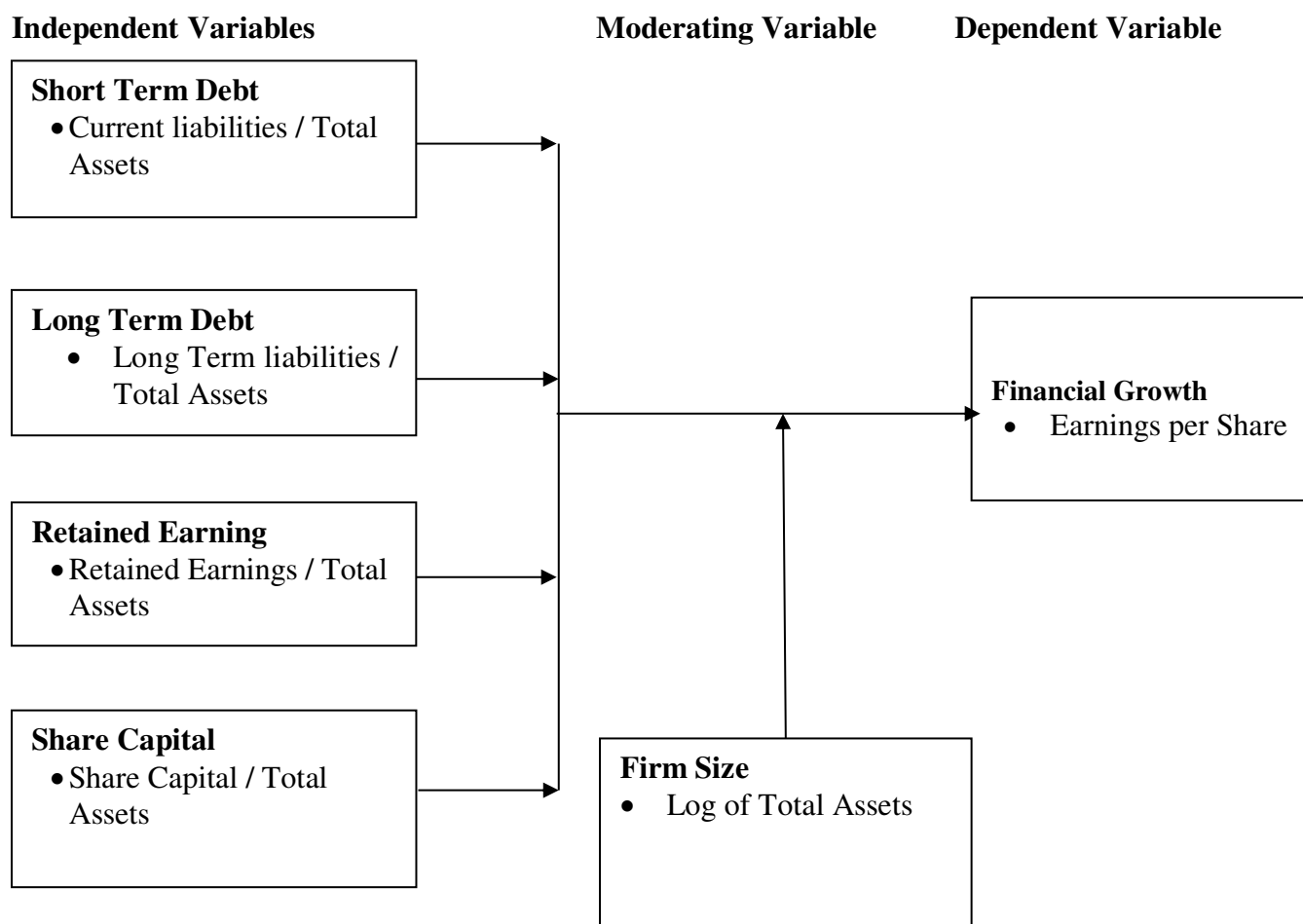


Figure 1: Conceptual Model

3.1 Research Methodology

This study was guided by the positivism philosophy and a descriptive research design. The target population of the study comprised of 21 financial firms listed at the NSE for a period of 8 years from 2010 to 2017. The study adopted a census technique where all financial firms listed at NSE was considered. Data was collected using a secondary data collection template. The study conducted both descriptive statistics analysis and panel data analysis model. The regression model was tested at 95% confidence interval. The moderation effect was calculated by interacting firm size with the independent variables.

4.1 Results and Findings

4.2 Descriptive Statistics

The descriptive statistics shows the mean, standard deviation, minimum and maximum values of the variables financial growth, short term debt, long term debt, retained earnings, share capital and firm size. Financial growth was determined by earnings per share while short term debt was determined from current liabilities to total assets. long term debt was determined from long term liabilities to total finance while retained earnings was determined from retained earnings to total assets. Share capital was determined from share capital to total assets while firm size was determined from the log of total assets for the Banking, Insurance and Investment NSE companies in the period 2010-2017. The results are presented in Table 1.

Table 1: Descriptive Statistics

Variable	Obs	Mean	Std. Dev.	Min	Max
Earnings Per share	168	3.580	1.940	0.241	7.520
Short Term Debt	168	0.190	0.171	0.011	0.582
Long Term Debt	168	0.358	0.230	0.007	0.786
Retained Earnings	168	0.230	0.151	0.010	0.500
Share capital	168	2.285	1.443	0.135	4.981

The descriptive results indicated that earnings per share had a mean of 3.580 and a standard deviation of 1.940. The minimum was 0.241 with a maximum of 7.520. This indicated that there was a large margin in financial growth among the financial firms. Short Term Debt had a mean of 0.190 and a standard deviation of 0.171. The minimum was 0.011 with a maximum of 0.582. The maximum values indicated that there were firms operating more than half capital on short term debts. Long term debt had a mean of 0.358 and a standard deviation of 0.230. The minimum was 0.007 with a maximum of 0.786. This also indicated that on average there was high long term debts in the financial firms. Retained earnings had a mean of 0.230 and a standard deviation of 0.151. The minimum was 0.010 with a maximum of 0.500. This indicated that most of the firms did not retained earnings. Share capital had a mean of 2.285 and a standard deviation of 1.443. The minimum was 0.135 with a maximum of 4.981. This implied that majority of the firms adopted share capital in raising funds for their growth.

4.3 Inferential Statistics

4.3.1 Correlation Analysis

The study conducted correlation analysis for the various variables that are financial growth, short term debt, long term debt, retained earnings, share capital and firm size for the banking, insurance and investment firms at Nairobi Securities Exchange in order to examine the nature of the statistical relationships between each pair of variables. Table 2 shows the correlation matrix of all the variables included in the study.

Table 2: Correlation Matrix

	Financial Growth	Short Term Debt	Long Term Debt	Retained Earnings	Share capital
Financial					
Growth	1.000				
Short Term Debt	0.693	1.000			
Long Term Debt	-0.645	-0.672	1.000		
Retained					
Earnings	0.740	0.635	-0.689	1.000	
Share capital	0.753	0.628	-0.676	0.642	1.000

The results in Table 2 show that short term debt ($r=0.693$, $p=0.000$) had a positive and significance relationship on financial growth for the financial and investments companies in the Nairobi Securities Exchange. Long Term Debt ($r= -0.645$, $p=0.000$) had a negative and a significance relationship with financial growth for the financial and investments companies in the Nairobi Securities Exchange. Retained Earnings ($r= 0.740$, $p= 0.000$) had a positive and significance relationship with financial growth for the financial and investments companies in the Nairobi Securities Exchange. Share capital ($r=0.753$, $p=0.000$) had a positive and a significance relationship with financial growth for the financial and investments companies in the Nairobi Securities Exchange. The positive coefficient implied that an increase in Short Term Debt, Retained Earnings and Share capital lead to an increase on financial growth for the financial and investments companies in the Nairobi Securities Exchange. However, the negative coefficient implied that increase in the Long Term Debt had a negative effect on financial growth for the financial and investments companies in the Nairobi Securities Exchange.

4.3.2 Regression Results

The study sought to carry out regression analysis to establish the statistical significance relationship between financial structures on financial growth of financial firms listed at Nairobi Securities Exchange. The variables were short term debt, long term debt, retained earnings, share capital on financial growth of financial firms listed at Nairobi Securities Exchange. “The regression includes techniques for modeling and analyzing variables, when the focus is on the relationship between a dependent and one or more independent variables. The results are presented in Table 3

Table 3: Regression Analysis

Financial Growth	Coef.	Std. Err.	z	P> z
Short-term Debt	1.7744	0.8500	2.0900	0.0370
Long-term Debt	-0.8946	0.5777	-1.5500	0.1220
Retained Earnings	3.5993	1.0009	3.6000	0.0000
Share capital	0.4608	0.1023	4.5000	0.0000
_cons	1.6733	0.4074	4.1100	0.0000
Wald chi2(4)	303.16			
Prob>chi2	0.000			
R squared Overall	0.6559			

The regression equation was as shown below;

$$Y_{it} = 1.6733 + 1.7744X_{1it} - 0.8946X_{2it} + 3.5993X_{3it} + 0.4608X_{4it}$$

X_{1it} = Short-term Debt of Firm i at time t

X_{2it} = Long-term Debt of Firm i at time t

X_{3it} = Retained Earnings of Firm i at time t

X_{4it} = Share capital of Firm i at time t

The overall R squared of 0.6559 implied that the four variables namely Short-term Debt, Long-term Debt, Retained Earnings and Share capital explained 65.59% on the variations on financial growth of the financial firms listed at Nairobi Securities Exchange. The overall model was significant as indicated by the Prob>chi2 of 0.000 with a Wald chi2 (4) of 303.16. In addition, the constant of 1.6733 showed that when Short-term Debt, Long-term Debt, Retained Earnings Structure and Share capital are held constant, financial growth of the financial firms listed at Nairobi Securities Exchange will remain at 1.6733 units.

The results further portrayed a positive and significant relationship between Short-term Debt and financial growth of the financial firms listed at Nairobi Securities Exchange ($\beta = 1.7744$, $p = 0.037$). There was a negative and insignificant relationship between Long-term Debt and financial growth of the financial firms listed at Nairobi Securities Exchange ($\beta = -0.8946$, $p = 0.1220$). Retained Earnings had a positive and significant relationship with financial growth of the financial firms listed at Nairobi Securities Exchange ($\beta = 3.5993$, $p = 0.000$). Lastly, share capital revealed a positive and significant relationship with financial growth of the financial firms listed at Nairobi Securities Exchange ($\beta = 0.4608$, $p = 0.000$). The findings agree with Teruel and Solane (2018) who

established that total and short-term debt is positively related to firm's profitability, which might be the most important factor in accessing outside financing in countries with weak collateral laws. Pouraghajan, Malekian, Emamgholipour, Lotfollahpour and Bagheri (2017) results indicated a significant relationship between short term debt, long term debt, total debt, and return on assets. Opungu (2016) study established that long term debt equity ratio has a negative effect on return on assets and return on equity but has an insignificant effect on ROCE. The findings concur with Isola and Akanni (2015) who established that firms tends toward internal financing through retained earnings, equity and other short term funds, against long term financing majorly through debts and other long term loans. The findings are in line with Akbarpour (2019) who found that that there was a significant relationship between financial structure and ROA and that financial structure plays an important role in the profitability of enterprises.

4.3.3 Moderation Effect of Firm Size

The fifth was to establish explore the moderating effect of Firm size on the relationship between financial structure and financial growth of financial firms listed at Nairobi Securities Exchange. Each of the independent variables was moderated by the variable firm size. Results are presented in Table 4.

Table 4: Moderation Results

Financial growth	Coef.	Std. Err.	z	P> z
Short-term Debt*M	0.337	0.117	2.880	0.004
Long-term Debt *M	-0.477	0.107	-4.440	0.000
Retained Earnings *M	0.252	0.112	2.250	0.024
Share capital*M	0.104	0.111	2.940	0.048
_cons	0.980	0.199	4.930	0.000
Wald chi2(4)	258.96			
Prob>chi2	0.000			
R squared overall	0.7181			

The fitted model for the moderating effect was as shown below;

$$Y_{it} = 0.980 + 0.337X_{1it} - 0.477X_{2it} + 0.252X_{3it} + 0.104X_{4it}$$

X_{1it} = Short-term Debt of Firm i at time t

X_{2it} = Long-term Debt of Firm i at time t

X_{3it} = Retained Earnings of Firm i at time t

X_{4it} = Share capital of Firm i at time t

M= Moderating effect (Firm Size)

The regression coefficients presented in Table 4 shows that after moderation with firm size(M), Short-term Debt ($\beta=0.337$, $p=0.004$), Long-term debt ($\beta=-0.477$, $p=0.000$), Retained Earnings ($\beta=0.252$, $p=0.024$), and Share capital ($\beta=0.104$, $p=0.048$), had a positive and statistically significantly effect on financial growth of financial firms listed at Nairobi Securities Exchange. Since the P values of the interaction term for the financial structure factors were statistically significant $0.000 < 0.05$ and the R2 increased from 65.59% to 71.81% after the interaction term, we conclude that firm significantly moderates the relationship between the financial structure and financial growth of financial firms listed at Nairobi Securities Exchange. The findings are in line with Ater, Sifunjo, Kisaka, Iraya, Mwangi (2017) who pointed that firm growth has a significant mediating effect and is thus a critical tool that can be used by management when doing capital structures adjustments to ensure efficiency and optimality as firms grow. Abbasi and Malik (2015) also demonstrated that firm size has a moderating inspiration between firm growth and firm performance.

5.1 Conclusions

Based on the study findings, the study concluded financial structure strongly affects financial growth of financial firms listed at Nairobi Securities Exchange in diverse ways. The study confirmed that Short term debt has a positive and significant effect on financial growth of financial firms listed at Nairobi Securities Exchange. The null hypothesis was therefore rejected that there is no significant effect of Short term debt on financial growth of financial firms listed at Nairobi Securities Exchange. The study concluded that the Long term debt has a negative but insignificant effect on financial growth of financial firms listed at Nairobi Securities Exchange. The null hypothesis was therefore not rejected that there is no significant effect of long term debt on financial growth of financial firms listed at Nairobi Securities Exchange.

The study concluded that Retained earnings have a positive and significant effect on financial growth of financial firms listed at Nairobi Securities Exchange. The study also concluded that Share capital have a positive and significant effect on financial growth of financial firms listed at Nairobi Securities Exchange. The null hypothesis was therefore rejected that there is no significant effect of Retained earnings on financial growth of financial firms listed at Nairobi Securities Exchange. Lastly, firm size was confirmed to significantly moderate the relationship between financial structure and financial growth of financial firms listed at Nairobi Securities Exchange. The null hypothesis was therefore rejected that firm size does not significantly moderate the relationship between financial structure and financial growth of financial firms listed at Nairobi Securities Exchange. The size influences a firm performance because large firm can increase their current size very fast by accumulating earnings from past performance and this enhances their value. The accumulation of funds assists in putting up effective management structures.

6.1 Recommendations

The study recommends that the policy makers in the financial sector to embrace indicators on short term debts, long term debts, retained earnings, the share capital and firm size on their strategic decision-making. These indicators will further guide in expanding the interpretation of the financial structures in the listed firms at the Nairobi securities exchange and other related firms. The study recommends that the Central Bank of Kenya to formulate and enact a policy which makes commercial debt cheaper hence reduce cost of operations of financial firms, management of commercial banks listed at the NSE to reduce interest rates so as to attract investors who will

inject more funds into these financial firms. The Nairobi Securities Exchange and Capital markets authority supervisory framework guidelines should be adhered to foster credibility and performance of the listed companies. The government policy makers will also find the findings beneficial in interpreting of performance of the listed companies based on the financial structures.

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