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RESEARCH ARTICLE

CASHFLOW AS A DETERMINANT OF CORPORATE INVESTMENT DECISIONS OF FIRMS LISTED ON NAIROBI SECURITIES EXCHANGE IN KENYA

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ABSTRACT

This study aimed at assessing cashflow as a determinants of corporate investment decisions of firms listed on Nairobi securities exchange in Kenya. The objective of the study was assessing the effect of cash flow on corporate investment decisions of firms listed at the NSE. The study used both primary and secondary data. The study adopted descriptive research design and the target population was 64 firms listed on the Nairobi Securities Exchange (NSE). Data was analyzed using descriptive statistics, correlation analysis and regression analysis using SPSS version 23. The study used simple linear regression models to establish the relationship between dependent and independent variables. The study established that firms had enough cash for its shareholders, the firm had a clear debt management policy. The study concludes that cash flow affects corporate investment decisions of firms listed at the NSE. There was enough cash for shareholders and there was a clear debt management policy. The study recommends that listed firms that have no debt policies should ensure that the management put in place operational debt management policies.

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INTRODUCTION

Corporate Investment decision has remained the topic of interest among financial analysts and scholars for many years. In the huge global war of growth, substantial investment in capital for technology modernization, infrastructure, promotion and development of product is compulsory for a firm (Gutiérrez and Philippon, 2016). Such expansions require heavy investment in both tangible and intangible assets. A firm needs to continuously invest capital in such projects that can reduce cost and increase profitability and ultimately enhance the growth of the firm (Firth, Malatesta, Xin and Xu, 2012). Corporate investment decision is defined by Bakke and Whited (2010) as the decisions made by management in a firm, on when and how much money is to be spend or acquisition of debt in pursuing profit making projects. These decisions are often made after long deliberations at the management level. Firth, *et al*., (2012) note that financial and technical analyses are done and accurate information is sought, so as to make well informed decisions. Since an error in decision making means big losses in terms of cash flows and an increase in debt.What are the determinants of investment decisions at firm level? This question has been raised since the Modigliani and Miller theorem (1958) who postulated that there has been no relation between the financial structure and financial policy for real investment decisions under certain conditions; and extended this to neoclassical models of investment. According to the *q*-theory of Tobin (1969) and extended into a proposed model by Hayashi (1982), investment demand could be predicted by the ratio of the market value of a firm's capital stock to its replacement cost under perfect market assumptions (symmetric information, no transaction costs, no default risk, and no taxation); and its market value could also explain further investment opportunities. In America and Europe, Hall *et al* (1998) used the Panel Data version of the VAR methodology to examine the determinants of investment in scientific firms for the U.S, France and Japan during the period 1979- 1989. They found that there were tighter relations between investments on the one hand, and profits, sales, and cash-flow on the other hand and these differ from country to country. In UK, Carpenter and Guariglia (2008) analyzed financial factors that affect investment decisions with supportive findings and observed that cash flow could not explain the sensitive nature of investment decisions for large firms; however, its explanatory power was still the same for small firms. In Nigeria, Olaleye, Riro and Memba (2016) carried out a research on effect of reduced firm income tax incentives on foreign direct investment in listed Nigerian manufacturing firms. Firm's income tax rates have been successfully used in Nigeria that reduced tax avoidance or tax evasion. The findings showed strong positive linear relationships between reduced

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firms income tax incentives and foreign direct investment. Kimuyu and Omiti (2010), on the other hand in their study found that lack of working capital is the most important reason for business closure in Kenya. They recommended for businesses to seek affordable short-term bank financing tailor made to their ability to repay. They concluded that availability of external financing is crucial for business growth and ultimate profitability.

Statement of the Problem

Investment decision-making is an important part of strategic decision-making in every enterprise. Successfulness of new projects dramatically contributes to the growth of an enterprise's efficiency for example M-pesa project for Safaricom that has grown its net profit to Kshs. 23.9 billion in 2016 (Kamau & Kagiri, 2015). On the other hand, failed projects can lead not only to a considerable decline in efficiency, but it can even jeopardize its future existence unfortunately some of the investment decision made have been unsuccessful. The quality of investment decision making is affected by a large number of factors, while the most important include: cash flow, business risk, level of income, leverage, financial literacy, technology, corruption, insecurity, regulatory decisions, liquidity, ability to invest (Hana, 2010).
Listed firms allow shareholders to participate in share ownership of these firms which increases their capital base. In return for the amount of money invested by shareholders, listed firms pay them dividends on a regular basis. It is in view of this relationship that the shareholder wealth maximization objective of the firm emanates. Corporate investment decisions guide this wealth maximization objective of the firm listed on NSE (Bodie, 2013).

It is then prudent to take a closer look at the factors that influence corporate investment decisions, since these decisions determine the profits or losses made by a firm.
The review of literature indicated a positive relationship between cash flow and investment decision as revealed by studies of Pablo (2006) and Phan (2013).Njuguna, Namusonge and Kanali (2016) examined the determinants of investment intentions: an individual retail investor's perspective from Nairobi Securities Exchange and established that subjective investment knowledge, expected investment value, compatibility, perceived behavioral control had a positive and statistically significant effect on investment intentions of individual investors. Aroni, Namusonge and Sakwa (2014) assessed the influence of dividend payout on investment in shares-a survey of retail investors in Kenya and established that dividend payout had a significant influence on decisions to invest in shares with p-value. These studies looked at some of the factors affecting decision making for a specific investor thus creating a gap as none addressed the determinants on corporate investment decisions of firms listed at the Nairobi Security Exchange (NSE). The current study therefore sought to fill the gap by specifically investigating cashflow as a determinant of corporate investment decisions of firms listed on Nairobi securities exchange in Kenya

Objectives of the Study

To assess the effect of cash flow on corporate investment decisions of firms listed at the Nairobi Security Exchange, Kenya.

Research Hypothesis

H_{o1}: Cashflow does not affect corporate investment decisions of firms listed at the NSE

LITERATURE REVIEW

Theoretical Framework

Agency Theory

The theory was proposed by Jensen and Meckling (1986) and view the firms listed at the Nairobi Security Exchange (NSE) and its corporate owners as the principal and the stockbrokers and stock agents who make investment decisions on behalf of corporates due to their knowledge hence abiding by the Agency theory.Agency theory explains how best the relationship between agents and principals can be tapped for purpose of governing a corporation to realize its goals. Interest on agency relationship became more prominent with the emergence of the large corporations. There are entrepreneurs who have a knack for accumulation of capital, and managers who have a surplus of ideas to effectively use that capital. Since the owners of the capital (principals) have neither the requisite expertise nor time to effectively run their enterprises, they hand them over the agents (managers) for control and day-to-day operations, hence, the separation of ownership from control, and the attendant agency problem. In an agency relationship, principals and agents have clearly defined responsibilities: Principals are select and put in place governors (directors and auditors to ensure effective governance system is implemented, while agents are responsible for day-to-day operations of the enterprise.

Historically, those defining corporate governance took into considerations the relationship between the shareholder and the firm, as per "agency theory", i.e. director-agents acting on behalf of shareholder-principles in overseeing self-serving behaviors of management. However, broader definitions of corporate governance are now attracting greater attention (Salomon, 2014). Indeed, effective corporate governance is currently understood as involving a wide number of participants. The primary participants are management, shareholders and the boards of directors, but other key players whose interests are affected by the corporation are employees, suppliers, customers, partners and the general community. Therefore, corporate governance, understood in these broadening social contexts, ensures that the board of directors is accountable not only to shareholders but also to non-shareholder stakeholders, including those who have a vested interest in seeing that the corporation is well governed.

In relation to agency banking and SMEs, agent banks are retail establishments contracted by the banks and authorized by the central banks to render services for banks by ensuring that all security measures are in place and the SMEs transactions and information is secure. Since agency banking offer services including savings deposits, credit withdrawals, bill payments, new account openings, money transfers, insurance, and government benefits including pension receipts to provide access to SMEs, the agents may obtain the information and use it in a way that puts the interest of commercial banks and SMEs at risk hence creating an agency problem (Williamson, 1981).In the banking sector according to Aduda, Kiragu and

Ndwiga (2013), Agency theory will occur where the bank agency fails to observe the agency regulations as issued by the central bank and hence putting the interest of the bank at risk since it is the one required to ensure that the agents comply with the regulations. Generally, according to agency theory, intermediation places financial institutions (banks and their agents) as intermediating between money and the market or households. Resource (money) allocation based on perfect and complete markets is hindered by frictions such as transaction costs and asymmetric information (Aduda *et al*, 2013).Managers, as agents of a firm's shareholders, may not devote their best efforts toward managing the firm unless those efforts are consonant with maximizing their own welfare. In the security exchange sector of the market, the major decisions on whether a marketing instrument will be traded or not is largely dependent of agents and stock holders. Many stockholders, for lack of sufficient knowledge of the securities exchange market would leave the decision to the stockbrokers and agents who are knowledgeable on the market trends.

Thus, in tandem with the agency theory, the stockbrokers and stock agents are given the power to make decisions and act on behalf of their principals who are holders of the stocks.Some corporate governance scholars (Leblanc & Gillies, 2005) also argue that at the heart of good corporate governance is not board structure (which receives a lot of attention in the current regulations), but instead board process (especially consideration of how board members work together as a group and the competencies and behaviors both at the board level and the level of individual directors). As a result, the current scholarly discourse about the nature of corporate governance has come to reflect this body of research. This separation is however, linked and governed through proper "agency relationship" at various levels, among others "between shareholders and boards of directors, between boards and senior management, between senior and subordinate levels of management" (ISDA, 2002). In such a principal – agent relationship, there is always "inherent potential for conflicts within a firm because the economic incentives faced by the agents are often different from those faced by the principals" (ISPA, 2002). According to ISDA (2002), all firms are exposed to agency problems, and to some extent develop action plans to deal with them. These include establishing such measures as: "controls on the actions of agents, monitoring the actions of agents, financial incentives to encourage agents to act in interest of the principals, and separation of risk taking functions from control functions" (ISDA, 2002). The key issues in agency theory centre upon whether adequate market mechanisms exist that compel stockbrokers, and stock agents to make sound decisions and to act in ways that maximize the utility of a firm's owners where ownership and control are separated. Thus, the theory relevantly explains how listed firms can maximize portfolio income of shareholders through reduction of the conflict of interest. This is relevant as it links decision making that would aide in increase of portfolio income for the firms listed at the NSE.

Empirical Studies

Cash Flow

According to Titman, Keown and Martin (2017) cash flow is an objective measurement of firm wealth. It is not subject to any individual criterion. This is the difference between cash inflows and cash outflows. Generally speaking it can be said that a firm is doing better and: generates wealth for its shareholders when the cash flows improve. For the purpose of this study three different definitions will be used: Equity cash flow, free cash flow and capital cash flow. Equity cash flow= cash inflows – cash out flows in a period. It represents the cash available in the firm for its shareholders, which will be used for dividends. Free cash flow= equity cash flow if the firm has no debt. It represents the cash that remains available in the firm after having covered capital investment requirements and working capital requirements. Capital cash flow = equity cash flow + debt cash flow. It represents the cash available for debt holders plus equity cash flow. The cash flow for debt holders consists of sum of interest payments plus repayment of the principal (or less the increase in principal). This variable is taken from Balance Sheets, and Income Statements of firms. Cash-flow is an important determinant for investment decisions of firms because if firms have enough cash inflows, it can be utilized in investment activities (Robinson and Sensoy, 2016).

Phan (2013) examined determinants of corporate investment decisions in Vietnam. By adopting a static approach, the findings show that cash-flow, fixed capital intensity, business risk, leverage, and firm size are the key elements in making investment activities. Additionally, by using a dynamic approach, the results reveal that past investment also affects investment decisions at the firm level. The firm-level analysis presented in this article shows that an increase in leverage may be associated with increased cyclical variability of investment and employment. The greater volatility of highly leveraged firms appears to arise from a greater responsiveness of investment and employment demands to fluctuations in internally generated funds. One way in which monetary policy can influence aggregate investment and employment is by affecting firms' sales and interest expenses and hence firms' cash flows. The recent rise in corporate leverage may, therefore, signal an increased sensitivity of employment and investment to monetary policy, at least among corporations that have substantially raised their leverage.

Rendon (2010) noted that recent theoretical developments have shown that cash flows and the structure of a firm's balance sheet may have an important influence on investment. Establishing a link between cash flows, leverage and investment provides insights into the way that monetary policy and cyclical factors more generally influence the corporate sector. If cash flows are an important determinant of investment, then changes in monetary policy (by changing interest rates) will influence investment through a cash flow effect as well as through altering the rate at which the returns to investment are discounted. If this is the case, the higher leverage of the corporate sector implies, other things being equal, that monetary policy may have a larger impact on investment than in the past. Furthermore, Tomat (2014) also suggests that the effects of monetary policy will be felt unevenly across the corporate sector. The cash flows of highly geared firms will be more sensitive to changes in interest rates than cash flows of firms with minimal leverage. In this paper we use panel-data analysis to examine the impact of financial factors on investment decisions of firms in the Australian corporate sector. We find strong support for the influence of financial factors on investment decisions. Leverage, internally-generated cash flows, and the stock of cash and liquid financial assets are all important influences on investment behavior, particularly for smaller firms, highly leveraged firms, and

firms with high retention ratios.Melander, Sandström and von Schedvin (2016) looked at the effect of cash flow on investment. This was an empirical analysis. The researcher used large data set on investments and accounting information for private firms to test balance sheet theory. The study revealed that firm cash flow has a positive impact on investment and that the effect is enhanced for firms which are more likely to be financially constrained. Lewellen and Lewellen (2016) examined investment and cash flow. The study was conducted among USA firms covering a period 1971–2009. The findings of the study indicated that financing constraints and free-cash-flow problems are important for investment decisions. Nadia (2016) looked at corporate investment and cash-flow sensitivity. The study relied on evidence from a Jasmin revolution period in Tunisian market. The study covered a period of 2003-2013. From the findings, investment decisions of firms with financial constraints are significantly sensitive to the availability and the level of internal funds versus unconstrained ones. Generally, financial constraints significantly influence the decisions of Tunisian firms. In particular, these financial constraints are considered more handicapping during negative cash years and after the revolution.

Sharma and Saha (2016) in a study on the impact of cash flow reporting on the individual shareholder's investment decision making. The study noted that cash flow statements are one of the most important financial statements as it provides valuable information to investors; but on the other hand, many investors are unable to understand it. Cash flows provide details on operating, financial and investment activities and the outcomes or returns from each activity. Singular retail investor may not easily understand all the complex financial statements; however, cash flow statements are simple enough and are used as a source of information to the retail investor. Cash flow statements report the inflow and outflow real actions. For any investor, understanding how much cash flow to use while investing in a specific project and the expected outcomes or returns is sufficient information that will guide them in the decision-making process. In any case, the whole idea behind investing is gaining a higher level of returns. Therefore, all necessary information becomes a valuable asset in the decision-making process. Maina and Ishmail (2014) in the study on capital structure and financial performance in Kenya: Evidence from firms listed at the Nairobi Securities Exchange. Noting that theinvestment decision involves three key stages, first making informed decision on when to buy securities; secondly through constant monitoring of the market trends, investors decide how long to hold onto the security and lastly the decision to sale them. All these decisions are made through considering how much cash was invested and through monitoring the market trends and previous financial reporting, how much money to expect as returns.Koroti (2014) in the investigative study on the effects of investing and financial decisions on financial performance of the sugar factories in Kenya; the study findings show that after examining the effect of investment decision which was measured using total assets available and the financing decision measured in terms of debt to equity ratio of the financial performance which was measured in terms of Return on Assets (ROA). The study found out that investing decision positively affected financial performance, whereas there was a negative effect of financing decision on financial performance.

Ndungu (2016) assessed the effect of cash flow management on market performance of public construction firms in Kenya. The study used a period of 5 years from January 2008 to December 2015. The analysis used the modified capital asset pricing model (CAPM) regress construction firm equal weighted semi-annual portfolio returns on the market excess returns over risk free rate of return as the first variable and Cash flow ratio, an indicator of cash flow management as the second variable. The results show that cash flows from operations have a positive effect of market performance of construction firms and while the cash flows from investing, financing and free cash flows all have a negative effect of the market performance of construction firms.

Investment Decisions

According to Graham, Harvey and Puri (2015) individuals who were exposed to economics during their schooling may be more likely to have friends (perhaps their classmates) that invest in the stock market. Because of "peer effects" in investing, respondents exposed to these friends may themselves be more likely to invest in the stock market. Several studies have documented that "peer effects" can be pretty powerful determinants of portfolio choice (Sharma, *et al*., 2014). Carr, Kolehmainen and Mitchell (2010) in strategic investment decision making practices; shares that the education level of peers does matter for stock ownership. Those who have friends that have a college degree are more likely to own stocks. Thus, there may be information provision and learning via social interaction. Newspaper readership has a positive impact on awareness, and its coefficient is always highly significant. Increasing readership raises the probability of stock awareness, mutual funds, and corporate bonds (Car *et al*., 2010). Further show that financial mistakes are prevalent among the young and elderly, who are among those displaying the lowest amount of financial knowledge.

Kevin and Tom (2015) investigated the firms' investment decisions and interest rates in Australia. Firms typically evaluate investment opportunities by calculating expected rates of return and the payback period (the time taken to recoup the capital outlay). Liaison and survey evidence indicate that Australian firms tend to require expected returns on capital expenditure to exceed high 'hurdle rates' of return that are often well above the cost of capital and do not change very often. In addition, many firms require the investment outlay to be recouped within a few years, requiring even greater implied rates of return. As a consequence, the capital expenditure decisions of many Australian firms are not directly sensitive to changes in interest rates. Furthermore, although both the hurdle rate of return and the payback period offer an objective decision rule on which to base expenditure decisions, the overall decision process is often highly subjective, so that 'animal spirits' can play a significant role.Merikas, Merikas, Vozikis and Prasad (2011) in the investigation on the economic factors and individual investor behavior: The case of the Greek stock exchange. The study adopted a modified questionnaire to analyze factors influencing Greek investor behavior on the Athens Stock Exchange. The results indicated that individuals base their stock purchase decisions on economic criteria combined with other diverse variables. The results also revealed that there is a certain degree of correlation between the factors that behavioral finance theory and previous empirical evidence identify as the influencing factors for the average equity investor, and the individual behavior of active investors in the Athens Stock Exchange (ASE) influencing by the overall trends prevailing at the time of the survey in the

ASE.Graham *et al*. (2015) noted that individuals who were exposed to economics during their schooling may be more likely to have friends (perhaps their classmates) that invest in the stock market. Because of "peer effects" in investing, respondents exposed to these friends may themselves be more likely to invest in the stock market. The expectation of the link between investment rate and cash flow is a positive sign; higher cash flow of firms will be associated with higher investment (Phan, 2013).

MATERIALS AND METHODS

The study adopted a descriptive design. Descriptive design was used because it focuses on complex analysis to bring out the correlation of variables; as one variable affects changes in another. The target population for this study was 64 firms listed at the NSE between 2010 and year 2014. The sampling frame of the survey of the firms listed was the management staff. The study adopted Kothari (2004) to establish the sample size. This resulted into a sample size of 284 respondents. The study used both primary and secondary data. Questionnaires were used to collect primary data while data collection sheets helped in collection of secondary data. To check the validity and reliability of the questionnaires in gathering the data required for purpose of the study, pilot study was carried out. A pilot study was conducted using 10 respondents. Descriptive statistics such as, mean and frequencies were used to perform data analysis. The mean scores were used to rate the factors in order of their importance. SPSS was used to produce frequencies, descriptive and inferential statistics which were used to derive conclusions and generalizations regarding the population. The analysis of variance (ANOVA) was checked to reveal the overall model significance. Before conducting regression analysis, the researcher conducted Multicollinearity, Normality Test, Heteroscedasticity and Autocorrelation.

Research Findings and Discussion

Out of 384 questionnaires issued out to respondents by the researcher, 288 of them were dully filled and returned to the researcher. This translated to a response rate of 75%. The response rate concurred with Mugenda (2008) who noted that a response rate of 50% is adequate for analysis and reporting, a rate of 60% is generally good while a response rate of above 70% is excellent. From the back-ground information, most of the respondents, 52% were male as compared to females. Majority of these respondents 62.9% were less than 55 years of age. Majority of the respondents 87.9% had attained degrees and below as their highest level of education. Moreover, most of these respondents 72.6% had over 5 years of experience in their respective positions and organizations.

Cash flow

To achieve this objective, questionnaires were designed on a Five-point Likert Scale. The objective had 5 research questions in these questionnaires. The Likert Scale used was such that; 1 was strongly disagree 2 disagree 3 neutral 4 agree and 5 strongly agree. Respondents were requested to indicate the extent of their agreement ion these statements by appropriately checking the extent of their agreement on each of these statements. The obtained responses were coded into SPSS software for analysis. The analysis was done using descriptive (means and standard deviations) besides inferential statistics (simple regression analysis).

Table 1. Cash Flow

Cash flow	Mean	Std. Dev
The firm has enough cash for its shareholders	3.84	.782
The firm's debt level is higher	3.71	.907
Your firm has no debt	3.47	.911
The firm has enough cash for its debt holders	3.65	1.013
Your firm has a clear debt management policy	3.73	.909
Average Mean and Standard Deviation	3.68	0.904

From the findings, the firm had enough cash for its shareholders; the mean was 3.84 with standard deviation of 0.782. This shows that respondents were in agreement on the statement and that it was practiced among listed firms which affected corporate investment decisions. Availability of enough cash flows enhances decision making processes and as noted by Rendon (2010) that recent theoretical developments have shown that cash flows and the structure of a firm's balance sheet may have an important influence on investment.The study established that the firm's debt level was higher with a mean was 3.71 with standard deviation of 0.907. This mean shows that respondents agreed on the statement. Debts and equity are two important components of capital structure of listed firms. Use of debts in capital structure is associated with a number of benefits for example provision of interest tax shield which maximizes profitability of listed firms.

However, too much debts in the capital structure is undesirable as it may lead to default on the side of the firm and therefore bankruptcy. The finding has a strong foundation in trade off theory. According to trade off theory (Myers, 1997), the Tradeoff Theory is based on the premise that an optimal target capital structure will be identified by a firm which is believed to balance the benefits of the interest tax shield against the costs related to financial distress. While the interest tax shield is likely to enhance value of the firm, however, this will only happen to a certain level as increase in leverage increases the risk of default which is likely to result into financial distress costs. Respondents of the study were not sure that the firm had no debt with a mean of 3.47 and standard deviation of 0.911. Since respondents were neutral on this statement, it could imply that the studies firms used debts in their capital structures. This finding is in line with the previous finding where respondents agreed that the debt level of the firms was high. As noted by Sharma, *et al*. (2014), it is generally believed that the value of a firm is maximized when its cost of capital is minimized. The author further notes that the kind of combination of debt and equity that will minimize the firms cost of capital and hence maximizes the firm's profitability and market value is the optimal capital structure which affects investment decision of investors

The study established that the firm had enough cash for its debt holders with mean of 3.65 and standard deviation of 1.013. Debt holders are usually interest and principal as and when it falls due depending on stated terms and conditions. Therefore, availability of sufficient cash ensures that the firm minimizes risks associated with borrowed funds (debts) for instance bankruptcy and penalties due to late repayment. This calls for proper consideration in leverage decisions. As suggested by the Prospects Theory, which according to (Kahneman & Tversky, 1999) predicts a distinctive fourfold pattern of risk attitudes; risk aversion for gains of moderate to high probability and losses of low probability and risk seeking for gains of low probability and losses of moderate to high

probability.The study revealed that the firm had a clear debt management policy, with mean of 3.73 and standard deviation of 0.909. A clear debt management policy ensured that the borrowed capital is well utilized on viable investment projects tin order to meet the interest and the principal amount borrowed. In view of these findings, it is in tandem with Pablo (2006) who indicated that cash flow is an objective measurement of firm wealth. The author further revealed that a firm is doing better and: generates wealth for its shareholders when the cash flows improve. The aggregate mean was 3.68 with standard deviation of 0.904. The mean shows that respondents actually agreed that cash flow affected corporate investment decisions among listed firms at NSE. The lower standard deviation further suggests converge of opinions expressed by different respondents on the effect of cash flow on corporate investment decisions of listed firms at NSE. This finding is in line with Rendon (2010) who established that cash flows are an important determinant of investment.

Investment Decisions of the Firm

Below are statements on investment decision of the firm that respondents were requested to indicate the extent of their agreement on each using a Likert scale of 1-5 where 1 is strongly disagree 2 disagree 3 neutral 4 agree and 5 strongly agree.

investment decisions, the concurs with the findings by Kevin and Tom (2015) who revealed that firms make decisions by evaluating investment opportunities through calculating expected rates of return and the payback period. The Australian firms require expected returns on capital expenditure to exceed the rate of return that are often well above the cost of capital and do not change very often. In addition, many firms require the investment outlay to be recouped within a few years, requiring even greater implied rates of return. As a consequence, the capital expenditure decisions of many Australian firms are not directly sensitive to changes in interest rates. The mean of the investment decisions for the firm was 3.90 and the standard deviation was 0.902. The respondents agreed that investment decisions affected their corporate investment decisions of the firms listed in the NSE. This finding is similar to the study by Merikas, *et al*, (2011) which stated that individual investors base their stock purchase decisions on economic criteria combined with other diverse variables such as return on assets or investments and overall prevailing stock exchange trends.

Regression Results and Hypothesis Testing

The researcher used simple linear regression to test the hypothesis. The study used F-Tests, Analysis of Variance (ANOVA) to test the level of significance of the variables on

Table 2. Investment Decisions

Investment Decisions	Mean	Std. Dev
There has been an increase in EPS in the firm for the last 5 years	3.72	.885
There has been an increase in ROE in the firm for the last 5 years	3.79	.953
There has been an increase in ROA in the firm for the last 5 years	3.89	.729
There has been an increase in profits in the firm for the last 5 years	3.94	.924
There has been an increase in return in investments in the firm for the last 5 years	4.19	1.020
Average	3.90	0.902

Table 3. Regression Coefficient

	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
(Constant)	3.202	.261		12.682	.000
Cash flow	.057	.014	.970	4.071	.000
R=.087[a]	R^2=.007	Adj. R^2=.004	$F_{calculated}$=2.158	P=0.000	

Table 4. Pearson Correlation

Indicators		Investment Decisions	Cash flow
Investment Decisions	Pearson Correlation	1	
	Sig. (2-tailed)		
	N	288	
Cash flow	Pearson Correlation	.507	1
	Sig. (2-tailed)	.001	
	N	288	288

From the findings, there has been an increase in EPS in the firm for the last 5 years, with a mean of 3.72 and standard deviation of 0.885. There has been an increase in ROE in the firm for the last 5 years; the mean was 3.79 with standard deviation of 0.953. On whether there has been an increase in ROA in the firm for the last 5 years, with a mean of 3.89 and standard deviation of 0.729. There has been an increase in profits in the firm for the last 5 years; with a mean of 3.94 and standard deviation of 0.924. There has been an increase in return in investments in the firm for the last 5 years, with a mean of 4.19 and standard deviation of 1.020. The implies that return on investments was strongly agreed by the respondents as the factor they most considered when making corporate

the dependent variable at 95% level of confidence (p=0.05). According to Moriya (2008) F-Tests are the most commonly used to test confidence intervals and hypotheses, If the significance level is less than 0.05 ($p<0.05$) then, the correlation is significant and the two variables are linearly related. If the significance level is more than 0.05 ($p>0.05$) then, the correlation is not significant and the two variables are not linearly related when testing the null hypothesis and therefore a correlation model does not exist between independent variable and dependent variablefrom the findings, cash flow had p value $0.000<0.05$, an indication that it significantly affected investment decisions among firms listed at NSE. The study therefore rejects the null hypothesis and

accepts the alternative hypothesis that cash flow affects corporate investment decisions of firms listed at the NSE. Similar findings were sought by Melander, Sandström and von Schedvin (2016) who looked at the effect of cash flow on investment and established that firm cash flow has a positive impact on investment and that the effect is enhanced for firms which are more likely to be financially constrained.The coefficient of correlation R is 0.087 showing that individually, cash flow does not have a greater influence on corporate investment decision. This is further supported by a lower coefficient of determination R square of 0.007 showing that cash flow explains 0.7% change in corporate investment decisions of listed firms at NSE. In UK, Carpenter and Guariglia (2008) analyzed financial factors that affect investment decisions with supportive findings. It was established that the significance of a cash-flow variable in the investment equation could be caused by information asymmetries in the capital market.

Correlation Analysis

The researcher conducted Pearson correlation analysis to determine the direction, strength and nature of relationship between the variables of the study. Pearson's Product Moment Correlation (r) is a measure of the linear dependence (correlation) between two variables and can give a positive or negative value of their relationship (Huber, 2004).From the findings, cash flow had Pearson correlation coefficient of 0.507 with p value $p=0.001<0.05$. This means that there is a strong positive significant correlation between cash flow and corporate investment decisions. For business risk, the value of Pearson Correlation Coefficient was 0.617 with p value $p=0.048<0.05$. Therefore, there is a strong positive significant relationship between business risk and corporate investment decisions.

DISCUSSION

Based on the hypothesis formulated, the study established that cash flow affects corporate investment decisions of firms listed at the NSE. The finding concurs with Phan (2013) who held that the expectation of the link between investment rate and cash flow is a positive sign; higher cash flow of firms will be associated with higher investment. The study further established that the firm had enough cash for its shareholders. Phan (2013) further indicated that cash flow represents the cash available for debt holders plus equity cash flow. The cash flow for debt holders consists of sum of interest payments plus repayment of the principal (or less the increase in principal). Cash-flow is an important determinant for investment decisions of firms because if firms have enough cash inflows, it can be utilized in investment activities.

Summary, conclusions and recommendations

Summary of the Findings

The objective of the study was to appraise the effect of cash flow on corporate investment decisions of firms listed at the NSE. From the findings, the firm had enough cash for its shareholders with a mean of 3.84 and standard deviation of 0.782. According to (Nwibo & Alimba, 2013), the investor with higher income level is likely to invest more compared to those investors with low income level who invest a small proportion of their income. The findings of the study indicated that the firm had a clear debt management policy for the mean was 3.73 with standard deviation of 0.909. The study established that the firm's debt level was higher, since the mean was 3.71 with standard deviation of 0.907. From regression analysis, the study established that cash flow was significant in affecting corporate investment decisions ($p=0.000$) <0.05.

Conclusion

The study concludes that cash flow affects corporate investment decisions of firms listed at the NSE. There was enough cash for shareholders and there was a clear debt management policy.

Recommendation

The study recommends that management of firms listed at NSE should put in place sound strategies of generating positive cash flows and this can be done through proper working capital management. The listed firms that have no debt policies should ensure that the management put in place operational debt management policies. This is because cash flow and debts are the two major considerations by corporates while making investment decisions.

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