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FACTORS INFLUENCING DIVIDEND PAYOUT DECISION OF FINANCIAL AND NON-FINANCIAL COMPANIES LISTED ON NAIROBI SECURITIES EXCHANGE

Samuel Thuo Gakumo[1] & Dr. Christine N. Simiyu [2]

[1 & 2] **School of Business and Public Management, KCA University, Kenya**

Corresponding Author email: sagthuo@yahoo.com

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Abstract: Corporate dividend payout policy is among the most contested topics in corporate finance. The question of why firms make decisions to pay or not to pay dividends remains an open topic. The reason of this study was to examine the factors influencing dividend payout decision of financial and non-financial companies listed on Nairobi Securities Exchange. The study conducted a census on 9 financial and 24 non-financial firms listed on the NSE consistently since 2003 to 2012.Panel data was analyzed using Tobit random effects model. The findings indicated that four variables; EPS and profitability plays a key role in positively determining the amount of dividend to pay while financial leverage and business risk play a key role in negatively determining the amount to pay. Based on the findings, the study concluded that EPS, financial leverage, and business risk play a key role in making the decision to pay or not to pay dividends. Earnings per share influence the decision to pay positively while both financial leverage and business risk influences the decision to pay dividends negatively. The findings also indicated that business growth rate, the moderating effect of size and financial sector have an insignificant relationship with the amount of dividend paid. The study recommended that both current and potential investors who are predicting future dividends to be paid should take note of the firm's financial leverage, business risk, profitability and EPS. They should expect a decision of not being paid dividends when the firm's have high business risk and financial leverage and expect a decision of being paid dividends when the firm's have high EPS.Investors should not rely on profitability when predicitng the decision to pay dividends. Another recommendation made by the study is that managers should incorporate policies to pay low amounts of dividends when their firms have high leverage and business risk and pay more dividends when profitability and EPS are high. However, they should not necessarily consider business growth rate in paying dividends.

Keywords: *Dividend payout policy, Tobit model, NSE*

Introduction

One of the vital components of corporate policy is examining dividend payout decisions. The dividend policy of a company determines the division of earnings between payments to stockholders and reinvestments in the firm. Finance manager's task is to allocate the earnings to dividends or retained earnings. Retained earnings are one of the most significant sources of funds for financing corporate growth. The latter makes it eventually possible to get more dividends. The topic of dividend payout has been of concern to financial managers and every firm at large. Firms face the dilemma of sharing dividend to stockholders and retaining their earnings with the aim of reinvesting it back into the business to enhance further growth. The decision of any firm regarding how much earnings they could pay out as a dividend and how much they could retain is the concern of dividend payout decisions. (Lease *et al*., 2000). Dividend payment pattern impact among other things company's stock price and reputation (Malik, Gul and Rehma, 2013). Paying out more cash dividends tends to increase the price of the stock. However, increasing cash dividends means that less money is available for reinvestment and reinvesting back fewer earnings into the business will lower the expected growth rate and invariably depress the price of the stock. The firm must, therefore, be very careful in deciding the allocation of earning to these two objectives.

Theoretically, corporate dividend payout is known to be a function of many factors. The said factors are not only internal but also external. Among internal factors is liquidity position, repayment of debt, reinvestment opportunities, stability of earnings and profitability of operations as well as the need for ownership control. The external factors include legal considerations, access to capital markets, cost-of-debts and change in technology (Weston and Brigham, 2001; Van Horne, 2002). The interplay of these factors remains a vital issue in the distribution of corporate earnings after-tax between retained earnings and dividends. Dividend payout stipulates the proportion of earnings that a company pays out in cash to the shareholders. A business distributing a high proportion of its earnings as a dividend may reduce the amount of earnings retained in the firm thus affecting the total amount of internal financing. It can do this while pleasing the investors who have a preference for cash dividends. On the other hand, a company may adopt a low dividend payout policy, which though providing retained earnings finance, may send the wrong signal to the investors. The investors then interpret a low dividend payout as a sign of little management confidence in the company's future prospects (Pandey, 2010).

The essential aspect of dividend payout is to determine the amount of earnings the company should distribute to shareholders and the amount it should remain in the firm. Retained earnings are the most needed internal sources of financing the corporation's growth (Barclay, Smith and Watts, 2005). On the other hand, one may consider dividends desirable from a shareholders point of view as they tend to increase current returns. The term dividend, when used by itself, is understood to mean a distribution of cash by the company to its shareholders (Farida, 2003). The company may distribute dividends in many other forms including property, which are in terms of physical assets of the corporation, and stock dividends, which is the payment of additional stock to current shareholders. This research will focus on cash dividends since investors perceive dividends in terms of a cash return on their stock and are also the most common form of dividends. In essence, the dividends payout decision has a direct impact on the company's financing options and the investors' perceptions of the company's prospects. The firm should give all critical factors consideration before setting a dividend payout. A company has to establish a balance between its interests and that of investors (Kuria, 2012).

Research Problem

Corporate dividend payout policy has been an issue of interest in the financial literature for a long time. The topic remains an open subject despite vast research on it. Dividend policy has remained to be a controversial topic ever since the work of Lintner (1956) followed by Modigliani (1961) who stated that there is no policy which can increase the shareholders wealth in perfect capital markets and that dividend policies are all equivalent. Because of this Modigliani (1961) view, dividend policy has become one of the most debated topics in many academics as well as corporate finance. According to Baker, Gary and Theodore (2002) academics have tried to find the missing pieces in the dividend puzzle for more than half a century and Frankfurter et al. (2002) agrees that forty years have been spent researching dividend policy with no resolution. The concept of Dividends is not new and in hundreds of years, it has been a standard procedure for most businesses to pay shareholders. Ciaccia (2012) however notes that some of the companies like Apple and Google which recorded the greatest success during the last years chose not to pay dividends. This is a dilemna that raises questions concerning dividends payout. A possible question arising is, if it is possible to be successful without paying dividends, so why do firms make decisions to pay or not to pay dividends?

Much of the studies conducted on dividend policy have concentrated on developed economies of North America and Western Europe. Studies on dividend policy of listed firms in African securities have become pertinent since there is growing investments in the continent. A well-regulated stock market is a vehicle for economic development, and should have a spin-off effect on the dividend policy of public companies. The availability of discrepancy in the dividend policy in African firms and their impact on the overall economic activities and growth has not gone unnoticed. Studies focusing on various implications of dividend policy in developing economies, particularly in Africa have been conducted in the recent past. For example studies by Vaivazian, Booth and Sean (2003), Nnadi and Akomi (2008) and Asamoah (2010). Despite that, many more studies are needed. Since many studies have mainly concentrated on developed economies, more studies need to be conducted in developing economies to bring out more insights into the topic. This paper, therefore, sought to examine the factors influencing dividend payout decisions of 33 financial and non-financial firms. These firms have been on the Nairobi Securities Exchange listing between 2003 and 2012 in Kenya, a country that is among the developing economies. The study investigated the influence of various factors on dividend payout decision of firms listed at Nairobi Securities Exchange. The said factors are financial leverage, business risk, business growth rate, profitability, Earning per share, financial sector dummy and size of the firm. The study used seven objectives because previous studies have not combined all the seven in one study. For example, the study by Nnadi and Akomi (2008) used four objectives namely market capitalization, age and growth of firms and profitability. The study by Asamoah (2010) used one objective namely, a company's share prices. This study sought to answer the question: "What are the factors influencing dividend payout decision of financial and non-financial companies listed on Nairobi Securities Exchange?"

Research Objective

1. Establish the influence of financial leverage on dividend payout decision of financial and non-financial companies listed on the Nairobi Securities Exchange.
2. Determine the effect of business risk on dividend payout decision of financial and non-financial companies listed on the Nairobi Securities Exchange.
3. Investigate the influence of business growth rate on dividend payout decision of financial and non-financial companies listed on the Nairobi Securities Exchange.
4. Determine the influence of Profitability on dividend payout decision of financial and non-financial companies listed on the Nairobi Securities Exchange.
5. Establish the influence of Earning per share (EPS) on dividend payout decision of financial and non-financial companies listed on the Nairobi Securities Exchange.
6. Determine the influence of financial sector dummy on dividend payout decision of financial and non-financial companies listed on the Nairobi Securities Exchange.
7. Investigate the moderating impact of firm size on dividend payout decision of financial and non-financial companies listed on the Nairobi Securities Exchange.

Theoretical Review

Dividend Irrelevance Theory

Miller and Modigliani (1961) advanced the dividend irrelevance theory. The argument put forward by the theory is that in ideal circumstances, the value of the firm will not be affected by the level of the firm's dividends because shareholders value is indifferent to an announcement of high or low levels of dividends. The proponents of the theory argued that company's value depends solely upon the investment opportunities available to it and not dividends. Another argument is that, there is always the availability of funds for investment in worthwhile projects. This means that, the firm can raise sufficient capital externally and internally to fund both its investments programs and dividends for a given set of investment opportunities. The main point which the theory support is that, investment decisions should not be affected by dividend payout. Maina (2002) however states that the argument by Miller and Modigliani (1961) wont apply in a situation of induced capital market rationing because investment choices will be influenced heavily by the amount of retained earnings and in such cases dividend payout impacts directly on investment .

According to the theory, dividend payments become irrelevant for the shareholders because to pay dividends, the company has to issue new shares to raise the capital needed. The price of the stocks will drop in equal proportions to the dividend payments following the issuance of new stocks. Similarly, the decrease in stock price and the dividend payments will cancel each other out (Modigliani and Miller, 1961). The implication of the theory is that managers should spend more time managing the firm's assets. From a shareholder's point of view, irrelevance implies that they are indifferent between receiving returns as capital gains or as dividends. A greater capital gain is indicated by a lower dividend while a lower capital gain is indicated by a higher dividend and the overall return is equivalent in either case. The propositions were refuted by Miller and Modigliani (1961) who argued that the required rate of return is independent of dividend policy. The current study was seeking to test the relationship between some factors and the firm's dividend payout decision. One of the factors is the company's profitability. The study sought to test whether there is a significant relationship between a firm's profitability and the dividend payout decision. It is probable to deduce that dividends may contribute to

greater profits if there is a strong relationship between the profit acquired and the dividend payments. Since Modigliani and Miller state that dividend does not have an impact on profits, the study will hence seek to test the relationship. Even though this research disregards the supposition that capital markets are perfect, which is an important assumption, it will still test the theory on the Kenyan NSE market.

Bird in Hand Theory

Lintner (1956) advanced the bird in hand theory opposing Modigliani and Miller's dividend irrelevance theory. The term "bird in hand" is an umbrella term for all studies that argue that dividends are correlated positively to the company's value. It draws from the expression that "a bird in the hand is worth more than two in the bush". In financial terms, the theory says that investors' are more willing to invest in stocks that pay current dividends than investing in stocks that hold earnings and pay dividends in the future. This is because of the high degree of uncertainty associated with capital gains and dividends paid in the future. It is easier to predict current dividends than it is to predict capital gains. The stock price depends on market forces and not the managers, and so the degree of uncertainty in it is relatively higher (Keown et.al 2007). Brigham (1968) stated that the bird in hand theory argues for the relevance of dividends in firm valuation. According to him, It argues that shareholders are risk averse and prefer certainty and to them dividend payments are more certain than capital gains.

According to Khan and Jain (2008) ,the underlying assumptions of the theory is drawn from the idea of what is available today in comparison to what may be available in the future. Means that, the further the future, the higher the uncertainty associated with capital gains and future dividends. The future capital gains may provide higher returns than the current dividends however, there is no guarantee that the investor will accumulate a higher return due to the high degree of uncertainty (Gordon, 1962). Since there is a correlation between the length of the time and the level of risk, investors are unwilling to invest in firms where they will have to wait for a long time to receive dividend payments. An investor would, therefore, be willing to pay a higher price for firms that pay current dividends. For companies that do not pay current dividends, the investor would use a higher discount rate to discount the earnings. The value of these enterprises should, therefore, be lower than the companies who pay current dividends (Khan and Jain, 2008). As highlighted, the bird in hand theory is the opposing view of Modigliani and Miller's dividend irrelevance theory. It states that among other things, companies with higher profits pay higher dividends to its shareholders. In this light, therefore, this study would wish to test this supposition. Profitability is one of the factors that the study sought to test. Therefore, it explored whether it is Modigliani and Miller's dividend irrelevance theory or the bird in hand theory that best suits the financial and non-financial firms listed on the Nairobi Securities Exchange.

Information Signaling Effect Theory

Stephen Ross advanced this theory in 1977 arguing that dividends are relevant and that dividend policy can be used by the management to signal some information to the market if the business is operating in an efficient market. For example, payment of high dividends by the management could indicate large projected profits in the future to maintain a high dividend level while low dividends would show that the firm expects low profits in the future hence reducing the share price of the company. Bhattacharya (1979) put forth one of the most recognized studies regarding signaling theories which stated that dividends might serve as a signal of anticipated future cash flows. A rise in amounts of dividends indicates that the managers look forward to higher cash flows in the future. The research however grounds on the assumptions that outside investors have

imperfect information regarding the company's future cash flows and capital gains and also tax rates on dividends are higher than those of capital gains. According to Bhattacharya (1979), under these circumstances companies would choose to use dividends to send positive signals to their shareholders and outside investors by paying more dividends. This move would however be irrespective of the fact that there is a tax disadvantage for dividends.

The application of the theory in the real world has necessitated into a pool of research which has resulted into different opinions regarding the applicability of the signaling theory. A study by Asquith and Mullins (1983) for example, provided empirical evidence in favor of the signaling theory arguing that an increase in dividend payments tends to increase the shareholders wealth and that dividends also contain information that is not available in other sources of information like accounting data. Other studies, for example, Black (1976) and Pettit (1972) states that the informational role of dividends are exaggerated and that other less expensive ways of signalling the same information to shareholders can be used. This study sought to determine whether the argument by Bhattacharya (1979) that increases in dividend payments can act as a sign of higher cash flows in the future, is practical in the NSE market. The current study, therefore, tested the relationship between companies' dividend payout ratio and various factors, and one is the growth. The study, therefore, sought to investigate whether dividends provide a signal of higher growth. Since there is no unified picture of a correlation between dividends and growth, the study will seek to examine the relationship in the Kenyan NSE market.

Empricial Literature Review

Many researchers have explored the relationship between dividends and factors such as liquidity, cash flow position, external financing, investment and value of the firm. Helfert (2006) concluded that most companies look at the dividend payout ratios of other firms in the industry, particularly those having the same growth rates. Weston and Brigham (2001) and Van Horne (2003) identified a company's liquidity, cash flow and ability to borrow as prime considerations in the dividend decision. Kolb and Demong (2008) introduced the issue of restrictions in bond and loan agreements. Seitz (2000) identified inflation as having an influence on the dividend payout. He suggested the possibility of making a case for companies retaining earnings to preserve the earnings power of the company with ease. Maina (2002) concluded that the firm's dividends decision is significantly affected by the investment opportunities available. Kunga (2004) sought to examine the relationship between the determinants of dividend payout ratios in the context of a developing country. The study investigated the issue by focusing specifically on firms listed on the Nairobi Securities Exchange (NSE). The study used regression analysis involving the regression of changes in firms' ROE against the three explanatory variables of ownership structure, the size of the firm and leverage. The study found that ownership structure of firms impacted the dividend payout, especially in smaller firms owned by directors and their families. The results indicated that the companies' ownership structure does not influence dividend policy significantly. It also concluded that financial leverage and size of the firm, other than ownership structure, handled changes in the dividend policy of the firms listed on NSE.

In another recent study, Ambuku (2014) conducted a study to establish the effect of debt financing on dividend policy of enterprises listed on the Nairobi Securities Exchange between 2009 to 2013.The study employed longitudinal research design that used quantitative secondary data from financial statements of sampled firms listed on the NSE. The study findings conclude that a negative relationship does exist. There exists a negative association between financial leverage and dividend policies employed by firms.

Arumba (2014) conducted the most recent study that sought to establish the determinants of dividend payout for firms listed on the Nairobi Securities Exchange. The objective of his study was to establish the manner and extent to which company earnings, liquidity, profitability, and size determine dividend payout for firms listed on the NSE. The results consistently support the potential association between the four independent variables and the dependent variable (dividend payout) for firms listed on the NSE. Earnings, profitability and company size, had a positive correlation with dividend payout while liquidity had an adverse correlation with dividend payout. Jeong (2008) also supported Amidu and Abor (2006) and stated that where sales growth is expected to be adversely related to the degree of dividend smoothing in term of dividend payout. He studied 299 firms listed on Korea Stock Exchange over a twenty-six years period between 1981 and 2006. Basing his arguments on the signaling theory, he implied that firms with growth opportunities or sales growth are relatively more likely to pay dividends to convey this information to the market. He added that these firms would also have a greater need to retain a higher proportion of earnings to support their valuable investment projects to improve the company's sales growth rate.

A study was conducted by Kivale (2013) to establish the effect financial leverage and revenue growth have on the dividend policy of companies listed on the NSE between 2008 and 2012. The study analyzed forty firms out of a population of sixty firms that had been listed consistently during that period. He collected secondary data from group annual and financial reports of individual companies for five years, which constitutes a complete business cycle. The study used a multivariate regression model whereby the dividend payout was the dependent variable. The independent variables were financial leverage, return on equity, revenue growth, the size of the firm, corporate tax, current earnings, and liquidity. With regards to these findings, the study revealed that there exists an adverse relationship between financial leverage, revenue growth and dividend payout. Firms pay dividends as a sign of current and future prospects. Most previous studies have found a positive relationship between profit and the company's dividend payouts. In their investigation of dividend policy and corporate governance in Poland, Kowalewski and Oleksandr (2007) examined one hundred and ten non-financial corporations between 1998 and 2004. The result of the study revealed that corporate governance is an important determinant of dividend policy. Also, larger corporations with higher profitability but lacked good investment opportunities paid more dividends. Moreover, companies with higher debt ratios paid fewer dividends.

Al-Malkawi (2007) also examined factors that determine the corporate dividend policy in Jordan. He employed a firm-level panel that consisted of all publicly traded firms on the factors affecting dividend policy on Amman Stock Exchange between 1989 and 2000. The results suggest that the proportion of stocks held by insiders and the state significantly affected the quantity of dividends paid. The firm's age, size, and profitability seem to be determining factors of corporate dividend policy in Jordan. Jeong (2008) also found out that the Korean firms make dividend payments on the grounds of firm's stock face value that is very close to the average interest rate on deposits. The change in dividends is less likely to reflect the change in fundamentals of the firms. They find the determinants of dividend smoothing, company risk, size and growth factors play very crucial roles in clarifying the cross section of the dividend behavior and smoothing. According to Pal and Goyal (2007), the current earnings are also synonymous with profit after tax, which represent the capacity of a corporation to pay dividends. Thus, it has a positive correlation with dividends. Besides, the level of profit consitutes an invariable starting point for the management when considering whether the firm should pay or not to pay dividends in any given year.

Ndung'u (2009) conducted a study that sought to find out the determinants of dividend policy. The study used a descriptive survey on a population sample including all the companies listed on the NSE and had traded steadily from 2004 to 2008. The study used secondary data to make an analysis of the total assets, current liabilities, current assets, common equity, net income, retained earnings and market capitalization from the books of accounts of those companies. Data analysis was through regressing the dividend payout ratio as a dependent variable against the independent variables. The latter were profitability, firm size, growth opportunity, earned equity mix and liquidity. The conclusion of the study was that profitability, liquidity, size, earnings to contributed equity mix positively influence dividend policies of firms listed on the NSE. Growth opportunity also recorded a positive influence on the dividend policy contrary to past studies and expectations.

Research Methodology

This study adopted descriptive study design. The study sought to investigate what factors they are in trying to explain and describe the current situation of dividend payout decisions in the firms listed in NSE. This study targeted all the 33 financial and non-financial firms listed on the Nairobi Securities Exchange since 2003 to 2012. 33 firms were targeted because they have consistently been listed at NSE since 2003 up to 2012 without missing any year. The study did not consider the firms that were not listed at any particular year between 2003 and 2012. Hence, the only firms that had been consistently listed were 33 which made up the study target population. The financial firms are 9, and the non-financial firms are 24. The study conducted a census of all the 33 financial and non-financial firms listed in Nairobi Securities Exchange since the year 2003 to 2012 instead of adopting a sampling methodology. To establish whether there was a relationship between the dividends amount paid (Log of the dividend amount) and the firms selected factors, the study conducted a regression analysis. The study also aimed to establish factors that influence the amount of dividends paid. To do so, the study used a Tobit model which allows for censoring of the amount and zero amounts paid so that the results obtained in the regression are not inconsistent as a result of the zeros. According to Keller (2005), regression analysis is used to predict the value of one variable on the basis of other variables. The study applied the Tobit (1958) model that is a type of censored regression model. The Tobit model is a development of the probit model, and James Tobit created it in 1958.The main difference between the ordinary multiple regression and the Tobit regression is that the Tobit model takes censoring and truncation into consideration. Censoring refers to the case when data in the dependent variable is lost while the independent variables are not subject to any loss in data (Amemiya, 1985). Truncation refers to the case when data is lost in both the independent and dependent variable. The use of OLS estimation in the presence of censoring has been found to result in inconsistent estimates (Greene, 2003, Long, 1997).

The exclusion of the 0 amount of dividend payout ratios, if used in a multiple regression models, may create some bias and the study, therefore, applied the Tobit model. In the Tobit model, all observations with 0 dividend payout will be censored instead of being excluded from the sample. The study applied the Tobit model with the aim to exclude any bias that may arise in the event that the research would need to use the multiple regression analysis. It adopted the Tobit model because it measures not only the probability that a firm will pay dividends but also the quantity of dividends paid. The use of Tobit has previously been applied in other studies like (Daunfeldt et.al 2009) hence this study, therefore, finds it appropriate and applicable. In cases where substantially large numbers of firms have paid the dividends, a variant of the one-limit Tobit model that is, a 2-limit Tobit proposed by Rossett and Nelson (1975), could be used. An example of a study that used the model is Gould et al. (1989).

The equation for the structural Tobit model is the same as the equation applied in the multiple regression analysis:

$$Y_{it} = \beta_0 + \sum_{i=1}^{7} \beta 1 Xit + \mu_{it} + e_{it} \qquad v$$

The dependent variable (Amount of dividend paid) is censored to zero if the observation

Has zero amount of dividends paid and y* if the observation has a payment:

$$Y_{it} = \begin{cases} y^* \text{ if } y^* > 0 \\ 0 \text{ if } y = 0 \end{cases}$$

The uncensored observations (those that show payments of dividends) are treated in the same way as in the OLS regression. However, the probability of being censored applies for censored observations (those that show zero payments of dividends). The standard Tobit model may not be appropriate for the modeling of censored panel data, due to the presence of unobserved heterogeneity. Therefore, the unobserved effects (fixed and random) need to be taken into consideration. It will result in two types of unobserved effects in Tobit models: (1) fixed, and (2) random. According to STATA (2000) and Long (1997), the estimation of a fixed effects Tobit model is complex. This is because, at present, there is no feasible estimator for a fixed effects Tobit model. Therefore, the fixed effects Tobit model was not considered in this study. The study adopted a random effects Tobit model.

The Tobit model specification for this study was:

$$Y_{it} = \beta_0 + \beta_1 X_{1t} + \beta_2 X_{2t} + \beta_3 X_{3t} + \beta_4 X_{4t} + \beta_5 X_{5t} + \beta_6 X_{6t} + \beta_7 X_{7t} + \mu it + e_{it} \qquad vi$$

$$Y^*_{it} = \begin{cases} Y^*_{it} \text{ if } y_{it}^* > 0 \\ 0 \text{ if } y_{it} = 0 \end{cases}$$

Y^*_{it} (The dependent variable) that is (Amount of dividend paid) is censored to zero if the observation has zero amount of dividends paid and y* if the observation has a payment:

Where:

Y^*_{it} = Amount of Dividend Paid (Y^*_{it}, 0), X_1 = Financial Leverage, X_2= Business risk, X_3 = Business Growth rate, X_4 = Profitability, X_5 = Earnings per share, X_6 = Financial sector dummy variable, X_7=Size of the firm, e=Error term, β_1 - β_7 =coefficients of independent variable and β_0= constant

The Tobit model was used to investigate the factors influencing the amount of dividends paid. The amount of dividends was captured by their logarithm values. A Tobit model was used because of its ability to censor where an amount was paid and where it was not paid. The main reason for this was to avoid inconsistent estimates (Greene, 2003). The model used amount of dividends paid while the Probit model used binary numbers to indicate the decision to pay and not to pay. Zero amount of dividends paid indicated a decision not to pay while where any amount was paid, indicated the decision to pay.

Results and Discussion

Panel data descriptive statistics (Overall, Between and Within)

The panel data descriptive statistics regarding the mean and standard deviation were calculated and represented as shown in Table 1 below. The overall mean amount of log of dividends paid by the 33 firms in the study period was 15.18463. The value of 6.0969 of standard deviation of amount of dividend paid in a 10 year period between the 33 firms indicates a wide variation. There was also a wide variation in the yearly amount of dividends paid by the firms in the study period as indicated by a standard deviation of 7.03. The findings also revealed wide variation in EPS between the firms as well as EPS yearly in the study period as indicated by standard deviations of 6.631 and 10.537 respectively. Concerning profitability, it was revealed that there was a wide variation in the profits realized between the firms in the study period as indicated by a standard deviation of 0.0692. The yearly variations in profits realized by the firms listed at the Nairobi securities exchange was also found to vary widely as indicated by a standard deviation of 0.086. The variations in financial leverage between the firms listed at Nairobi securities exchange and also yearly variations in all the firms had a small variation however there was a wide variation in business growth rate yearly among the firms listed at the Nairobi securities exchange but a small variation in business growth rate between the firms as indicated by a standard deviation of 0.538 and 0.245 respectively.

Table 1: Panel Data Descriptive Statistics (Overall, Between and Within)

Variable		Mean	Std. Dev.	Min	Max	Observations
Amount of Dividend paid	Overall	15.18463	9.25139	0	26.12586	N = 330
	Between		6.096955	1.594181	24.9264	n = 33
	Within		7.030807	-7.02724	32.16727	T = 10
EPS	Overall	6.927657	12.40127	-46.74	100.05	N = 330
	Between		6.631169	-3.072	25.745	n = 33
	Within		10.5367	-58.7084	88.08166	T = 10
Business Profitability	Overall	0.070494	0.109845	-0.64113	0.508738	N = 330
	Between		0.069281	-0.06983	0.246759	n = 33
	Within		0.086008	-0.50081	0.572898	T = 10
Financial leverage	Overall	0.671531	0.482566	0	5.738935	N = 330
	Between		0.366413	0.077926	1.782102	n = 33
	Within		0.31982	-0.66494	4.753577	T = 10

Variable		Mean	Std. Dev.	Min	Max	Observations
Business growth rate	Overall	0.181444	0.59077	-0.56503	9.226141	N = 330
	Between		0.245486	-0.2183	1.348062	n = 33
	Within		0.538883	-1.16679	8.059523	T = 10
Size	Overall	19.06512	4.664688	10.76882	26.62966	N = 330
	Between		4.696673	11.32695	25.70169	n = 33
	Within		0.551372	17.28725	20.48155	T= 10
Business risk	Overall	0.045399	0.081282	0.00001	0.756679	N = 330
	Between		0.050852	0.002169	0.234384	n = 33
	Within		0.063966	-0.18681	0.567694	T = 10

Correlation Analysis

The study assessed the associations among the predictor variables using the pair-wise correlation matrix. The study conducted a test to check the association among the variables in financial and non-financial sectors separately and then combined. The result in Table 2 shows the correlation matrix of the variables in the non-financial sector. The results indicate that most of the independent variables are showing coefficients with weak magnitude. There is a weak association between the independent variables in the non- financial sector apart from the relationship between profitability and earnings per share which is significant with a correlation coefficient of 0.4872.The association between financial leverage and EPS and profitability is negative but significant though weak. Business risk has a negative but significant association with profitability but a positive and significant association with financial leverage. However, the results indicated that there was no problem of multicollinearity among the variables within the non- financial sector since no association had a value greater than 0.7.

Table 2 Correlation in Non- Financial Sector

	Earnings per share	profitability	Financial leverage	Business growth rate	Size	Business risk
Earnings per share	1					
profitability	0.4872*	1				
Financial leverage	-0.1893*	-0.2940*	1			
Business growth rate	0.0057	0.0474	-0.1152	1		
Size	0.0267	-0.0124	-0.2758*	0.2038*	1	

	Earnings per share	**profitability**	**Financial leverage**	**Business growth rate**	**Size**	**Business risk**
Business risk	-0.0598	-0.3932*	0.3057*	-0.1028	-0.2249	1

The study also established the association among the variables within the financial sector. The results of the correlation matrix were as indicated in Table 3 below. From the results, it can be noted that most of the independent variables are showing coefficients with weak magnitude. There is a weak association between the independent variables in the financial sector. There is a positive and significant association between profitability and earnings per share. The association is, however, weak as indicated by a coefficient of 0.2878.The association among other variables in the financial sector is not significant. However, the results indicated that there was no problem of multicollinearity among the variables within the financial sector since no association had a value greater than 0.7.

Table 3 Correlation in Financial Sector

	Earnings per share	Profitability	Financial leverage	Business growth rate	size	Business risk
Earnings per share	1					
profitability	0.2878*	1				
Financial leverage	-0.0421	0.0819	1			
Business growth rate	-0.0074	-0.0695	0.0221	1		
Size	0.1498	0.1657	0.1224	0.1434	1	
Business risk	-0.1028	0.1906	-0.0229	-0.1171	-0.1286	1

The study finally established the association among the variables in the two sectors combined and the results are as indicated in Table 4 below. There was a positive and significant association between profitability and earning per share.The association is, however, stronger as compared to the same association when the sectors are separated. When the sectors are combined, the association between financial leverage and earning per share and

profitability is negative and significant. As shown when the two sectors are separate, there was still no problem of multicollinearity in the combined sectors. The study proceeded on to test for the presence of unit roots in the data before running the regressions.

Table 4 Overall Correlation

	Earnings per share	Profitability	Financial leverage	Business growth rate	size	Business risk	financial sector dummy
Earnings per share	1						
Profitability	0.4643*	1					
Financial leverage	-0.1826*	-0.3203*	1				
Business growth rate	0.0051	0.046	-0.1097*	1			
Size	0.0035	-0.1674*	-0.0586	0.1295*	1		
Business risk	-0.0476	-0.2923*	0.2276*	-0.0892	-0.3557	1.0000	
Financial sector dummy	-0.0296	-0.2347*	0.1921*	-0.0213	0.6868	0.2926*	1

Unit Root Tests

Most economic variables are usually non-stationary in nature and prior to running a regression analysis; unit root tests were thus conducted using the Levin-Lin-Chu (LLC) test to establish whether the variables were stationary or non-stationary. The purpose of this is to avoid spurious regression results being obtained by using non-stationary series. Results in Table 5 below indicate that all variables are stationary (i.e. no presence of unit roots) hence there was no need of first differencing.

Table 5 Unit Root Test

Variable Name	LLC Adjusted t* Statistic	p-Value	Conclusion
Amount of Dividend Paid	-67.3661	0.0000	Stationary
Earnings per share	-9.5596	0.0000	Stationary
Profitability	-3.8192	0.0001	Stationary
Business Growth rate	-28.5326	0.0000	Stationary
Size	-2.2492	0.0122	Stationary
Business Risk	-7.3394	0.0000	Stationary

Having established that there was no problem of multicollinearity and presence of unit root, the data was deemed good to be used in to testing the relationship between the predictor and the dependent variable through the random effect probit and random effect Tobit regression models as presented in below.

Random Effects Tobit Regression Results.

Table 6 indicates the results of Random effects Tobit regression model by integration method used in the study. The significance of the model was tested using F-statistic prob >chi^2 that was significant as shown by a value of 0.000.This means that the overall model fits significantly well the dataset. The results of the random effects To-bit model indicate a positive and significant relationship between EPS and amount of dividend paid implying that a one unit increase in EPS increases the amount of dividend paid by 0.1665.Likewise, a one unit decrease in EPS decreases the amount of dividend paid by 0.1665.There is also a positive and significant relationship between profitability and amount of dividend paid. A one unit increase in profitability of the firm increases the amount of dividend paid by 37.4498 units. Financial leverage and business risk had a negative and significant relationship with the amount of dividend paid. The implication is that a one unit increase in financial leverage decreases the amount of dividend paid by 9.0938 units while a one unit increase in business risk decreases the amount of dividend paid by 50.4998 units. There was, however, a negatively insignificant relationship between business growth rate and the amount of dividend paid by the firms listed on NSE. The results also indicated that the relationship between size, financial sector dummy and the amount of dividend paid were insignificant. However, there is a negative relationship between the financial sector dummy and the decision to pay but a positive relationship with the amount of dividends paid.

Table 6 Random Effects Tobit Regression Results

				Wald chi2(7) = 80.15		
				Prob > chi2 = 0.0000		
Amount of dividend payout	Coefficient	Std. Err.	Z	P>|z|	[95% Conf. Interval]	
					Lower	Upper
Earnings per share	0.166517	0.054388	3.06	0.002	0.059918	0.273116
Profitability	37.44989	9.469098	3.95	0.000	18.8908	56.00898
Financial leverage	-9.0938	2.447309	-3.72	0.000	-13.8904	-4.29716
Business growth rate	-2.00611	1.028764	-1.95	0.051	-4.02245	0.010232
Size	0.155309	0.319369	0.49	0.627	-0.47064	0.78126
Business Risk	-50.4999	12.33454	-4.09	0.000	-74.6751	-26.3246
Financial sector dummy	0.664467	3.435609	0.19	0.847	-6.0692	7.398136
Constant	14.9895	6.190543	2.42	0.015	2.856258	27.12274

Conclusions

The purpose of the study was to investigate the factors influencing dividend payout decision of financial and non-financial companies listed on Nairobi securities exchange consistently since 2003 to 2012.The study sought to investigate the factors influencing both the amount of dividend paid and the decision to pay. The study used random effects probit and Tobit model to find out the relationship between predictor and dependent variable. Based on the findings, the study concluded that EPS, financial leverage, and business risk play a key role in making the decision to pay or not to pay dividends. Earnings per share positively influences the decision to pay while both financial leverage and business risk influences the decision to pay dividends negatively. EPS and profitability plays a key role in positively determining the amount of dividend to pay while financial leverage and business risk plays a key role in negatively determining the amount of dividend to pay. The study concluded that profitability positively and significantly influences the amount of dividend paid but positively and insignificantly influences the decision to pay. This implies that profitability influences the amount of dividends paid but not the decision to pay.

The study also concluded that business growth rate, the moderating effect of size of the firm and financial sector dummy have an insignificant influence on the decision to pay or not to pay dividend and the amount of

dividends to paid. Lastly, the study concluded that financial sector dummy has an insignificant negative relationship with the decision to pay but an insignificant positive relationship with the amount of dividends paid. This suggests that the probability of paying dividend is lower in the financial sector relative to non- financial sector. But if the decision to pay dividend is made the amount is higher.

Recommendations

Following the findings and conclusions, the study recommended that both current and potential investors who are predicting future dividends to be paid should take note of the firm's financial leverage, business risk, profitability and EPS. They should expect a decision of not being paid dividends when the firm's have high business risk and financial leverage and expect a decision of being paid dividends when the firm's have high EPS.Investors should not rely on profitability when predicitng the decision to pay dividends. Another recommendation made by the study is that managers should incorporate policies to pay low amounts of dividends when their firms have high leverage and business risk and pay more dividends when profitability and EPS are high. However, they should not necessarily consider business growth rate in paying dividends. The study also recommended that the government should make policies that encourage dividend payout when there is a need to raise more revenue from dividend withholding tax.

Conflict of Interest

No potential confict of interest was reported by the authors

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