

## **Factors that Determine Dividend Payout. Evidence from the Financial Service Sector in South Africa**

**Samuel Tabot Enow<sup>1</sup>, Isaacs Eslyn B. Hugh<sup>2</sup>**

**Abstract:** Dividend payout signals good news to investors. Firms' that pays out dividends demonstrate that they have enough cash to distribute the excess to shareholders while investing in profitable projects. This study investigated the factors that determine dividend payout using ten companies listed in the financial service sector from 2012-2016. Using a multiple regression analysis, the result reveals that return on asset, return on equity and earnings per share, accounts for only 57% of dividend payout movements. Furthermore, only the earnings per share are significantly positively correlated to dividend payout while return on asset and return on equity was not. This finding implies that, firms in the financial service sector in South Africa have been distributing dividends to their shareholders from their earnings and other sources, which might possibly be from borrowing. This finding is contrary to the theory suggested by finance literature.

**Keywords:** dividend payout; return on asset; return on equity; Earnings per share; financial service sector

### **1.1. Introduction**

Dividend policy is and will remain an integral part of a financial policy. Brealey and Myers (2002) is of opinion that dividend policy is a very complex financial management topic and is among the top ten puzzles in finance literature. Dividend policy has several implications from both the firms' perspective and the shareholders' view point. From the firm's perspective, dividend policy is vital because it determines the total amount of funds to be paid to investors in the form of cash dividends and the fraction that is retained in the firm for operational and investment purposes (Ross et al., 2002).

Retained earnings represent an important source of internal financing which is readily available to the firm and is cheaper than the other sources of financing. From an investors view point, dividend pay-out represents an important source of cash flow and sends positive signals about the firm's future growth prospects (Gitman, 2005). Horn and Wachoivcz (1995) points that cash dividend payment may resolve uncertainty amongst investors regarding the future performance of the firm. According to Malombe (2011), cash dividend payment provides a far greater share of investors return than capital gain, this was evident in the United States of America where the total returns from 2000 to 2011 of securities in the Standard & Poor 500 (S&P 500) and the Russell 3000 were examined. One important observation was that cash dividend made up the lion's share of the total return.

According to Kostyuk (2006), securities that pay higher dividends tend to have higher dividend yields which usually results in long term earning growth. According to Chhatoi (2015), high or

---

<sup>1</sup> Lecturer, University of Western Cape, School of Business and finance, South Africa, Corresponding author: enowtabot@gmail.com.

<sup>2</sup> E-mail: eisaacs@uwc.ac.za.

regular dividend implies that the firm has a benchmark for performance which increases the overall financial position of the firm. In addition to the fact that cash dividend offers a reliable source of earning, investors prefers certainty in the form of dividends than future capital gain which is perceived to be risky.

Considering the relative importance of cash dividend to investors and value of a firm, it is imperative to investigate the factors that affect dividend pay-out in South African firms, more specifically, the financial service sector. Finance literature suggests that dividend pay-out is positively correlated to earnings. In other words, firms turn to pay-out more dividends when their earnings increase. However, it might not always be the case, some firms incur huge amounts of debts to pay out dividends just to keep their shareholders happy. In the process of paying out dividends from debts, these businesses in turn go bankrupt. Prior research by Je Jager (2011) shows that, South African businesses paid out dividends from revaluing their liabilities. Although Je Jager's (2011) study was important, it mostly focused on fair value accounting and dividend policy. In South Africa, little or no research has been conducted in this area, therefore there exist a paucity of research in this area of finance. This study seeks to investigate the determinants on dividend pay-out of firms in the financial service sector.

## **1.2. Problem Statement**

As already mentioned, finance literature suggest that dividends should be paid from earnings. In addition, the residual theory of dividends suggests that, dividends should be paid only after a firm has meet it financing needs and exhausted a profitable projects (Komrattanapanya & Suntrauk, 2013). However, firms in the financial service sector in South Africa have been paying out dividends even though some companies have actually not been profitable. Considering that the importance of cash dividend to investors and how it affects a firm's value, it is imperative that the factors that affect dividends payout be investigated.

## **1.3. Research Question**

The research question to be answered in this study is; what are the factors that influences dividend pay-out in the financial service sector?

### **1.3.1. Objectives**

The main objectives of this study are to;

Determine the relationship between dividend a pay-out and firms profitability in the financial service sector; and

Examine the extent of the association between dividend pay-out and profitability.

## **1.4. Literature Review**

As already mentioned, to-date, the factors dividend payout on profitability remains an important topic in finance literature, and it is still relevant in the financial market (Hafeez & Ahiya, 2009). Despite the numerous studies conducted on dividend dynamics there hasn't been an acceptable

explanation of the main factors that affect dividend payout. There have been a lot of studies conducted on this topic in other countries but little or no research exist in this area in South Africa. One of such studies was conducted by Rafique (2012) to examine the factors that determine dividend payout for 53 companies in the Karachi stock exchange in Pakistan. Dividend payout was used as the dependent variable and Earnings, Firm Size, growth, corporate tax and financial leverage was used as the independent variables. The relationship was tested using a panel data for 6 years (2005-2010). Using a multivariate regression analysis, the results showed that only corporate tax and firm's size had a significant relationship with dividend payout. This implies that firms in Pakistan tend to pay higher dividends when they increase in size and pay lesser tax. Despite the relevance of this study, it was conducted in Pakistan and its findings might not be relevant to South Africa.

In another study to investigate the relation between dividend pay-out and profitability, Hasan, Ahmad, Rafiq and Rehman (2015) selected a sample of 2 Pakistani firms one from the Fuel and Energy sector and the other from the Textile sector. The authors used dividend pay-out as the dependent variable and return on assets, earnings per share as independent variable. The regression analysis used showed a negative relationship between dividend pay-out and earnings which was significant at 5%. In other words, decreasing profitability of firm measured in terms of earnings per share will increase dividend pay-out. The authors concluded managers can maximize shareholders value by decreasing dividend pay-out. However, there are several limitations to this study, firstly, the study used only 2 firms, a very small sample which might not be representative of all the firms. Secondly, the effect of return on asset on dividend pay-out was not reported in the study and thirdly, the study was conducted in Pakistan (Asia) and therefore, its findings may not be applicable in South Africa.

In another Asian study, Ajanthan (2013) used 16 hotels and restaurants listed on the Colombo stock exchange during a period 2006 to 2011 to investigate the relationship between dividend pay-out and firms profitability in Sri Lanka. Using a correlation and regression analysis, the results indicated that there is a significant relationship between dividend payout and a firms' profitability. The authors also found that 52.6% of the variability of profitability can be explained by dividend pay-outs. This reveals that dividend payout is relevant and managers need to pay attention and devote valuable time in designing their dividend policies to increase their profitability.

Elsewhere in Asia, Fitri, Hosen, and Muhari (2016) also examined the relationship between firms' performance and dividend payout ratio using 30 firms listed on the Indonesia stock exchange from 2009 to 2014. Also using a regression analysis, their findings revealed that the coefficient of asset growth was negatively correlated to dividend payout but ROA was positively correlated to dividend payout. Therefore, the authors concluded that managers need to consider carefully the impact of external factors on a firms' profitability.

In an African study, Uwuige, Jafaru and Ajayi (2012) also investigated the relationship between the financial performance and dividend payout for a panel made up of a sample of Nigerian quoted non- financial firms from 2006 to 2010. The authors also used a pooled regression to analyse this effect. The study showed a significant positive relationship between firms' performance and dividend payout. In addition, this study also revealed that there is a significant relationship between ownership structure, firms' size and dividend policy. The authors concluded that managers should seek for ways to continually increase their dividend payout in order to maximise shareholders wealth.

In another African study, Malombe (2011) contributed to the dividend puzzle literature by investigating the effect of profitability on dividend policy of not for profit and not for charity financial firms in Kenya. The authors used a sample of 30 licensed firms over a period of 5 years. Their results showed a positive relationship between dividend policy and profitability. The author concluded a constant percentage of the firms earnings be distributed in the form of dividend as it will create certainty to shareholders which will increase the value of the firm.

Although informative, the abovementioned studies were conducted in Asia and West Africa and didn't clearly indicate the main factors that affect dividend payout. Moreover, the studies that analysed the factors that affect dividends payout where not conducted in South Africa and their findings may not be applicable in the South African context. This will fill the research gap in South Africa.

### 1.5. Hypotheses Development

From the literature, the following hypothesis was developed and will be tested in this study;

H<sub>1</sub>: there is a significant relationship between dividend pay-out (DPO) and return on asset (ROA), return on equity (ROE) and earnings per share (EPS)

H<sub>2</sub>: there is no significant relationship between dividend pay-out (DPO) and return on asset (ROA), return on equity (ROE) and earnings per share (EPS). In this case, if dividend is paid out, it should be from debt.

### 1.6. Research Methodology

To achieve the main aim of the study, the annual financial statements of 10 firms in the financial service sector for a five year period (2012- 2016) will be analysed. This sample was selected because they were the only firms in the sector that had paid dividends during that period under review.

#### 1.6.1. Data Analysis

The data collected was analysed using the Statistical Package for Social Science (SPSS) version 17. This data analysis tool was selected because of its convenience in automating tasks, such as data cleaning and provides wide expansive data analysis options. SPSS offers the option to easily perform hypothesis testing, T-testing, ANOVA and correlation test analysis (Leedy & Ormond, 2001).

#### 1.6.2. Model Specification

The model below was used in this study to investigate the relationship between the dependent variable (dividend pay-out) and the independent variable (ROE, ROA, EPS)

$$DPO_{it} = \beta_0 + \beta_1 ROA_{it} + \beta_2 ROE_{it} + \beta_3 EPS_{it} + \zeta_t$$

DPO<sub>it</sub> = Cash dividend paid out in time t

ROE<sub>it</sub> = Return on equity for the firm at time t which was used as a proxy for

Performance and is measured as net profit after tax divided by shareholders equity.

$ROA_{it}$  = Return on Asset for the firm at time t which was also used as a proxy for

Performance and is measured as net profit after tax divided by total

$EPS_{it}$  = Earnings per share for the firm at time t which was used as a proxy for

Performance and is measured as net profit after tax divided by number of ordinary shares

## 1.7. Data Analysis

**Table 1. Descriptive statistics**

|         | Statistic | Minimum    | Maximum    | Mean     | Std Deviation | Skewness  | Kurtosis  |
|---------|-----------|------------|------------|----------|---------------|-----------|-----------|
|         | Statistic | Statistics | statistics |          | Statistic     | Statistic | Statistic |
| Div     | 50        | .0000      | 5.7800     | 1.931080 | 1.6009762     | .796      | -.634     |
| EPS     | 50        | .9000      | 27.7900    | 8.428644 | 6.4131193     | 1.103     | .687      |
| ROA     | 50        | .0024      | .2480      | .042144  | .0570555      | 2.112     | 3.918     |
| ROE     | 50        | .0128      | .9624      | .158418  | .1346520      | 4.417     | 26.322    |
| Valid N | 50        |            |            |          |               |           |           |

Source: Spss output

Table 1 above shows the descriptive statistics of the panel data collected from 2012 to 2016. The aim of descriptive statistics is to describe the properties of a sample data in a meaningful way which allows for easier interpretation of the data. The descriptive statistics shows that the mean dividend pay-out amongst firms in the financial service sector is R1.93. Furthermore, the mean value for EPS, ROA and ROE where R8.44, 4.2% and 15.84% respectively for the firms under consideration.

**Table 2. Person's correlation for sampled firms**

|     | Correlations |       |      |     |
|-----|--------------|-------|------|-----|
|     | Div          | EPS   | ROA  | ROE |
| Div | 1            |       |      |     |
| EPS | 0.768**      | 1     |      |     |
| ROA | -0.106       | -.032 | 1    |     |
| ROE | -0.129       | -.230 | .086 | 1   |

\*\* . Correlation is significant at the 0.01 level (2-tailed).

Source: Spss output

The table above presents the correlation analysis between dividend pay-out and the firms' performance. The result shows that the relationship between dividend pay-out and EPS is significant at 1%. This implies that there is a strong relationship between dividend pay-out and EPS. Therefore, an increase in EPS will result in an increase in dividend pay-out with a correlation coefficient of 0.768. Additionally, the results also show that ROA and ROE are negatively correlated to DPO, however, this negative correlation is insignificant. Therefore, it can be inferred that there is no relationship between DPO, ROA and ROE.

**Table 3. Model Summary<sup>b</sup>**

| Model | R                 | R Square | Adjusted R Square | Std. Error of the Estimate | Change Statistics |          |     |     |               | Durbin-Watson |
|-------|-------------------|----------|-------------------|----------------------------|-------------------|----------|-----|-----|---------------|---------------|
|       |                   |          |                   |                            | R Square Change   | F Change | df1 | df2 | Sig. F Change |               |
| 1     | .775 <sup>a</sup> | .600     | .574              | 1.0447359                  | .600              | 23.023   | 3   | 46  | .000          | 2.289         |

a. Predictors: (Constant), ROE, ROA, EPS  
b. Dependent Variable: Div

Source: Spss output

**Table 4. ANOVA<sup>a</sup>**

| Model |            | Sum of Squares | df | Mean Square | F      | Sig.              |
|-------|------------|----------------|----|-------------|--------|-------------------|
| 1     | Regression | 75.385         | 3  | 25.128      | 23.023 | .000 <sup>b</sup> |
|       | Residual   | 50.208         | 46 | 1.091       |        |                   |
|       | Total      | 125.593        | 49 |             |        |                   |

a. Dependent Variable: Div

b. Predictors: (Constant), ROE, ROA, EPS

*Source: Spss output***Table 5. Coefficients<sup>a</sup>**

| Model |            | Unstandardized Coefficients |            | Standardized Coefficients | t     | Sig. | Collinearity Statistics |       |
|-------|------------|-----------------------------|------------|---------------------------|-------|------|-------------------------|-------|
|       |            | B                           | Std. Error | Beta                      |       |      | Tolerance               | VIF   |
| 1     | (Constant) | .285                        | .349       |                           | .817  | .418 |                         |       |
|       | EPS        | .194                        | .024       | .779                      | 8.131 | .000 | .947                    | 1.056 |
|       | ROA        | -2.419                      | 2.626      | -.086                     | -.921 | .362 | .992                    | 1.008 |
|       | ROE        | .689                        | 1.143      | .058                      | .603  | .549 | .941                    | 1.063 |

a. Dependent Variable: Div

*Source: Spss output*

The data collected was tested for autocorrelation using Durbin-Watson and multicollinearity between the variable using variance inflation factor (VIF). The purpose of Durbin-Watson is to detect the presence of predicted errors from the regression analysis. As a rule of thumb for a relatively normal data, values of Durbin-Watson should be between 1.5 to 2.5. Values below 1.5 and above 2.5 could be a cause for concern (Saunders & Thornhil, 2003). From table 3, the Durbin Watson is 2.289 indicating no autocorrelation problems. With regards to VIF, the acceptable values range from 1 to 10. From table 5, the VIF is greater than 1 indicating the absence of multicollinearity.

The finding from the regression analysis indicates that, from the model, the coefficient of determination which is referred to as R squared ( $R^2$ ) was 0.6.  $R^2$  is used to determine how well the data is fits in the regression line, in order words the overall fitness of the model (Wegner, 2007). This implies that the model is able to explain 60% of the variability of the firms' DPO. Therefore 40% of variation in DPO is accounted for by other factors not captured in the model. The analysis also revealed that the adjusted  $R^2$  value is 0.574. This implies that only 57% of dividend payout is accounted for by EPS. This finding implies that 42.6% of cash dividends is probably from debt. Table 5, the t-statistics value (P-value) between DPO and EPS is 0.00, and 0.362 and 0.549 between DPO, ROA and ROE respectively. This implies that the relationship between DPO and EPS is statistically significant but insignificant between ROA and ROE as already highlighted in table 2.

## 1.8. Conclusion

As already indicated, the objective of this study was to determine the factors that affect DPO and ROA, ROE and EPS firms' performance where was used as measures of performance. From the findings, it was observed that only a firm's EPS has a significant impact on DPO and accounts for only 43% of dividend payout. This result is contrary to the study of Rafique (2012) who found that DPO is entirely dependent on corporate tax and firm's size. In another study by Forti,

Peixoto, Alves (2015), the authors found that DPO is as results of profit growth, market value and firm's size.

The finding of this study is also contradicts the study of Fitri et al. (2016) found that ROA is significantly positive to DPO. This study therefore uncovers new insight in the South African context in that ROA and ROE are insignificantly correlated to DPO. Therefore managers should deploy aggressive marketing and other strategies to increase the firms' profitability to increase EPS which will enhance DPO.

Despite the significance of this study, an important limitation is that the sample size used was small. Further research with regards to dividend-payout and profitability using a larger sample could shed better light on these phenomena.

### 1.9. Contributions of the Study

This study has contributed to the body of knowledge on dividend payout literature. It is amongst the few studies conducted in the South African context to investigate the factors that affect dividend pay-out. In addition, this research informs shareholders in the financial service sector on the actual sources of dividends pay-out. Paying dividends from sources other than earnings will affect the firm negatively in the long run. Therefore, regulators such as the financial service board should implement legislations in other to restrict these firms from paying out dividends from source other than earnings.

### References

- Ajanthan, A. (2013). The relationship between dividend payout and firm profitability: A study of listed Hotels and restaurant companies in Sri Lank. *International Journal of Science and research publications*, 3(6), pp. 1-6.
- Brealey, R. & Myers, S. (1991). *Principles of Corporate Finance*. 5<sup>th</sup> Edition, Irwin- McGraw-Hill.
- Chhatoi, P.B. (2015). A study on relationship between profitability and dividend payment in Iron & steel industries in India. *Pacific Business Review International Journal*. 8(1), pp. 70-78.
- Fitri, R.R.; Hosen, M.N. & Muhari, S. (2016). Analysis of factors that impact dividend Payout on listed companies at Jakarta Islamic Index. *International Journal of Academic Research in Accounting, Finance and management science*. 6(2), pp. 87-97.
- Gitman, L.A. (2005). *Principles of Managerial Finance*. 11<sup>th</sup> Edition. New York: Addison Wesley Publishers.
- Hafeez, A. & Attiya, Y.J. (2009). The Determinants of Dividend Policy in Pakistan. *International Research Journal of Finance Economics*. 25, pp. 148-171.
- Hasan, M.; Ahmad, M.I.; Rasiq, M.Y. & Rehman, R.U. (2015). Dividend payout and firm's Profitability. Evidence from Pakistan. *Journal of scientific research publishing*, (5), pp. 441-445.
- Horne, J.C. & Wachwicz J.M. (2000). *Fundamentals of Financial Management*. 11<sup>th</sup> Edition, Prentice Hall Inc.
- Kostyuk, D. (2006). Dividend payout. Its impact on firm value. *Publish dissertation* submitted in partial fulfillment of for Master of Arts in Economics. National University Kyiv-Mohyla Academy.
- Leedy, P.D. & Ormond, J.E. (2001). *Practical research*. New Jersey: Merrill Prentice Hall.
- Malombe, M. (2011). The effects of dividend policy on profitability of SACCOs with FOSAs in Kenya. *Publish dissertation* submitted for Master in Business Administration. University of Nairobi.

Miller, M.H. & Modigliani, F. (1961). Dividend Policy, Growth, and the Valuation of Shares. *Journal of Business*. 3(34), pp. 411-433.

Ross, S.A.; Westerfield, R.W. & Jaffe, J. (2002). Corporate Finance. 6<sup>th</sup> Ed. shares. *Journal of Business*. (34), pp. 411-433.

Saunders, M.; Lewis, P. & Thornhil, A. (2003). *Research Methods for Business Student*. 3<sup>rd</sup> Edition, Prentice Hall.

Uwugbe, U. & Jafaru, J. (2012). Dividend policy and firm performance: A study of listed firms in Nigeria. *Accounting and management information systems*, 11(3), pp. 442-454.

Wegner, T. (2007). *Applied Business statistics*. 2<sup>nd</sup> Edition, Juta.

Yegon, C.; Cheruiyot, J. & Sang, J. (2014). Effect of dividend policy on firms' financial performance: Econometric analysis of listed manufacturing firms in Kenya. *Research Journal of Finance and Accounting*, 5(12), pp. 136-144.