Journal of Finance and Accounting



Stock Exchange Market Capitalization and Financial Performance of Firms in Rwanda Stock Exchange: A Survey of Listed Firms in Rwanda

Mr. Mbituyimana Jeanluc & Dr. Paul Munene Muiruri

ISSN: 2616-4965



Stock Exchange Market Capitalization and Financial Performance of Firms in Rwanda Stock Exchange: A Survey of Listed Firms in Rwanda

1*Mr. Mbituyimana Jeanluc & ²Dr. Paul Munene Muiruri
 1*Department, Business Administration, Mount Kenya University, Rwanda
 2PhD, Department, Business Administration, Mount Kenya University, Rwanda

How to cite this article: Jeanluc M., & Muiruri, P., M. (2022). Stock Exchange Market Capitalization and Financial Performance of Firms in Rwanda Stock Exchange: A Survey of Listed Firms in Rwanda. *Journal of Finance and Accounting*, 6(2), 22-40. https://doi.org/10.53819/81018102t5057

Abstract

Capital markets contribute enormously to economic development as they give room to amassing capital for investment and growth. Financial markets are considered to be the long-term sources of funds for most firms and thus the backbone of the economy of most developing countries. Hence, the study assessed the effect of stock exchange capitalization on the financial performance of the public companies listed in Rwanda Stock Exchange Market. The study was focused on the effect of share price, share value and financial literacy on the financial growth of listed firms in Rwanda Stock Exchange. This research used descriptive research design. The companies under consideration were the primary stakeholder of the RSE totaling to 14 firms, which included Capital Market Authority, Rwanda Stock Exchange, the 9-brokerage firms and the 3 cross listed firms in the RSE employing 97 workers. A sample size of 67 participants were selected from the 97 workers, 100 other informants identified purposively. The study used both primary and secondary data. The primary data was collected using structured questionnaires both open and closed. The data was analyzed using qualitative and quantitative method. SPSS was used to analyze data. Research findings showed that share value had a moderate negative correlation (-0.572 and P value =0.00) with financial performance. Financial literacy has moderate positive correlation (0.568 and P value =0.00) with financial performance. It was indicated that share value, share price and financial literacy contributes to 67.2% of the variations in the financial performance of firms in Rwanda stock exchange Kigali. The market capitalization of the domestic companies was larger than that of cross-listed, and return on equity of the domestic firms was better than for the cross-listed companies. Generally, the Rwanda stock exchange did not perform any better than the domestic firms though overall the public awareness, technology and regulation framework positively correlated with financial performance of the Rwanda stock exchange. The recommendation is that more awareness strategy needed to be devised to increase public awareness of investors and Rwanda stock exchange need to be motivated by other factors.

Keywords: Stock exchange market, financial performance, Rwanda stock exchange, listed firms, Rwanda

Stratford Peer Reviewed Journals and Book Publishing Journal of Finance and Accounting Volume 6//Issue 2//Page 22-40//May//2022/ Email: info@stratfordjournals.org ISSN: 2616-4965



1.0 Introduction

According to Alvan and Hosseini (2008), capital markets contribute enormously to economic development as they give room to amassing capital for investment and growth. They also greatly help in financial growth by increasing funds in the long term for further investment (Altman, 2008). Ever since the 1990s, many capital markets in Africa have come up. Before 1989, there were only eight stock exchange markets in the whole of Africa (Ihejirika, 2015). Today, over 50% of the 54 countries in Africa have formed stock exchanges. Although the continent has shown remarkable financial growth since 2001 with continental annual average financial growth in excess of 5% for the past seven years, a lot still needs to be done to lift the continent from lingering poverty, unemployment and overall economic underdevelopment. To sustain the current level of financial growth and encourage both domestic and foreign investment in the continent, Africa needs to rapidly expand, develop and modernize its financial markets.

Evidence from the recent economic studies suggests deeper, broader, and better functioning financial markets can stimulate financial growth (Gakeri, 2011). This rapid growth of stock exchanges led to various economic developments. They for instance led to the privatization process, financial services were diversified, they facilitated capital mobilization, alternative investment opportunities were provided and more capital inflows from foreign countries were (Alvan & Hosseini, 2008). In Africa, the stock exchange markets are very small and are characterized by low liquidity levels as per global standards. They normally keep on changing between 10% and 20% of the GDP. Their markets also tend to be very small in comparison with their economies. Even older markets in countries like Zimbabwe, Kenya and Nigeria are small compared to their economies. The smallness of the markets explains the reasons why many institutional investors are hindered from participating in the African markets (Dudley & Hubbard, 2004). In most recent times, the financial growth of the region to the South of the Sahara increased from 1.4% in 2016 and reached 2.7% in the following year (2017).

It was projected to amount to 3.3% in 2018 following economic recovery in countries like Nigeria and Angola due to oil prices increase and improvement in weather conditions that favored the agriculture sector of the economy. In the East African Community, financial growth continued to expand in 2017 regardless of some critical challenges resulting from poor weather. For countries like Kenya, Rwanda and Tanzania, financial growth remained robust, although it fell below the 2016 level (Dudley & Hubbard, 2004). Having undergone a series of reforms, most of East African stock markets have been attracting many foreign investors and this has contributed to their rapid expansion. Despite this rapid increase, these markets have not lived to their expectations in terms of performance (Shivji, 2010). For example, in the existing fifteen African stock exchange markets that were examined in 2010, it was only in Tanzania that a remarkable positive annual profit was registered. This saw an increment of 21% in comparison to 58% in case of Ghana. For the case of Kenya, it was the last in line with 35% decrease (Kenya Capital Markets Authority, 2010).

In Rwanda, the Rwanda Stock Exchange (RSE) started in 2011 with 60% of the shares being owned by brokers while the Government had 20% and the remaining 20% was in the hands of institutions (Rwanda Stock Exchange Report, 2017). Today, over 86% of the people of Rwanda have learned to save compared to 71% in 2012. This has been boosted by the introduction of Umurenge saving and credit cooperatives (SACCOs) - thereby enabling Rwandans to be financially sound. Today, the stock market index and shares have gone up to 0.16 and 0.02 points



to close at 134.22 and 133.31 respectively. Between 2014 and 2015, the number of shares more than doubled from 84.9 million to 187.4 million (RSE Report, 2017).

1.1 Research Objectives

- i. To assess the effect of share price on financial performance of firms in Rwanda stock exchange
- ii. To examine the effect of share value on financial performance of firms in Rwanda stock exchange
 - To analyze the effects of financial literacy on financial performance of firms in Rwanda stock exchange

2.0 Literature Review

2.1 Empirical Literature Review

2.1.1 Stock Exchange Market Capitalization

The study by Levine and Zervos (2008) posit that stock exchange influence positively the sales growth, diversification and increased the returns on the assets and returns on the general investment of the listed firms in developing company. All the independent variables under study show a positive correlation on financial growth. In a recent study carried out by Gursamy (2009), the study findings showed that well developed stock markets greatly influence the financial growth of listed firms in Ghana. Robert (2004) argues that financial growth is predicted by how firms conduct their stock exchange market and get capital share that would allow them the expansion of businesses and increased level of profitability. Kaminsky & Schmukler (2003) point out that the liberalization of the stock market is yet another key element that must be put into consideration as it enables the development of the stocks – thereby boosting economic development. According to Claessens et al (2001), stakeholders' protection is yet another important factor to consider. The countries that protect their stakeholders are in a better position to develop their stocks as investors tend not to fear because of expropriation. Macroeconomic environment is another factor favouring foreign investors, according to Osei (2008). This is because more and more foreigners tend to favour the creation and existence of stock markets. Serious measures must be put in place to avoid inflation and the eventual rapid depreciation of the currencies so that the capital base remains uncompromised.

2.1.2 Share price

Alvan & Hosseini (2008) assert that when stock prices are higher, this can lower the cost of capital for investment. This is because the firms, which have stock prices that are higher can easily, get cheap capital by selling off the newly acquired stocks. Mush as this may be true, when the investor buys stocks of a different a company hoping to make profits, sales and profits might reduce falls (Bawa & Yaroson, 2013). On a similar note, in a study carried out by Stock & Watson (2003), they revealed that stock prices can be used to predict the output. This finding is in line with that of Binswanger (2001) conducted a study and found that the performance of the predictive powers of the stock prices tend to have declined since 1980s onwards especially in most of the G7 countries.

Email: info@stratfordjournals.org ISSN: 2616-4965



2.1.3 Share Value

Al Shubiri (2010) studied the impact of macroeconomic and institutional determinants of stock market development in developing countries, using panel data analysis of 14 banks in the period from 2005 to 2008. Regression analysis was applied during the processing of secondary data from banks on the Amman Stock Exchange in Jordan. The study showed a significant positive correlation between the market stock price and net asset value per stock, dividend yield and gross domestic product, while the negative relationship was established between the market stock price and inflation, as well as the market stock price and interest rates on loans. Irfan and Nishat (2002) analysed the impact of six variables – dividends, payment ratio, company size, asset growth, leverage and return on assets on the stock price at the Karachi Stock Exchange in Pakistan in the period from 1981 to 2000. Panel data regression analysis used annual data in the financial statements of companies as a survey sample. They found that the payment ratio, company size and dividend yield are important factors in the stock price. Uddin et al (2013) investigated the impact of net asset value, earnings per stock, profit after tax and price-earnings ratio of 72 companies in the financial sector in Bangladesh during the period from 2005 to 2010 by using descriptive statistics and regression analysis. The study found out that the earnings per stock and net asset value are strong stock price determinants in all years, and showed a statistically significant positive relationship with stock prices. There was a positive but statistically insignificant relationship between net income, price-earnings ratio and stock price.

2.2 Theoretical Framework

The theoretical review outlines the theoretical foundation of this study. A theoretical study is one with findings focused on existing theories and hypotheses, but with little practical application in research. Empirical research one that has findings based on experiments, observations, and experiences. The theories that supported the study included capital structure theory, trade-off theory, pecking order theory, and empirical literatures

2.2.1 Modigliani and Miller Theory

Modigliani and Miller (MM), two professors in the 1950s, studied capital-structure theory intensely, and from their analysis, they developed the capital-structure irrelevance proposition (Miller, 1977). The two professors hypothesized that in perfect markets, the capital structure a firm uses to finance its operations never matters. They also theorized that the market value of a company is determined by its earning power and by the risk of its underlying assets, and that its value is independent of the way it chooses to finance its investments or distribute dividends. The basic M&M proposition is based on the following key assumptions, including no transaction costs, no taxes, no bankruptcy costs, and equivalence in borrowing costs for both companies and investors. It also assumes that symmetry of market information, that is, firms and investors have the same information, and the assumption that there is no effect of debt on a company's earnings before interest and taxes (Miller, 1977). Of course, in the real world, there are taxes, transaction 15 costs, and bankruptcy costs, differences in borrowing costs, information asymmetries and effects of debt on earnings. In order to understand how the M&M proposition works after factoring in corporate taxes, however, researchers ought to first understand the basics of M&M propositions I and II without taxes.



The M&M capital-structure irrelevance proposition assumes no taxes and no bankruptcy costs. In this simplified view, the weighted average cost of capital (WACC) should remain constant with changes in the company's capital structure. For example, no matter how the firm borrows, there was no tax benefit from interest payments and thus no changes or benefits to the WACC. Additionally, since there are no changes or benefits from increases in debt, the capital structure does not influence a company's stock price, and the capital structure is therefore irrelevant to a company's stock price. However, as stated earlier, taxes and bankruptcy costs do significantly affect a company's stock price. In additional papers, Modigliani and Miller included both the effect of taxes and bankruptcy costs (Miller, 1977). Taxes significantly influence cash flow in a negative way because they tend to reduce the amount of a firm's cash flow. As more taxes are levied on a company, its cash flow reduces. Cash flow is a crucial determinant of a firm's capital structure, hence, this implies that a reduction in cash flow is likely to result in a poor financial performance of a company. The researcher deems this theory important in assessing the effect of cash flow on financial performance of banks listed at the NSE, Kenya.

2.2.2 Trade-off Theory

The trade-off theory of capital structure is the idea that a firm chooses how much debt finance and how much equity finance to use by balancing the costs and benefits. The classical version of the hypothesis goes back to Kraus and Litzenberger (2011) who considered a balance between the dead-weight costs of bankruptcy and the tax saving benefits of debt. Often agency costs are also included in the balance. This theory is often set up as a competitor theory to the pecking order theory of capital structure. An important purpose of the trade-off theory is to explain the fact that corporations usually are financed partly with debt and partly with equity. It posits that there is an advantage to financing with debt, the tax benefits of debt and there is a cost of financing with debt, the costs of financial 16 distress including bankruptcy costs of debt and non-bankruptcy costs such as staff leaving, suppliers demanding disadvantageous payment terms, bondholder/stockholder infighting, among others (Frank & Goyal, 2011).

The marginal benefit of further increases in debt declines as debt increases, while the marginal cost increases, so that a firm that is optimizing its overall value will focus on this trade-off when choosing how much debt and equity to use for financing. As the Debt equity ratio (that is, leverage) increases, there is a trade-off between the interest tax shield and bankruptcy, causing an optimum capital structure, D/E*. Financial leverage is measured by dividing the amount of debt financing by equity. It is a determinant of capital structure that is likely to influence the financial performance of a firm since high debts come with more cost of financing the debt, a cost of financial distress that may lead to poor performance. The researcher therefore deems the trade-off theory important in assessing the effect of financial leverage on financial performance of banks listed at the NSE, Kenya.

2.2.3 Pecking Order Theory

Pecking order theory starts with asymmetric information as managers know more about their companies' prospects, risks and value than the outside investors do. Shareholders may not have this full knowledge within their reach. Asymmetric information affects the choice between internal and external financing and between the issue of debt or equity. There exists a pecking order for the financing of new projects (Matemilola & Bany-Ariffin, 2011). Asymmetric information favours the issue of debt over equity as the issue of debt signals the board's confidence that an



investment is profitable and that the current stock price is undervalued (were stock price overvalued, the issue of equity would be favoured). The issue of equity would signal a lack of confidence in the board and that they feel the share price is over-valued (Saeed, Gull & Rasheed, 2013).

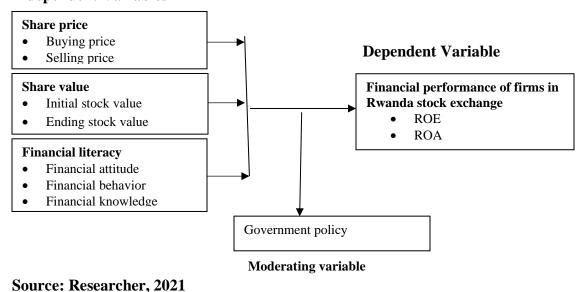
An issue of equity would therefore lead to a drop in share price. This does not however apply to high-tech industries where the issue of equity is preferable due to the high cost of debt issue as assets are intangible. Tests of the pecking order theory have not been able to show that it is of first-order importance in determining a firm's capital structure. However, several authors have found that there are instances where it is a good approximation of reality. Fama and French (2002) established that 17 some features of the data are better explained by the Pecking Order than by the trade-off theory. Goyal and Frank (2012) hypothesized that among other things, Pecking Order theory fails where it should hold, that is, for small companies where information asymmetry is presumably an important problem.

In this case, managers may benefit from the full knowledge information asymmetry and secure debts without the knowledge of the ordinary shareholders who exercise control of the company, in the sense when more equity goes towards capital financing than debt directors may lose confidence, specifically when stock prices are undervalued. When shares are undervalued, they tend to attract more shareholders because they are cheap and this results in dilution of control of the firm. More profits are also appropriated to the shareholders in the form of dividends and fewer earnings are retained for the future operations. The researcher therefore deems pecking order theory ideal in assessing the influence of control on financial performance of banks listed at the NSE, Kenya.

2.3 Conceptual framework

Figure 1: Conceptual Framework

Independent Variables



https://doi.org/10.53819/81018102t5057



The dependent variable is financial performance of firms in Rwanda stock exchange while independent variable is effect of stock exchange market capitalization which include share price we mean the largest amount an individual is willing and ready to pay for given stocks or the lowest amount at which stocks can be bought., Share values are the average closing trading prices for Measurement date, share values shall mean the price per share of stock paid by the acquirer in the change in control transaction while financial literacy refers to the ability to manage individual finances effectively and efficiently.

3.0 Research Methodology

The study applied an explanatory research design. According Mugenda and Mugenda (2003) explanatory research focuses on the why question. Explanatory research seeks to find relationship between variables (Kothari, 2004). Given its fundamental nature, explanatory research often explains the reason why the problem actually exists. Descriptive design was used to study the problem on effect of stock exchange market capitalization and financial performance of firms in Rwanda stock exchange that was not researched before which also demand a priority to be generated sot that the stock market in Rwanda is enhanced and developed. The target population of the study was derived from targets investors or owners of listed firms on RSE. The researcher targeted respondents from the classes of people that have substantial knowledge about the activities and trading of shares done at the RSE. These involved were staff from the three cross-listed companies, staff of Rwanda Securities Exchange, brokers and staff of the Capital Markets Authority of Rwanda. Table 1 summarizes the listed company with number of managers and sample size

Table 1: Listed company with number of Managers and sample size

	Company	Number of Managers
1	FAIDA Securities	5
2	DALLAS Securities exchange	5
3	African Alliance Rwanda	7
4	MBEA Brokerage	5
5	CDH Capital Ltd	4
6	CFC Stanbic	5
7	Core securities	7
8	Dyer and Blair	6
9	Kenya Commercial Bank	18
10	Nation Media Group	15
12	Equity Group Holdings limited	6
13	Bank of Kigali	14
	Other	100
	Total	197

Another 34 individuals were randomly sampled from 100 other participants in the stock market. These were identified by the advice of the mangers depending on their level of knowledge of the market. These provided additional information about the level of awareness of the capital market



activities. Therefore, in total the sample size comprised of 67 participants for this study. All firms that are listed under RSE was sampled. This indicates that a census is most useful in the data collection. In 8 listed firms, at least 2 shareholders were given a structure interview to gather data on how stock exchange affects the financial growth of their firms. Stratified sampling was employed in this study. Primary and secondary methods were used to collect the data. The study used both descriptive statistics and inferential statistic to analyze the data.

4.0 Research Findings

4.1 Socio-demographic characteristics of respondents

In this research project, a total sample of 67 respondents was assessed in the form of questionnaire and all were returned translating to 85.7% response rate. This associates well with Swann, (2006) study found similar response. The response rate found was adequate for analysis and discussions of the study. This socio-demographic trait revealed the frequency of socio-demographic characteristics, included sex, age, educational level and experience

4.1.1 Gender of Respondents

Research findings regarding the gender of respondents differ from one person to another. The information gender of respondents is presented in Table 2

Table 2: Gender of Respondents

		Frequency	Percent
	Male	48	72.2
Valid	Female	19	27.8
	Total	67	100.0

Source: Primary Data (2022)

The information collected from research participants showed that 48 respondents equivalent to 77.2% were male and they are more than female who are 19(27.8%) among surveyed respondents. The general observation of researcher with basis of research findings is that male were more than female in staff of Rwanda Securities Exchange, brokers and staff of the Capital Markets Authority of Rwanda.

4.1.2 Age Bracket

The summary of the age bracket of the respondents is summarized in Table 3

Table 3: Age Bracket

		Frequency	Percent
	21-35 years	11	16.7
	36-50years	32	48.6
Valid	51-65 years	18	26.4
	65 years and above	6	8.3
	Total	67	100.0

Source: Primary Data (2022)



The research findings in Table 3 showed that (48.6%), were generally in the age group of between 36-50 years. Respondents equivalent to 26.4% varied between 51-65 years' group width ,16.7% of surveyed respondents had the age 1-35 years while 8.3 % of respondents had the age above 65 years

4.1.3 Education Level

The respondents' educational level was examined so that its effect on the study may be established. People of low literacy level may find it difficult to interpret the questionnaire or asked questions correctly and this can affect the findings. The education of respondents was seen as important aspect of assessing the extent to which the assessed respondents contribution of stock exchange market capitalization and financial performance of firms in Rwanda stock exchange. Table 4 shows the results of the findings

Table 4: Education Level

Education level		Frequency	Percent
Other (Diploma) Bachelors' degree	31	46.2	
	Bachelors' degree	27	40.2
Valid	Master Degree	9	13.4
	Total	72	100.0

Source: Primary Data (2022)

As indicated in Table 4, research findings revealed that 46.2% of respondents who have completed diploma followed by 40.2% of surveyed respondents have completed bachelor's degree and 13.4% of respondents who have completed master's degree. Based on research findings, the overall conclusion is that staff of Rwanda Securities Exchange, brokers and staff of the Capital Markets Authority of Rwanda have knowledge on to stock exchange market capitalization and financial performance of firms in Rwanda stock exchange

4.1.5 Working Experience

Research findings regarding the time staying or working experience at of Rwanda Securities Exchange, brokers and staff of the Capital Markets Authority of Rwanda industry of respondents differ from one person to another. The information collected at staff of Rwanda Securities Exchange, brokers and staff of the Capital Markets Authority of Rwanda is presented in table 5 below

Table 5: Working Experience

Working	experience	Frequency	Percent
	1-2 years	12	18.0
	3-4 years	23	34.3
Valid	5-6 years	9	13.4
	6years and above	23	34.3
	Total	67	100.0

Source: Primary Data (2022)



As indicated in Table 5, the study findings showed that 34.3 % of respondents have worked in financial companies 3-4 years and 6years and above followed by minority of respondents of 13.4 % who have worked in Rwanda Securities Exchange as brokers and staff of the Capital Markets Authority of Rwanda between 5-6years. The general conclusion is that people working in Rwanda Securities Exchange as brokers and staff of the Capital Markets Authority of Rwanda have experience and have given required information pertaining research objectives

4.2 Descriptive Statistics

In this section, the presentation of research findings was based on research objectives such as to assess contribution of stock exchange market capitalization and financial performance of firms in Rwanda stock exchange. The results of findings were presented in the form of a table and brief narrative to interpret the different findings. All conclusions were given according to the research objectives. The results are shown in tables.

4.2.1 To assess the effect of share price on financial performance of firms in Rwanda Stock Exchange

This objective was to assess the effect of share price on financial performance of firms in Rwanda stock exchange. With this objective, researcher intended to assess extent to which share price on financial performance of firms in Rwanda stock exchange. The information collected are presented according to the degree of agreement and disagreement with Likert-type scale was used to rate their responses on a 5– point scale ranging from 1= 'Strongly Disagree', 2 = "Disagree", 3 = "Neither Agree nor Disagree", 4= "Agree" & 5 = "Strongly Agree" in the Table 6.

Table 6 : Effect of share price on financial performance of firms in Rwanda stock Exchange

Statements	Strongly agree	Agree	Un certain	Disagree	Strongly disagree	Mean	SD
	%	%		%	%		
A decline in share prices leads to financial decline	63.9	30.6	0	0	5.6	3.69	1.0185
A fall in share prices indicates an awareness of disrupted supply chains	26.4	30.6	5.3	27.8	0	4.208	0.7108
A fall in financial uncertainty contributes to economic decline	41.7	45.8	6.9	0	5.6	4.139	0.7374
A fall in share prices reflects an awareness of the disruption of the free movement of people and goods A fall in price reflects a shock to	59.7	22.2	0	12.5	5.6	3.486	0.8720
aggregate demand as consumers and businesses cut back on consumption	40.3	0	0	51.4	8.3	3.347	0.9217
A fall in share prices is a sign of economic decline	44.4	36.1	0	0	9.4	4.319	0.6463
A fall in share prices can lead to economic depression	12.5	31.9	26.4	22.2	6.9	4.014	1.1320
A fall in the share price makes a firm vulnerable to a takeover	13.9	51.4	8.3	13.9	12.5	3.236	1.1195

Source: Primary Data (2022)

Stratford Peer Reviewed Journals and Book Publishing Journal of Finance and Accounting Volume 6//Issue 2//Page 22-40//May//2022/ Email: info@stratfordjournals.org ISSN: 2616-4965



The research findings presented in Table 6 showed that 94.2% of the respondents agreed while 5.4% disagreed that a decline in share prices leads to financial decline with mean of 3.69 and standard deviation of 1.10185. on statement. A fall in share prices indicates an awareness of disrupted supply chains 57.2% agreed while 5.3% neither agreed nor disagreed while 27.8% disagreed with mean of 4.208 and standard deviation 0.7108. on statement that a fall in financial uncertainty contributes to economic decline 87.5% agreed, 12.5% neither agreed nor disagreed while 5.6% disagreed with mean of 4.139 and standard deviation 0.7374. On statement that a fall in share prices reflects an awareness of the disruption of the free movement of people and goods 81.9% agreed, 6.9% neither agreed nor disagreed while 5.6% disagreed with mean of 3.486 and standard deviation 0.8720.

A fall in price reflects a shock to aggregate demand as consumers and businesses cut back on consumption 40.3 % agreed, 51.4% neither agreed nor disagreed while 8.3 % disagreed with mean of 3.486 and standard deviation 0.8720 .On statement that a fall in price reflects a shock to aggregate demand as consumers and businesses cut back on consumption 40.3 % agreed , 51.4% neither agreed nor disagreed while 8.3 % disagreed with mean of 3.347 and standard deviation 0.9217. On statement that a fall in share prices is a sign of economic decline 44.4 % agreed, 36.1% neither agreed nor disagreed while 9.4 % disagreed with mean of 4.319 and standard deviation 0.6463. A fall in share prices can lead to economic depression 44.4 % agreed , 26.4% neither agreed nor disagreed while 29.1 % disagreed with mean of 4.014 and standard deviation 1.1320. A fall in the share price makes a firm vulnerable to a takeover 80.5 % agreed, 26.4% neither agreed nor disagreed while 9.4 % disagreed with mean of 4.319 and standard deviation 0.6463

4.2.2 To assess the effect of Share value on financial performance of firms in Rwanda stock exchange

This objective was to assess effect of Share value on financial performance of firms in Rwanda stock exchange. With this objective, researcher intended to assess extent to which Share value on financial performance of firms in Rwanda stock exchange. The information collected are presented according to the degree of agreement and disagreement with Likert-type scale was used to rate their responses on a 5– point scale ranging from 1= 'Strongly Disagree', 2 = "Disagree", 3 = "Neither Agree nor Disagree", 4= "Agree" & 5 = "Strongly Agree" in the Table 7



Table 7: effect of share Values on financial Performance of firms in Rwanda stock exchange

Statements	% Strongly agree	% Agree	% Uncertain	% Disagree	% Strongly disagree
A rise and fall in share values impacts on the firm's market capitalization	62.9	31.9	0	0	5.60
When there is a rise and fall in the share price values a firm's market value is affected	44.4	44.4	5.6	5.6	0
When share prices are high, the firm gets more worth in market value and the vice versa	61.1	19.4		13.9	5.6
A fall in share price values causes wider economic problems	9.7	4.8	9.7	0	0
Underperforming shares can lead to economic decline	61.1	19.4	13.9	5.6	0
An increase in share values leads to increased gross financial profits	44.7	45.8	9.7	0	0

Source: Primary Data (2022)

The research findings showed that 94.8% agreed while 5.6% disagreed that a rise and fall in share values impacts on the firm's market capitalization. on statement When there is a rise and fall in the share price values a firm's market value is affected 88.8% agreed while 5.6% neither agreed nor disagreed while 5.6% disagreed. on statement that when share prices are high, the firm gets more worth in market value and the vice versa 80.5% agreed while 19.5% disagreed On the statement that a fall in share price values causes wider economic problems 14.5% agreed while 9.7% neither agreed nor disagreed On the statement that underperforming shares can lead to economic decline 80.5% agreed while 13.9% neither agreed nor disagreed while 5.6% disagreed. Finally, on the statement that an increase in share values leads to increased gross financial profits.

4.2.3 To assess the effect of Share value on financial performance of firms in Rwanda stock exchange

This objective was to assess effect of financial literacy on financial performance of firms in Rwanda stock exchange. With this objective, researcher intended to assess extent to which financial literacy on financial performance of firms in Rwanda stock exchange. The information collected are presented according to the degree of agreement and disagreement with Likert-type scale was used to rate their responses on a 5– point scale ranging from 1= 'Strongly Disagree'', 2 = "Disagree", 3 = "Neither Agree nor Disagree", 4= "Agree" & 5 = "Strongly Agree" in the Table 8



Table 8: Financial literacy on financial performance of firms in Rwanda Stock Exchange

Statements	Strongly agree	Agree	Uncertain	Disagree	Strongly disagree	Mean	SD
	%	%	%	%	%		
I am knowledgeable on how shares are traded in RSE	6.9	63.9	9.7	8.3	11.1	4.33	1.3738
I know what dividends are and their benefits	0	0	31.9	68.1	0	2.86	04695
I understand the concept of share price	12.5	44.4	18.1	8.3	16.7	3.866	0.4695
I get information on price shares easily	16.7	69.4	13.9	0	0	3.986	1.0680
I am conversant with the concept of earning per share as used in the stock market	23.6	69.4	6.9	5.1	0	3.889	.7230

Source: Primary Data (2022)

The research findings presented in Table 8 showed that 72.8% agreed while 9.7 % disagreed that I am knowledgeable on how shares are traded in RSE with mean of 4.33 and standard deviation of 1.3738, on statement. On statement that I know what dividends are and their benefits 70.8% agreed while 9.7 % neither agreed nor disagreed while 19.4% disagreed with mean of 4.33 and standard deviation 1.3738. On statement that I understand the concept of share price 56.9% agreed while 8.3 % neither agreed nor disagreed while 16.7% disagreed with mean of 3.86 and standard deviation 0.4695. On statement that I get information on price shares easily 85.1% agreed while 18.1 % neither agreed nor disagreed while 16.7% disagreed with mean of 3.986 and standard deviation 1.0680. On statement that I am conversant with the concept of earning per share as used in the stock market 93% agreed while 16.9 % neither agreed nor disagreed while 5.1% disagreed with mean of 3.889 and standard deviation 0.7230. His finding confirms the results of Acquahsam and Salami (2013) in which the respondents who had much knowledge of the capital market participated more than those with little knowledge. They further found that the level of financial literacy influenced capital market participation and investment in capital market securities. And in the study of Bosire & Evode (2014) the financial performance of most listed companies in Rwanda Capital Market are being greatly affected by the level of public awareness



Table 9: Financial literacy on financial performance of firms in Rwanda Stock Exchange

Statements	% Strongly agree	% Agree	% Un certain	% Disagree	% Strongly disagree
The share outstanding of the cross listed companies is better than for domestic companies	34.3	16.4	26.9	6.0	16.4
The price of shares is favorable for cross listed companies Cross listed companies have a larger market	7.5 28.4	4.5 4 6.0	10.4 16.4	14.9. 25.4	62.7 1.5
cross listed companies have a larger market capitalization than domestic companies	28.4	4 6.0	16.4	25.4	1.5

Source: Primary Data (2022)

The response to the question comparing the share outstanding of the cross-listed and domestic companies revealed that 34(50.7%) disagreed, 18 (26.9%) did not commit while 15(22.4%) agreed with the question. This means that the majority of the respondents denied that there is ether the price of shares is favorable for cross-listed companies, 8(12%) disagreed, 7 (10.4%) did not comment, while 52 (77.6%) agreed with the statement. The implication is that the majority of the respondents view the prices per share favorable for cross-listed companies. Finally, the respondents were asked whether cross-listed companies have a larger market capitalization those domestic companies. To this 23(34.4%) disagreed, 17(25.4%) did not comment and 27 (40.3%) agreed with the statement. One respondent said "the market size of the cross-listed companies is bigger and so their market capitalization is also bigger when summed though when considered in Rwandan market alone, the foreign companies do not seem to be doing better than the domestic ones". The findings in this study contradict that of Onyuma, Mugo, and Karuiya (2012) that found out that the profitability and liquidity ratio of EABL improved after cross-listing however the shares outstanding declined. The same finding shows that Jubilee Insurance registered a significant improvement in its issued shares after cross listing.

4.3 Inferential Statistics

4.3.1 Correlation Analysis

Table 10 highlighted the relationship effect of stock exchange market capitalization and financial performance of firms in Rwanda stock exchange Kigali. study used both correlation, egression to establish relationship between the study variables. Therefore, Spearman correlation matrix where 0.1-0.3 is treated as moderate, 0.3-0.5 is treated as moderate, 0.6--0. 10 is treated as strong relation. The analysis is as follow.



Table 10: Relationship between stock exchange market capitalization and financial performance of firms in Rwanda stock exchange

Variables		Share price	Share value	Financial literacy	Performance
Share price	Pearson Correlation	1.000		<u>, </u>	
	Sig. (2-tailed)				
	N	100			
Share value	Pearson Correlation	0.713^{**}	1.000		
	Sig. (2-tailed)	0.000			
	N	67	67		
Financial	Pearson Correlation	-0.284	.273	1.000	
literacy	Sig. (2-tailed)	0.067	.085		
-	N	67	67	67	
Performance	Pearson Correlation	-0.704**	572**	.568**	1.000
	Sig. (2-tailed)	0.000	.000	.000	
	N	67	67	67	67

Source: primary data (2022)

The study results presented in Table 10 shows that correlation between stock exchange market capitalization and financial performance of firms in Rwanda stock exchange Kigali share price has strong negative correlation (-0.704 and P value =0.00). Share value has moderate negative correlation (-0.572 and P value =0.00) with financial performance of firms in Rwanda stock exchange Kigali. Financial literacy has moderate positive correlation (0.568 and P value =0.00) with financial performance of firms in Rwanda stock exchange Kigali.

4.3.2 Inferential Statistics

In order to ascertain the nature of the relationship between the independent and dependent variables of the study and establish the statistical significance of the hypothesized relationships, multiple regression analysis was used. This was performed using the field data and tested at 5% level of significance. The findings of the multiple regressions were summarized in the form of model summary, Anova and coefficient correlations as presented in Table 11 and Table 12:

Table 11: Model Summary

Model	R	R Square Adjusted R So		Std. Error of the				
				Estimate				
1	.710 ^a	.672	.345	.75905				
a. Predictors:	a. Predictors: (Constant), Share value, Share price and financial literacy							

According to the finding in Table 11 shows the relationship between stock exchange market capitalization and financial performance of firms in Rwanda stock exchange Kigal had a coefficient of 0.710 with a R square of 0.672. This means that the findings show strong linear, positive, and that share value, share price and financial literacy contribute 67.2% financial performance of firms in Rwanda stock exchange Kigali 20.2% is contributed by another factor. Table 12 shows the overall significance of the predictors in explaining stock exchange market capitalization and financial performance of firms in Rwanda stock exchange Kigali.

Volume 6||Issue 2||Page 22-40||May||2022|

Email: info@stratfordjournals.org ISSN: 2616-4965



Table 12: ANOVA

Model		Sum of Squares	df	Mean Square	F	Sig.
	Regression	23.250	3	7.750	13.451	$.000^{b}$
1	Residual	39.179	64	.576		
	Total	62.429	67			

a. Dependent Variable: financial performance of firms in Rwanda stock exchange

The researcher also conducted the analysis of variance to determine the significance of the model. The study results in Table 12 depicts the model predictors are significant in explaining changes in stock exchange market capitalization and financial performance of firms in Rwanda stock exchange Kigali with a 0.000 level of significance. The researcher was interested in establishing the amount of variance accounted for in model. The model between stock exchange market capitalization and financial performance of firms in Rwanda stock exchange Kigali shows that model was significant since the p-value was less than 0.05without the interaction term, F (3, 64) 13.451, p<.000. The regression model was;

$$Y_1 = \beta_0 + \beta x + \beta x^2 + \beta x^3 + \alpha$$

Financial performance of firms in Rwanda stock exchange =3.431-0.531 Share price – 0.114 Share value +.818 financial literacy + ε

The interpretation of this is that holding other factors constant (share value, share price and financial literacy) financial performance of firms in Rwanda stock exchange is 3.431 units. A unit change in share price will lead decrease of financial performance of firms in Rwanda stock exchange with 0.531 units; A unit change of share value will lead decrease 0.114 units while a unit change of financial literacy will lead increase of financial performance of firms in Rwanda stock exchange with 0.818 units while other factors are held constant.

4.4 Summary of Findings

The first objective of the study was to assess the effect of share price on financial performance of firms in Rwanda Stock Exchange. The research findings showed that 94.2% agreed while 5.4% disagreed that a decline in share prices leads to financial decline with mean of 3.69 and standard deviation of 1.10185. on statement. A fall in share prices indicates an awareness of disrupted supply chains 57.2% agreed while 5.3% neither agreed nor disagreed while 27.8% disagreed with mean of 4.208 and standard deviation 0.7108. on statement that a fall in financial uncertainty contributes to economic decline 87.5% agreed, 12.5% neither agreed nor disagreed while 5.6% disagreed with mean of 4.139 and standard deviation 0.7374. On statement that a fall in share prices reflects an awareness of the disruption of the free movement of people and goods 81.9% agreed, 6.9% neither agreed nor disagreed while 5.6% disagreed with mean of 3.486 and standard deviation 0.8720. A fall in price reflects a shock to aggregate demand as consumers and businesses cut back on consumption 40.3% agreed, 51.4% neither agreed nor disagreed while 8.3% disagreed with mean of 3.486 and standard deviation 0.8720.

b. Predictors: (Constant), share value, share price and financial literacy

Stratford Peer Reviewed Journals and Book Publishing Journal of Finance and Accounting Volume 6//Issue 2//Page 22-40//May//2022/ Email: info@stratfordjournals.org ISSN: 2616-4965



On statement that a fall in price reflects a shock to aggregate demand as consumers and businesses cut back on consumption 40.3 % agreed, 51.4% neither agreed nor disagreed while 8.3 % disagreed with mean of 3.347 and standard deviation 0.9217. On statement that a fall in share prices is a sign of economic decline 44.4 % agreed, 36.1% neither agreed nor disagreed while 9.4 % disagreed with mean of 4.319 and standard deviation 0.6463 A fall in share prices can lead to economic depression 44.4 % agreed, 26.4% neither agreed nor disagreed while 29.1 % disagreed with mean of 4.014 and standard deviation 1.1320. A fall in the share price makes a firm vulnerable to a takeover 80.5 % agreed, 26.4% neither agreed nor disagreed while 9.4 % disagreed with mean of 4.319 and standard deviation 0.6463.

The second objective of the study was to examine the effect of share value on financial performance of firms in Rwanda stock Exchange. The research findings showed that 94.8% agreed while 5.6 % disagreed that a rise and fall in share values impacts on the firm's market capitalization. on statement When there is a rise and fall in the share price values a firm's market value is affected 88.8% agreed while 5.6 % neither agreed nor disagreed while 5.6 % disagreed. on statement that when share prices are high, the firm gets more worth in market value and the vice versa 80.5% agreed while 19.5 % disagreed. On the statement that a fall in share price values causes wider economic problems 14.5% agreed while 9.7 % neither agreed nor disagreed On the statement that underperforming shares can lead to economic decline 80.5% agreed while 13.9 % neither agreed nor disagreed while 5.6 % disagreed. Finally, on the statement that an increase in share values leads to increased gross financial profits.

The third objective of the study was to analyze the effect of financial literacy on financial performance of firms in Rwanda stock Exchange. The research findings showed that 72.8% agreed while 9.7 % disagreed that I am knowledgeable on how shares are traded in RSE with mean of 4.33 and standard deviation of 1.3738. on statement. On statement that I know what dividends are and their benefits 70.8% agreed while 9.7 % neither agreed nor disagreed while 19.4% disagreed with mean of 4.33 and standard deviation 1.3738. On statement that I understand the concept of share price 56.9% agreed while 8.3 % neither agreed nor disagreed while 16.7% disagreed with mean of 3.86 and standard deviation 0.4695. On statement that I get information on price shares easily 85.1% agreed while 18.1 % neither agreed nor disagreed while 16.7% disagreed with mean of 3.986 and standard deviation 1.0680. On statement that I am conversant with the concept of earning per share as used in the stock market 93% agreed while 16.9 % neither agreed nor disagreed while 5.1% disagreed with mean of 3.889 and standard deviation 0.7230

5.0 Conclusion

It is concluded that most of research participants agreed that higher stock prices can lower the cost of capital for investment. This is because the firms, which have stock prices that are higher can easily get cheap capital by selling off the newly acquired stocks short term and regular return, will show their impact as a positive relationship with market price while the group who is unaffected or considers dividends as irrelevant will show an inverse relationship with stock price. The retention ratio has a negative effect on stock prices and significantly explains stock prices variations on the stock exchange. Lack of financial literacy can easily lead to the accumulation of huge debts and eventual making poor financial decisions. The lack of basic financial literacy skills to reconcile one's bank accounts, pay bills on time, pay off debts and plan for a better tomorrow can be a dangerous phenomenon payment ratio, company size and dividend yield are important factors in the stock price.



REFERENCES

- Amin, M.E. (2005). Social Science Research: Conception, Methodology and Analysis. Kampala: Makerere University Printers.
- Anderson, G.E. and Arsenault, N. (2008). Fundamentals of Education Research. London: Falmer Press.
- Andrade, A. D. (2009). Interpretive research aiming at theory building: Adopting and adapting the case study design. The Qualitative Report, 42-60.
- Altman, E. (2008). Financial ratios, discriminate analysis and the prediction of corporate bankruptcy, Journal of Finance, Vol.23, No.4.
- Auret, C and J. Golding, J. (2012). Stock prices as a leading indicator of economic activity in South Africa: Evidence from the JSE, Investment Analysts Journal, Vol.76, (2012). https://doi.org/10.1080/10293523.2012.11082549
- Bakaert, G and C. Harvey. (2000). Foreign Speculators and Emerging Equity Markets, Journal of Finance, Vol.55, 565-613. https://doi.org/10.1111/0022-1082.00220
- Bawa, A and E. Yaroson, E. (2013). Does Corruption matter in the Development of the Stock market in Nigeria, ESUT Journal of Accountancy, Vol.4, No.1.
- Beck, T. (2006). Creating an efficient financial system: challenges in a global economy. Policy Research Working Paper; No. 3856. World Bank, Washington, DC. https://doi.org/10.1596/1813-9450-3856
- Binswanger, M. (2001). Does the stock market still lead real activity? An investigation for the G7 countries, Financial Markets and Portfolio Management Vol.15, No.1, 15-29. https://doi.org/10.1007/s11408-001-0102-6
- Boot, A.W.A. (2006). Market liquidity, investor participation and managerial autonomy: Why do firms go private, London: Centre for Economic Policy Research. https://doi.org/10.2139/ssrn.971840
- Boyd, J. & B. Smith, B. (2006). The Co-Evolution of the Real and Financial Sectors in the Growth Process.
- Burns, N., S.K & Grove, S.K. (2009). The practice of nursing research: Appraisal, synthesis and generation of evidence sixth edition. Sauders Elsevier Missouri: USA. https://doi.org/10.12968/pnur.2009.20.12.45587
- Campbell, D and Stanley, J. (2003). Education research: An introduction fourth edition, New York and London: Longman Inc.
- Claessens, S., S. Djankov, and D. Klingebiel. (2001). Stock markets in transition economies. Financial Transition in Europe and Central Asia: Challenges of the new Decade: 109-37. https://doi.org/10.2139/ssrn.240703
- Chandrapala, P. (2011). The Relationship between Trading Volume and Stock Returns", Journal of Competitiveness, Vol.3, (2011).

Email: info@stratfordjournals.org ISSN: 2616-4965



- Chaudhuri, K and Smiles, S. (2004). Stock Markets and Aggregate Economic Activity: Evidence from Australia, Applied Financial Economics. Vol.14, 121-129. https://doi.org/10.1080/0960310042000176399
- Chen, G. M. Firth, and Rui, O.M. (2001). The dynamic relation between stock Returns, Trading Volume, and Volatility, The Financial Review, Vol. 38, 153-174. https://doi.org/10.1111/j.1540-6288.2001.tb00024.x
- Creswell, J. W. (2009). Research Design: Qualitative, Quantitative, and Mixed Methods Approaches. 3rd Edition. Los Angeles: Sage Publications, Inc.
- Crotty, J. (2009). Structural causes of the global financial crisis: a critical assessment of the 'new financial architecture'. Cambridge Journal of Economics, 33(4): 563-580. https://doi.org/10.1093/cje/bep023
- Demirgiic-Kunt, A. and R. Levine (2006). Stock market development and financial intermediaries: stylized facts. World Bank Economic Review, 10(2): 291-321.
- Gakeri, J.K. (2011). Enhancing Securities Markets in Sub-Saharan Africa: An overview of the Legal and Institutional arrangements in Kenya. Department of Private Law, School of Law, University of Nairobi.
- Hatzius, J, Hooper, P, Mishkin, F.S, Schoenholtz, K.L & Watson, M.W. (2010). Financial conditions indexes: A fresh look after the financial crisis." NBER Working Paper No.16150,
- Hassett, K.A., & Metcalf, G.E. (2009). Investment with uncertain tax policy: Does random tax. policy discourage investment? The Economic Journal Vol.109, 372-393. https://doi.org/10.1111/1468-0297.00453
- Kaminsky, G. & S. Schmukler. (2003). Short-run pain, long-run gain: the effects of financial liberalization (No. w9787). National Bureau of Economic Research. https://doi.org/10.3386/w9787
- Kothari, C.R. (2005). Research Methodology: Methods and Techniques. New Delhi: New Age International Publishers.
- Levine, R. (2011). Regulating finance and regulators to promote growth. In Proceedings-Economic Policy Symposium-Jackson Hole, pp. 271-311. Federal Reserve Bank of Kansas City.
- Osei, K.A. (2008). Analysis of factors affecting the development of an emerging capital market: The case of the Ghana stock market (Vol. 76). African Economic Research Consortium, Nairobi.
- Roe, M.J. (2006). Legal origins, politics, and modern stock markets. Harvard Law Review: 460-527.
- Saunders, M, Lewis, P. & Thornbill, A. (2009). Research methods for business students. 4th ed. Harlow: Pearson.