

Original Article

Capital Structure and Financial Performance of Listed Consumer Goods Companies in Nigeria

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Abstract: This study examined the relationship between capital structure and financial performance of listed consumer goods companies in Nigeria for the period of (8) years 2015-2022. The study's population includes all twenty-one (21) listed consumer goods companies on the Nigerian Exchange Group (NGX) as of December 2022. The sample size for the study is ten (10) companies. The study used documented information acquired from the sampled businesses' financial statements and finances; the data was first evaluated using descriptive statistics to give summary statistics for each variable. Correlation analysis was then performed using the Pearson correlation approach to determine the relationship between both independent and dependent variables, followed by the OLS regression technique. The result revealed that capital structure proxy by total debt to total assets has a positive significant effect on financial performance (ROA) and (ROE), short-term debt to total assets has a negative insignificant effect on financial performance (ROA) and (ROE). In contrast, long-term debt to total assets has a positive insignificant effect on financial performance of listed consumer goods companies in Nigeria. Based on these results, this study proposes that policymakers and management of consumer goods businesses evaluate the appropriate capital structure while adhering to the business governance code.

Keywords: Capital Structure, Consumer Goods, Financial Performance, Nigeria.

I. INTRODUCTION

Financial decisions are crucial, fundamental, and important to any business worldwide. For any business to prosper, it requires a fund to carry out its activities as no success is achievable without funds. The required funds may be for the day-to-day running of a business or expansion purpose. This expresses how relevant the fund is in the life of any business, this fund is referred to as capital (Abdulkarim&Bahamman, 2021).

Capital therefore gets referred to as a means of financing a firm. When corporations source their capital, it becomes an expense on businesses since other people's resources must be paid for when advantages are received from it. It is thus a representation of a company's financial responsibilities. The capital conjunction constitutes capital structure; a strong capital structure combination is the remedy for an effective company since it stems from the desire to maximize shareholder value, and as such, it substantially impacts a company's competitiveness. One of the most serious challenges managers face today is determining whether to use debt or equity to establish a strong capital structure with low operational expenses and high financial performance. When deciding on capital structure, considerations to examine include the appropriate balance of debt and equity, the debt maturity schedule, and the specific types of capital to use at any given time. Managers have to make choices about capital structures to maximize shareholder wealth and a company's intrinsic worth, as stated by Brigham & Ehrhardt, 2017.

Financial performance for any business cannot be far from the firm business profitability. Financial success is viewed as a proxy for firm profitability, which is one of the primary goals of any company's management (Burca & Batrinca, 2014). A firm's financial performance is determined by how successfully and efficiently it can achieve its objectives to produce a profit and enhance its shareholders' value. Financial performance refers to a company's desire to maximize profit to investors and assets, whereas operational efficiency is focused on sales growth, expansion and value on the market. Because organizations use capital to achieve their goals, and their financial success is defined as those goals, capital architecture and financial success are anticipated to be in proportion to and affected by each other.

A customer-facing products company sells items to consumers rather than producers and sectors. The consumer goods sector in Nigeria comprises companies primarily involved in the production and distribution of consumer goods, including food, drinks, and services. Service includes repairs and haircuts, Nigerian Stock Exchange (NSE, 2018). Consumer Goods Companies in Nigeria, like any other company across the globe, require funds to boost their activities so that the cost of capital would be minimized to maximize profitability. These businesses include those involved in food production, packaged goods,



apparel, beverages, vehicles, and technology. Examples include Dangote Flour Mill, Cadbury Company Plc, and Nestle Nigeria Plc, to mention but a few.

Practically, there have been incidents of collapse in Nigeria's consumer goods industry due to poor financial performance; a capital structure is acknowledged as one of the primary elements contributing to the demise of certain consumer goods businesses in the country. These failures may be attributed to the inability of the consumer goods sector to meet the optimum capital structure. Since firms employ capital to achieve the firm's set goals, both capital structure and financial performance are expected to be proportionally related and influenced by one another.

Prior studies of Omabu, Okoye, Pius and Amahalu (2021), Khan, Qadeer, Mata, ChavagliaNeto, Sabir, Martins and Filipe (2021) found a positive relationship between capital structure and financial performance. The second strand of literature documented a negative relationship between capital structure and financial performance (for example, Senan, Ahmad, Anagreh, Tabash & Al-Homaidi, 2021). On the other hand, a non-significant relationship was reported between capital structure and financial performance (Rahman, Abdelrhman, Nurul, Anwarul Islam, Rabbani & Bunagan, 2021); these studies examined the relationship between capital structure and firms' financial performance and produced inconclusive results. Against this background, this study examined the relationship between capital structure and Financial Performance of listed Consumer Goods Companies in Nigeria.

II. LITERATURE REVIEW

Capital structure refers to how a company finances itself in terms of debt, equity, and securities. The combination of debt and equity determines a company's ability to finance its assets. Capital structure is quantified by ratios such as the debt-to-equity ratio, debt-to-total ratio of assets, and the equity percentage of total assets (Ahmadina, Afrasiabishani, & Hesami, 2012). Capital structure reflects how the corporation finances its operations through a mixture of equity and debt (Lawal, 2014). This type of corporate structure is very important and crucial in a firm's life, not only for maximizing earnings but also for longevity and optimum achievement of its overall goals. Profitability is one of the primary reasons for the continued existence of commercial enterprises (Akinyomi, 2013), and businesses continue to operate by earning profits.

Financial performance is the ability of a firm to create or produce net income regularly. The ratio is used as a benchmark for assessing a firm's financial performance. ROA and ROE are used in this study. According to Yusnita and Fitriadi (2019), return on assets is a profitability ratio that measures the company's ability to generate income from its assets. Return on asset is a rational way to determine the quantity of profits earned in the previous period. As a result, the computation results can be utilized as a reference to determine earnings in the following period. ROA is computed by dividing net income by total assets (Hanafi 2016). Return on Assets (ROA) is a statistic that measures an organisation's capacity to profit from its asset ownership (Puspitawati, 2017). ROE indicates how effectively a company uses shareholder capital to generate profits. It is an important indicator for investors to consider when examining a company and its stock. Return on equity ratio (ROE) is regarded as an important measure of a company's financial success; it informs ordinary shareholders about how effectively their money is being used.

Equally important, the most fundamental theory for capital structure is possibly the theory expounded by Modigliani and Miller (1958) and Modigliani and Miller (1963). Theories related to this study include Trade-off Theory, Pecking Order Theory, Agency Theory, Signaling Theory

Based on the arguments and propositions of these theories, the free cash flow theory was considered to be the underpinning theory of the study; Jensen Mecklinng's (1986) free cash flow theory of capital structure proposes that leverage can also function as a corporate oversight device, minimizing the agency issue (and hence boosting company performance) by lowering the agency costs of free cash flows. There are certain drawbacks to a corporation using a higher leverage level. Managers of such enterprises will be unable to invest in non-profitable new projects since the new projects may not be able to create cash flows for the firm, resulting in managers failing to pay the predetermined amount of interest on the loan or the principal amount whenever owing. It also might cause the inability to generate profit in a certain financial year, resulting in failure to pay dividends to firm shareholders (Jensen & Meckling 1786).

A) Capital Structure and Financial Performance

Abdullah and Tursoy's (2021) 25-year empirical research of non-financial enterprises in Germany revealed a substantial positive association between capital structure and financial performance. They discovered that the primary cause of the positive association was the cheaper cost of issuing debt and the tax shelter from the deep interest. Jaworski and Czerwonka (2021) highlighted the key factors influencing the capital makeup of European energy corporations. The study used a panel of 6122 firms from 25 EU nations that operated between 2011 and 2018. The study employed multiple regression analysis. The study found clear evidence of a positive association between company debt, tangibleness, and scale and a negative relationship between profitability and liquidity. Growth (positive association) and non-debt tax shield (negative relationship) were found to

impact the share of debt in capital. The study also found a negative influence on the consumption of energy quantity and the proportion of renewable energies in manufacturing and a favorable impact of market monopoly on the indebtedness of EU energy corporations.

Megawati (2020) conducts another study on the impact of operational influence, monetary leverage, and liquidity on profit in the Indonesia Stock Exchange-listed telecommunications industry. The study method was qualitative confirmation analysis with an explanatory survey methodology, followed by hypothesis testing with panel data utilizing the technique of multiple regression analysis. Purposive sampling is utilized to collect five research samples from several companies. The study period lasted from 2012 to 2018. According to the study's findings, operational leverage and financial leverage have a moderately favorable influence on profitability, liquidity has a marginally adverse effect on revenue, and all three have an impact on profit.

Some studies indicate a beneficial association between capital structure and financial success, while others suggest the opposite. This is consistent with the findings of Thiet al.'s (2020) meta-analysis, which found that 63 studies indicated favorable impacts, 117 showed negative effects, and 65 showed negligible effects. However, because rural banks rely heavily on short-term debt for lending to their consumers, the connection between Total Debt to Total Assets (TDTA) and Short-Term Debt to Total Assets (SDTA) is projected to be positive in terms of their economic performance.

Empirical research conducted on enterprises in Nigeria and Ghana has likewise yielded inconclusive results. Oke et al. (2019), in a research on the influence of debt on capital structure and financial performance for Nigerian multinational enterprises, discovered a substantial positive association among capital structure and financial results.

Ganiyu et al. (2019) found that short-term loans had a favorable and statistically significant relationship with return on equity (ROE). The positive link between short-term loans and ROE suggests that short-term borrowing is being effectively employed as a tool to reduce managerial cash flow waste and shareholder-manager opportunistic behavior through short-term debt repayment requirements. This means that because short-term debt must be returned within a year, management cannot exploit it to their advantage without shareholders being aware of their opportunistic behavior.

Yusnita and Fitriadi (2019) identified a positive significant link between Short Term Debt to Total Assets and profitability among micro, small, and medium firms in Tasikmalaya city. Consistently, Jati and Sudaryanto (2016) concluded that Short-Term Debt on Total Assets has a positive substantial effect on ROA. Meanwhile, Mitria (2019) said that the ratio of short-term obligations compared to overall assets has no impact on profitability. In a sample study of 21 publicly traded non-financial enterprises, Akingunola et al. (2018) discovered inconsistent findings when the metric of financial success was changed from Return on Equity (ROE) to Return on Assets (ROA).

III. METHODOLOGY

one (21) consumer goods companies listed on the Nigerian Exchange Group (NGX, (2022) for the period of eight (8) years spanning from the year 2015 to 2022. purposive sampling technique was adopted to arrive at ten (10) listed consumer goods companies as a sample of the study; the sample of the study is presented as follows:

Table 1: Sample Size of the Study

S/No.	Name of Company	Year of Incorporation	Financial Year End
1	Cadbury Nig. Plc.	09/01/1965	December 31 st
2	Champion Brewery Plc.	31/07/1974	December 31 st
3	Dangote Sugar Refinery Plc.	04/01/ 2005	December 31 st
4	International Breweries	22/12/1971	December, 31 st
5	McNichols Plc	26/04/2004	December, 31 st
6	Nascon Allied Industries Plc.	30/04/1973	December, 31 st
7	Nestle Nig. Plc.	25/09/1969	December, 31 st
8	Nigerian Breweries Plc	16/11/1946	December, 31 st
9	Unilever Nig. Plc	04/11/1923	December, 31 st
10	Union Dicon Salt Plc	12/11/1991	December, 31 st

To achieve the objective of this study, Pearson Correlation was employed to analyze the data collected from the sampled firms. The analysis was conducted using STATA software version 14. The model of the study is represented below

$$ROA_{it} = \beta_0 + \beta_1 TDTA_{it} + \beta_2 LDTA_{it} + \beta_3 SDTA_{it} + \beta_4 FSIZ_{it} + \beta_5 FAGE_{it} + \varepsilon_{it} \dots \dots \dots eq (i)$$

$$ROE_{it} = \beta_0 + \beta_1 TDTA_{it} + \beta_2 LDTA_{it} + \beta_3 SDTA_{it} + \beta_4 FSIZ_{it} + \beta_5 FAGE_{it} + \varepsilon_{it} \dots \dots \dots eq (ii)$$

IV. DISCUSSION OF RESULTS

The results of the study's descriptive statistics, correlation analysis, and multiple regression were discussed in this section. The result of descriptive statistics is presented in Table 2.

Table 2: Descriptive Statistics of the Study Variables

Variables	Obs	Mean	Std. Dev.	Min	Max	Skewness	Kurtosis
ROA	80	0.232	0.032	0.18	0.3	0.294	1.930
ROE	80	0.185	0.021	0.14	0.23	0.222	1.992
TDTA	80	0.571	0.100	0.37	0.88	0.796	3.923
STDTA	80	0.287	0.098	0.090	0.518	0.325	2.781
LTDTA	80	0.354	0.112	0.138	0.679	0.724	3.460
FSZE	80	18.387	1.518	11.694	20.532	-1.168	5.939
FAGE	80	53.9	24.705	15	108	0.476	2.743

Note: ROA=Return on Assets; ROE=Return on Equity; TDTA=Total Debt to Total Asset; STDTA=Short-Term Debt to Total Asset; LTDTA=Long-Term Debt to Total Asset; FSZE=Firm Size; FAGE=Firm Age. **Source:** Researcher's Analysis (2023)

The descriptive result shows that Return on Assets (ROA) has a mean value of 0.232 (23.2%), a minimum value of 0.18 (18%), and a maximum value of 0.30 (30%). This means that the management of listed consumer goods companies in Nigeria is not judiciously utilizing the assets of their firms to generate returns. Moreover, the standard deviation is 0.032, depicting that there is no variation between the sampled firms in regard to return on assets since the value of the study standard deviation (0.032) is less than the mean value (0.232). Regarding the second measure of financial performance, which is the return on equity (ROE), it has a mean value of 0.185 (18.5%), a minimum value of 0.14 (14%), and a maximum value of 0.23 (23%), while the standard deviation value stood at 0.021 indicating that there is a variation between listed consumer goods companies in Nigeria.

The result of descriptive statistics also shows that the average value of total debt to total assets (TDTA) is 0.571 (57.1%). The minimum value is 0.37 (37%), and the maximum value is 0.88 (88%), while the standard deviation stood at 0.1003 (10.03%), which indicates that there is a narrow variation between the sampled firms in this study concerning total debt since the value of standard deviation is less than the mean value. Likewise, short-term debt to total asset (STDTA) has a mean value of 0.287 (28.7%) and a minimum and maximum value of 0.090 (9%), 0.518 (51.8%), respectively, whereas the standard deviation is 0.098. this portrays that there is no wide variation between the simple companies in the study, and they are mostly composed of non-executive directors. The result also shows the mean value of long-term debt to total asset (LTDTA) is 0.354 (35.4%), with a minimum value of 0.138 (13.8%) and a maximum value of 0.679 (67.9%).

Based on the two models developed, the correlation results were presented alongside each of the study models. Tables 3 and 3 present the correlation results for the ROA model.

Table 3: Correlation Matrix for ROA Model

Variables	ROA	TDTA	STDTA	LTDTA	FSZE	FAGE		
ROA	1							
TDTA	0.598***	1						
STDTA	-0.154	-0.341***	1					
LTDTA	0.167	0.370***	0.625***	1				
FSZE	0.228**	0.248**	0.052	0.203*	1			
FAGE	-0.018	-0.105	0.257**	0.238**	-0.087	1		

Note: ***, **, * indicate statistically significance at 1%, 5% and 10%, respectively. ROA=Return on Assets; ROE=Return on Equity; TDTA=Total Debt to Total Asset; STDTA=Short-Term Debt to Total Asset; LTDTA=Long-Term Debt to Total Asset; FSZE=Firm Size; FAGE=Firm Age.

Source: Researcher's Analysis (2023).

Concerning the Return on Asset (ROA) model, the correlation result in Table III shows that only total debt to total assets (TDTA) and board independence (BIND) have a significant positive relationship with return on asset (ROA) at 1% statistically. At the same time, long-term debt to total assets (LTDTA) has a positive but insignificant correlation with ROA. In contrast, firm size (FSZE) has a significant positive relationship with ROA at a 5% level of statistical significance. However, short-term debt to total assets (STDTA) and firm age (FAGE) have an insignificant negative relationship with ROA. The correlation result also shows that short-term debt to the total asset (STDTA) and Firm Age (FAGE) have a negative relationship with Total Debt to the total asset (TDTA). There is a significant positive correlation between long-term debt to the total asset (LTDTA), BIND and FSZE on Total Debt to the total asset (TDTA) at 1% and 5%, respectively, statistical significance level. The correlation result also shows that long-term debt to the total asset (LTDTA) and firm Age (FAGE) have

a significant positive relationship with Short-Term debt to the total asset (STDTA) at 1% and 5, respectively, levels of significance.

Table IV: Correlation Matrix for ROE Model

Variables	ROE	TDTA	STDTA	LTDTA	FSZE	FAGE	
ROE	1						
TDTA	0.532***	1					
STDTA	-0.061	-0.341***	1				
LTDTA	0.112	0.370***	0.625***	1			
FSZE	0.201*	0.248**	0.052	0.203*	1		
FAGE	-0.045	-0.105	0.257**	0.238**	-0.087	1	

Note: ***, **, * indicate statistically significance at 1%, 5% and 10%, respectively. ROA=Return on Assets; ROE=Return on Equity; TDTA=Total Debt to Total Asset; STDTA=Short-Term Debt to Total Asset; LTDTA=Long-Term Debt to Total Asset; FSZE=Firm Size; FAGE=Firm Age.

Source: Researcher's Analysis (2023)

In consideration of the return on equity (ROE) model, the correlation result from Table IV shows that among the explanatory variables, total debt to total asset (TDTA) and board independence (BIND) have a significant positive relationship with ROE at 1%, respectively. Nevertheless, short-term debt to total asset (STDTA) and firm age (FAGE) have an insignificant negative relationship with ROE. Long-term debt to total asset (LTDTA) and firm size (FSZE) have a significant positive relationship with ROE, as shown in Table IV above. The correlation result also shows that short-term debt to total asset (STDTA) and firm age (FAGE) have a significant negative relationship with total debt (TDTA) at 1% statistical significance. There is a significant positive correlation between long-term debt to total asset debt (LTDTA), board independence (BND), and firm size (FSZE) at 1%, 1%, and 5% statistical significance level with total debt to total asset (TDTA). Also, the result shows that long-term debt to the total asset (LTDTA) and firm age (FAGE) have a significant correlation with short-term debt to total asset (STDTA) at levels of 1% and 5%, respectively.

V. CONCLUSION

From the result of the two regression models in this study, the study concludes as follows:

1. Total debt to total assets significantly positively affects Financial Performance as measured by Return on Asset (ROA). It significantly positively affects the financial performance by Return on Equity (ROE) of listed consumer goods companies in Nigeria.
2. Short-term debt to total assets is found to hurt financial performance (ROA). It negatively affects financial performance (ROE) on the Financial Performance of listed consumer goods companies in Nigeria.
3. Long-term debt to total assets has a positive insignificant effect on Financial Performance (ROA). However, it has an insignificant positive effect on the financial performance (ROE) of listed consumer goods companies in Nigeria.

VI. RECOMMENDATIONS

Based on the conclusions drawn by this study, the study came up with the following recommendations:

1. Consumer goods companies in Nigeria should maintain an average total debt to assets that are not too small or large. It is also important that the debt be composed carefully so that it can bring more effect on financial performance.
2. The management of listed consumer goods companies in Nigeria should pay attention to the short-term debt they collect; they should not collect too much that can distract business from meeting their objectives.
3. Consumer goods companies should increase their proportions of long-term debt to assets to align with their interests and those of the company so that they can work for the company's overall interest and enhance financial performance.

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