Cash Flow Accounting and Corporate Financial Performance of Listed Consumer Goods Companies in Nigeria

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Abstract
This study investigated the effects of cash flow accounting on corporate financial performance of listed consumer goods firms in Nigeria for the period 2015 to 2019. The study employed ex-post facto and correlational research designs. The population of the study comprised of twenty-six firm and Taro Yamene formula was utilized for the determination of sample size of twenty three firms. The data for the study was collected from the annual reports of sampled companies listed on the Nigerian Stock Exchange and descriptive, bivariate and multivariate analysis was employed for the purpose of data analysis. The result from the data analysis revealed a positive and significant relationship between operating cash flow, financing cash flow and firm size to profit after tax of listed consumer goods manufacturing companies while investing activities and financial leverage revealed a negative and significant relationship. On the basis of the findings, the paper concludes that cash flow accounting influences the corporate financial performance of firms in Nigeria. Hence the paper recommended amongst others that firms should always strike a balance between liquidity and profitability in their capital expenditure decision making.
Keywords: Operating cash flow, financing cash flow, investing cash flow, profit after tax

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I. Introduction

The amount of cash available in any given organization influences the level of financial performance. Appah (2018) stated that cash is the lifeblood of any corporate entity because it is needed to acquire assets used in the generation of goods and services provided by the entity for determination of profit in order to maximize the wealth of shareholders. Liman and Mohammed (2018), Turcas (2011) argue that the corporate financial performance of any given entity depends on the ability of such a firm to generate sufficient cash flows from the various components of cash flow statement. Therefore, insufficient cash flow will have a negative effect on the corporate financial performance by reducing the level of cash inflow and improving the cash outflow. Bingilar and Oyadonghan (2014) suggest that for cash flows to be properly structured and better applied, an entity should design effective and efficient procedures for applying the best of cash flow class that would be applied in the firm's activities to stimulate corporate financial performance. This is because corporate financial performance is one significant issue in corporations using various financial resources and methods to ascertain profitable investments so as to maximize the wealth of shareholders (Nangih & Ofor, 2020; Liman & Mohammed, 2018).

The nexus between cash flow componentsand corporate financial performance has been an issueof interest to researchers, regulators, accounting and finance professionals(for example, Nwaiwu & Oluka, 2017;Nangih, et al 2020). This is as a result of the relevance of proper cash accounting to the success of modern corporations. According to Nwakaego, et al (2015), cash are direct index of corporate liquidity and a contributing factor in firm financial performance. Nangih, et al (2020) suggest that cash and its equivalents are very important financial resources employed for the purpose of assets and corporate operations which is a driver for market returns and corporate performance. Soet, et al (2018) noted that cash flow accounting is the life blood of any given corporate entity for short, medium and long term growth. The studies conducted by Zhou, Yang and Zhang (2012); Chikashi (2013);John, et al (2015); Labhane and Mahakud (2016) revealed a negative association between cash flow and corporate financial performance. In other various -studies Bingilar and Oyadonghan (2014); Ogbonnaya, et al (2016)revealed a positive and significant association between cash flow and corporate financial performance.

The available empirical studies on cash flow accounting and corporate financial performance (Ghanbari, et al,2015; Guda 2013,Tariverdi, et al 2014, Gheshlaghi, et al 2014; Velnampy & Kajananthan2013; Bingilar & Oyadonghan 2014; Nwanyanwu 2015, Amah, et al 2016; Nangih & Ofor, 2020; Liman &

Mohammed, 2018;Abughniem, et al 2020)have been conducted in various sectors of the economy using different proxy forcorporate financial performance, methodologies and time frame. It remains unclear the reasonswhy these empirical studies often yield conflicting results. These conflicting results revealthat the effect of cash flow accounting and corporate financial performance is not concluded. The inconclusive results have made the issue of cash flow accounting and corporate financial performance to further empirical studies. Also, none of these studies in Nigeria used corporate size and leverage variables in their respective study. The gap in terms of the location, period covered and methodology is also a contributory factor to the differences in the outcomes of prior studies. Following the aforementioned gap created by the prior studies in terms of findings and conclusion, this study will aim at filling the gap by investigating cash flow accounting and corporate financial performance of consumer goods companies for the period 2015 to 2019. To achieve the objective of this paper, the following specific objectives, research questions and hypotheses were analysed in the study:

II.   Specific Objectives

1. To investigate the relationship between operating cash flow and profit after taxof listed companies in Nigeria:
2. To investigate the relationship between investing cash flow and profit after tax of listed companies in Nigeria.
3. To investigate the relationship between financing cash flow and profit after tax of listed companies in Nigeria.
4. To investigate the relationship between firm size and profit after tax of listed companies in Nigeria.
5. To investigate the relationship between financial leverage and profit after tax of listed companies in Nigeria.

Research Questions
1. What is the relationship between operating cash flow and profit after taxof listed companies in Nigeria?
2. What is the relationship between investing cash flow andprofit after tax of listed companies in Nigeria?
3. What is the relationship between financing cash flow and profit after tax of listed companies in Nigeria?
4. What is the relationship between firm size and profit after tax of listed companies in Nigeria?
5. What is the relationship between financial leverage and profit after tax of listed companies in Nigeria?
The following null hypotheses were tested:
Ho$_1$: Operating cash flow does not have a positive and significant relationship on profit after tax of listed companies in Nigeria.
Ho$_2$: Investing cash flow does not have a positive and significant relationship on profit after tax of listed companies in Nigeria.
**Ho$_3$**: Financing cash flow does not have a positive and significant relationship on profit after tax of listed companies in Nigeria.
Ho$_4$: Firm size does not have a positive and significant relationship on profit after tax of listed companies in Nigeria.
Ho$_5$: Financial Leverage does not have a positive and significant relationship on profit after tax of listed companies in Nigeria.

III.   Literature Review

Conceptual Review
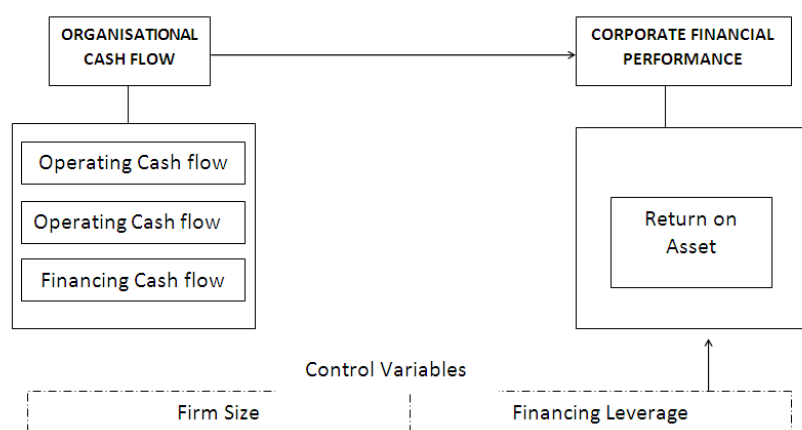
Fig 1: Conceptual Framework

Cash Flow Components: Cash flow is the net amount of cash and cash equivalents obtained from a corporate entity's receipt and payment of cash (Kenton, 2019; Appah, 2018; Appah, 2019). Chris(2019) also noted that cash flow is a measure of the liquidity of an entity that usually comprise of netincome after taxes plus non-cash payments againstthe amount of income generated. Kenton (2019) further stated that an entity's ability to create value for shareholders is ascertained by the ability to generate positive cash flows or maximization of long term cash flows for the entity. According to Kokemuller (2019),Kenton (2019) and Chris (2019), a positive cash flowsuggests that liquid assets are increasing whichassists companies to pay expenses, debts, return funds to shareholders, reinvest in its business and provide abuffer against future financial difficulties. Bingilar and Oyadonghan (2014) noted that the cash flows of an entity is the pool of finance that an entity applies to current and non-current assets for the promotion of corporate profitability. They further noted that cash flow is an index of funds that is received and paid out by a firm for a given time period. They further noted that this index is not inclusive of non-cash accounting charges.

According to Appah (2018), Appah (2019) cash flow statement is a statement that shows the inflow and outflows of cash and cash equivalent of an entity over a given period of time. This statement concentrates on the sources and uses of cash and is a useful indicator of a company's liquidity and solvency. Hence, the objective of statement of cashflow is to provide information to users of financial statements about the cash flows of an entity's ability to generate cash and cash equivalents, as well as indicating the needs of the entity. It provides historical information about cash and cash equivalent, classifying cash flows between operating, investing and financing activities (Kokemuller, 2019; Kenton, 2019; and Chris, 2019).

Operating Cash Flow Activities: This is a component of cash flow statement that shows whether and to what extent companies can generate cash from their operations. It is these operating cash flows which must, in the end pay for all cash outflows relating to other activities, such as payment of loan interest, dividend and so on (Appah, 2018; Appah, 2019). According to Bingilar and Oyadonghan (2014), operating activities had to do withexpenses that do not guarantee a continues inflow of cash and cash equivalent. Liman and Mohammed (2018) stated that operating cash flow is the cash generated from the day to dayfinancial activities of anorganization.According to Bhattacharyya (2011) cash flow from operating activities are those activities that determine the net income of the entity such as cash receipt from sale of goods and services, cash payment to suppliers of goods, cash payments to employees, etc.

Investing Cash Flow Activities: Investing cash flow is a component of cash flow statement that suggest the extent to which new investment in assets would generate future profit and cash for the growth and expansion of the business (Appah, 2018; Appah, 2019).According to Nangih, Ofor and Onuorah (2020) investing cash flow activating are those activities that relates to the acquisition and disposal of property, plant and equity. The following are examples of investing activities: cash receipts from the disposal of non-current assets, cash payment to acquire non-current assets, etc.(Bhattacharyya, 2011).

Financing Cash Flow Activities: This is a class of cash flow that shows the share of cash which the entity's capital providers have claimed during the period. This is an indicator of likely future interest and dividend payments (Appah, 2018; Appah, 2019).Nangih, et al (2020) noted that financing activities of a cash flow statement relate to activities that changes the share capital and long term debt structure of the entity (Bhattacharyya, 2011).

Corporate Financial Performance: Corporatefinancial performance is the measurement of the results of a company's policies and operations in monetary terms.According to Appah, et al (2020), corporate financial performance is mainly reflected in the computation of accounting ratios that suggest the relationship between numbers in the financial statement. They further stated that corporate financial performance can be reflected in market-based (investor returns) and accounting-based (accounting returns) measures.Nwanyanwu(2015) stated that performance is used to evaluate the level at which an organization has succeeded in its line of business. There are different indices can be used to measure it at different times by different organizations, depending on the business' nature of activity. This study would measure corporate financial performance of firms by examining profit after tax.The accounting concept of profit after tax is the difference between profitsafter interest less the corporate tax. The operating profitsof firms are the reward from many activities carried out within the company.

Operating Cash Flow Activities and Corporate Financial Performance

The relationship between operating cash flow and corporate financial performance from prior studies suggest both positive and negative association. The studies of Bingilar and Oyadonghan (2014); Nwanyanwu (2015); Ghanbari *et al* (2015); Nwakaego, et al (2015); Amah, et al (2016);Nwaiwua and Oluka (2017);Soet, et al (2018); Liman and Mohammed (2018); Musah and Kong (2019) revealed that cash flow from operating activities and financial performance have asignificant positive relationship while the studies of Mongo (2010), Guda (2013) and Gheshlaghi, et al (2014);Nangih, et al (2020) suggested that the relationship between cash flow from operating activities and financialperformance is significantly negative.

Investing Cash Flow Activities and Corporate Financial Performance

The relationship between investing cash flow and corporate financial performance from prior studies suggest both positive and negative association. The studies of Ghanbari et *al* (2015), Guda (2013) and Mongo (2010) indicated that cash flow from investing activities has a significant relationship withfinancial performance while thestudies of Bingilar and Oyadonghan (2014); Gheshlaghi, et al (2014);Nwakaego, et al (2015); Amah, et al (2016); Nangih, et al (2020)revealed a negative association between investing cash flow activities and corporate financial performance.

Financing Cash Flow and Corporate Financial Performance

The relationship between financing cash flow and corporate financial performance from prior studies suggest both positive and negative association. The studies of Mongo (2010), Guda (2013); Bingilar and Oyadonghan (2014); Nwakaego, et al (2015);Nangih, et al (2020) indicated a positive association between financing cash flow and corporate financial performance while the studies of Ghanbari et *al* (2015) and Amah, Micheal and Ihendinihu (2016) showed a negative association between financing cash flow activities and corporate financial performance.

Firm Size and Corporate Financial Performance

The size of the firm is a major variable in the evaluation of the corporate financial performance. According to Shaheen and Malik (2012), firm size is the quantity and diversity of production and service capacity and potential that a firm can make available continuously to its customers. Abeyrathna and Priyadarshana (2019) suggest that corporate size is vital in contemporary business environment because bigger companies can manufacture goods on much cheaper price than smaller companies.According to Oyelade (2019), the positive association between corporate size and performance is theoretically explained by economies of scale.However, corporate firms while increasing in size are having poor performance on yearly basis. The relationship between firm size and corporate financial performance from prior studies suggest both positive and negative association. The studies of Akinyomi and Adebayo (2013); Sritharan (2015); Liman and Mohammed (2018); Oyelade (2019)revealed a positive association between size and corporate financial performance. On the other hand, several other such studies such as Vintila and Duca (2013); Tailab (2014); Močnik, D. &. Širec, K. (2015) suggest a negative association between firm size and corporate financial performance.

Financial Leverage and Corporate Financial Performance

Financial leverage is a vital source of financing organisations. It shows that a business needs finance to purchase a new property, plants and equipment (PPP) and it is one of the best ways for firms to achieve its goal and maximize the wealth of shareholder Iqbal and Usman (2018). The relationship between financial leverage and corporate financial performance from prior studies suggest both positive and negative association. Prior studies of Chandrakumarmangalam and Govindasamy (2010); Ibhagui and Olokoyo (2018); Iqbal and Usman (2018) indicate a positive association between firm size and corporate performance. While other studies of Liman and Mohammed (2018); Iqbal and Usman (2018); Onaolapo and Kajola (2010); Oke and Afolabi (2011)suggest a negative association between financial leverage and corporate financial performance.

Theoretical Framework

This study on the effects of cash flow components and corporate financial performance is anchored on the agency theory by Jensen and Meckling (1976) and Fama and Jensen (1983). Izedonmi (2016) suggested that agency problem arises in a situation where the principal (owners, shareholders) employs the agent (board/management) to undertake number duties on behalf of the owners for a reward. Olugbenga, et al (2014) state that agency theory is the application of game theory to the explanation of the circumstances in which a person (the agent) acts on behalf of the principal for the advancement of the principal's objectives. According to Adeyemi, et al (2019), agency theory is a unit of finance and accounting that explains the conflicts of interest between stakeholders with diverse interests in the same asset.

Agency theory explains that companies with better cash flowsprovide an increase in companies'cash holdings. Harford, et al (2008) concluded that firms with excess cash and poor governance lead to occurring of wasteful investments. Cunha (2013) finds that value-destroying acquisitions due to excess cash are significantly less likely when firms raise cash from financing sources such as debt issuance.Agency theory provides that agency conflicts arise from the possible difference between the interest of the owners and that of the managers of organisations. Therefore, the basic responsibility of managers is to manage the organisations in such a way that it generates returns to owners thereby improving the financial performance and cash flows (Elliot & Elliot, 2002). According to Gul *et al* (2012), agency costs can be examined in different ways such as taking advantageous behaviour from a number of managers who focus on increasing their own power or position, extra consuming from the obtained incomes, ineffective investment decisions and mismanagement in accounting or

frauds in firm's business contracts. Negative consequences of these actions emerge as destroyingstock holders' assets and properties and also the performance. Agency theory therefore examines how management's behaviour could be directed at owner's interest by decreasing agency cost in other to improve corporate financial performance.

Empirical Review

Zhou, Yang and Zhang(2012), investigated free cash flow and financial performance of listed real estate companies in China. The study employed ex post facto and correlational research design. The data was obtained from the annual reports of the sample companies for the period 2006 to 2011 based on real estate companies listed in the stock exchange. The secondary data obtained were analysed using principal component analysis and regression analysis. The result from the regression analysis suggested that there is a negative relationship between free cash flow and corporate financial performance in China.

Thanh and Nguyen (2013)carried out an empirical study to investigate the relationship between banking relationship and corporate financial performance in Vietnam for the period 2007 to 2010. The study employed ex post facto and correlation research design. The study collected secondary data from the annual report for a sample of 465 companies listed in the Vietnamise Stock Exchange. The independent variable was cash flow from operating, financing and investing activities while return on equity was the dependent variable. The data obtained was analysed using panel data analysis. The outcome of their analysis revealed that cash flow negatively affects corporate financial performance of listed companies in Vietnam for the period under review.

Chikashi (2013) investigated comprehensive income and corporate financial performance of listed companies in electric appliances industry in Japan for the period 2009 to 2011. The study adopted ex post facto and correlational research design and secondary sources of data was collected from the sampledfirm's annual report for the period under review.The data collected was analysed using descriptive and inferential statistics. The inferential statistics employed pooled regression analysis. The regression analysis revealed that cash flow negatively and significantly affects corporate financial performance.

Bingilar and Oyadonghan (2014) carried out an investigation of cashflow and corporate performance of six food and beverages companies in Nigeria for the period 2007 to 2011. The study employed ex post and correlational research designs and data was obtained from secondary sources basically from the annual reports of the six sampled companies. Their study used return on total assets (ROTA) as dependent variable to measure corporate performance while the operating cashflow, investing cashflow and financing cashflow were used as proxies for cash flow. The study utilized multiple regression analysis for the purpose of data analysis and the result suggested positive significant relationship between operating and financing cash on return on total assets while investing cashflow showed a negative significant association on return on total assets (ROTA).

Tariverdi, et al (2014) investigated components of the four part model of cash flow statement on operational performance of listed companies in Tehran Stock Exchange for the period 2007 to 2011. The study employed an ex post facto research design and correlational research design and data for the study was collected from the published financial statement of sampled companies. The dependent variable operational performance was measured with return on assets (ROA) and return on equity (ROE) while the independent variable was measured with cash flows from investments' returns (CFIR), cash flows from interest paid for financing (SF), cash flows from investment (CFI) and cash flows of financing (CFF). The data collected from the annual reports of sampled companies were analysed with Pearson correlation. The results from the correlation analysis suggested a positive association between cash flows from investments' returns on return on assets and return on equity. A negative association between cash flows from interest paid for financing on return on assets and return on equity. Additional there was no association between cash flows of financing and cash flows from investment on return on assets and return on equity.

Nwakaego, et al (2015) analysed the effects of cash flow statement on corporate financial performance of listed food and beverages companies in the Nigerian Stock Exchange for the period 2007 to 2011. The study employed ex post facto and correlational research designs and data was collected from the financial statements of six sampled companies for the period under review. The dependent variable corporate financial performance was proxied with return on total assets while the independent variable cash flow statement was measured with operating, financing and investing activities. The variables were analysed using multiple regression analysis. The result from the regression analysis suggested that operating and financing cash flows positively and significantly affects return on total assets while the investing cash flow revealed a negative significant effect on return on total assets.

Amah, et al (2016) conducted a study of cash flow ratios and corporate financial performance of listed banks in Nigeria. The study employed ex post facto and correlational research design and the secondary data were collected from a sample of six banks quoted on the Nigerian Stock Exchange for the period 2005 to 2013. The dependent variable measured with profit after tax (PAT) while the independent variable was proxied with operating, financing and investing cash flows. The data obtained from the published annual reports was analysed

with Pearson correlation analysis. The result from the correlation analysis suggested that operating cash flow positively and significantly affects profit after tax while investing and financing cash flow revealed a negative and insignificant association.

Nwaiwua and Oluka (2017) investigated cash flow accounting and corporate financial performance of listed companies in Nigeria for the period 2004 to 2008 for a twenty four firm observations of non – financial firms. Their study employed ex post facto and correlational research designs and secondary data was obtained from the published financial statements of the sampled companies. The dependent variable corporate financial performance proxied by operating profit and profit before tax while the independent variables cash flow from operations, financing and investment activities. The data collected from the annual financial statements were analysed using multiple regression (panel data analysis)and the result revealed a positive and significant association between cash flow on operating profit and profit before tax.

Konak (2018) conducted a study on the effect of cash flows on corporate financial performance of listed companies on the Borsa Istanbul Industrial Index for the period 2008 to 2017. The study used ex post facto and correlational research designs and secondary data were obtained from the published financial statements of sampled companies. The dependent variable corporate financial performance was proxied using return on assets (ROA), return on equity (ROE) and Tobin-q while the independent variable cash flows were proxied usingoperating, investing and financing activities. The data obtained from the secondary sources was analysed with pooled ordinary least squares and panel data technique. The results from the regression analysis suggested a statistically significant association between cash flows and corporate financial performance.

Soet, et al (2018) investigated cash flow management and corporate financial performance of mutual funds in Kenya for the period 2011 to 2016. The study adopted causal research and secondary data were obtained from the published annual reports of the twenty two sampled companies. The secondary data collected from the financial statement were analysed using multiple regression analysis. The multiple regression output suggested that operating cash flow affects returns on assets positively and significant while return on equity showed a positive and insignificant effect with operating cash flow.

Liman and Mohammed (2018) conducted a study on the effects of operating cashflow on corporate financial performance of listed conglomerates in Nigeria for the period 2005 to 2014. The study employed ex post facto and correlational research designs. The population of the study consisted of six conglomerate and a sample size of five companies were selected for the purpose of data analysis. The study employed secondary sources of data collection from the financial statements of the sampled companies. The secondary data collected were analysed with descriptive, correlation and panel regression analysis. The panel regression analysis employed ordinary least square and random effects. The result revealed a positive insignificant relationship between operating cashflow and corporate financial performance for the period under review.

Musah and Kong (2019) investigated cash flows and financial performance of non-financial firms listed on the Ghana Stock Exchange for the period 2008 to 2017. The study employed ex post facto and correlational research design. The study target population comprised all non-financial companies listed on the exchange as at 31 December 2017 and the sample consisted of fifteen (15) companiesafter proper filtrations. The data for the study was obtained from secondary sources of data collection mainly from the published financial statements of the sample companies for the period under review. The data obtained from the published financial statements were analysed with descriptive and inferential statistics. The descriptive statistics used include minimum, maximum, mean, standard deviation, range, skewness and kurtosis whilst the inferential statistics employed Pearson moment correlation coefficient. The result from the analysis suggested that cash flows positively and significantly affects return on assets (ROA) while it showed a positive but insignificant relationship with return on equity (ROE) and return on capital employed (ROCE) for the sampled companies and period under review.

Nangih, Ofor and Onuorah(2020) conducted a study on cashflow management and corporate financial performance of oil and gas companies listed on the Nigerian Stock Exchange for the period 2013 to 2018. The study employed judgemental research designs and data for this study was collected the published financial statement of the sampled five oil and gas companies. The dependent variable for corporate performance was profit margin while the independent variable employed cash flow from operating activities, cash flow from investing activities and cash flow from financing activities as proxies for cash flow management. The data obtained from the annual reports were analysed using descriptive statistics, correlational matrix and random effect regression analysis. The random effect results revealed a negative and insignificant association between cash flow from operating and investing activities on corporate financial performance while cash from financing activities suggested a positive and significant association on corporate financial performance.

IV. Methodology

The methodology of this study consisted of research design, sources and methods of data collection, population and sample of the study, methods of data collection, variables, measurement and model specification.

Research Design: This paper was designed to investigatecash flow components and corporate financial performance of listed consumer goods companies in Nigeria. The study adopted a combination of ex post facto and correlational research design. Ex post facto research design is a systematic empirical study in which the researcher does not in any way control or manipulates independent variables because the situation for study already exists or has already taken place (Appah, 2020). Appah (2020) contend that correlational design shows the relationships between independent and dependent variables. These research designs were considered appropriate because they facilitate a comprehensive perspective of the major research questions and hypotheses in the study.

Population, Sampling Technique and Sample Size: The target population consists of all the twenty eight consumer goods companies listed on the Nigerian Stock Exchange. This study utilizes simple random sampling technique in selecting sample due to availability and completeness of data for the period under review. The sample size of the study comprised of twenty six companies that was determined using Taro Yamen's formula.

Methods of Data Collection: The data for this study was sourced from the published financial statement of sampled companies for the period 2015 to 2019.

Variable, Measurement and Model Specification: The dependent variable for this study is corporate financial performance and the independent variable consists of operating cash flow, investing cash flow and financing cash flow while the control variables consists of financial size and leverage. The variables for this study were measured using appropriate dimensions on the basis of prior studies as follows:

Table 1: Measurement of Variables

Variables	Type of Variable	Symbol	Measurement	Sources
Profit After Tax	Dependent	PAT	Natural Logarithm of the profit before tax	Amah, Micheal and Ihendinihu (2016)
Operating Cash Flow	Independent	OCF	Natural Logarithm of the cash flow from operating activities	Nangih, Ofor and Onuorah (2020)Liman and Mohammed (2018)Amah, Micheal and Ihendinihu (2016)
Investing Cash Flow	Independent	ICF	Natural Logarithm of the cash flow from investing activities	Amah, Micheal and Ihendinihu (2016)
Financing Cash Flow	Independent	FCF	Natural Logarithm of the cash flow from financing activities	Nangih, Ofor and Onuorah (2020); Amah, Micheal and Ihendinihu (2016)
Firm Size	Control	FIS	Natural Logarithm of the total assets	Zhu, Mbroh, Monney and Bonsu (2019); Oeta, Kiai, & Muchiri, (2019)
Financial Leverage	Control	FIL	Natural Logarithm of the total debt	Liman and Mohammed (2018)

Source: Researchers Compilation

The model for this study was developed using multiple regression analysis. Multiple regression analysis shows the variation in the value of the dependent variable on the basis of the variation in the independent and control variables. The assumption is that the dependent variable is a linear function of the independent variables. The multiple regression with an error (ε) is showed below:

$$LogPAT_{it} = \beta_0 + \beta_1 LogOCF_{it} + \beta_2 LogICF_{it} + \beta_3 LogFCF_{it} + \beta_4 LogFIS_{it} + \beta_5 FIL_{it} + \varepsilon \text{ ----------- 1}$$

Method of data analysis: This study employed descriptive, correlational and panel ordinary least square for the purpose of data analysis. The correlation analysis was used to examine the association between the variables. The descriptive statistics on the other hand served as a first step to assessing the nature of the sampling distribution from which the variables were drawn. The regression technique used by the study was a pooled ordinary least square.

V. Results and Discussions
Table 2: Descriptive Statistics

	PAT	OCF	ICF	FCF	FIS	FIC
Mean	0.057286	0.129735	0.110919	0.062015	-0.008476	0.973286
Median	0.044451	0.102058	0.112979	0.063409	-0.008000	0.991185
Maximum	0.264935	1.002754	1.634054	0.855773	0.019296	0.999792
Minimum	-0.196595	-3.723443	-0.655022	-1.836464	-0.058111	-0.240286
Std. Dev.	0.079513	0.433124	0.250577	0.258151	0.008166	0.121304

Skewness	0.345143	-6.639671	1.409397	-3.606125	-2.307012	-9.767665
Kurtosis	4.232207	61.77768	16.07824	30.24191	19.12856	98.20516
Jarque-Bera	8.644257	15735.01	775.6062	3441.266	1219.485	40931.16
Probability	0.013272	0.000000	0.000000	0.000000	0.000000	0.000000
Sum	5.957716	13.49246	11.53556	6.449523	-0.881504	101.2218
Sum Sq. Dev.	0.651205	19.32246	6.467252	6.864140	0.006868	1.515599
Observations	156	156	156	156	156	156

Source: Eview Version 10

Table 2 shows the descriptive statistics of the cash flow accounting and corporate financial performance of consumer goods manufacturing firms in Nigeria. The analysis reveals that the mean of profit after tax, operating cash flow, investing cash flow, firm size and financial leverage are 0.057286, 0.129735, 0.110919, 0.062015, -0.008476 and 0.973286. The maximum of the variables are 0.264935, 1.002754,1.634054, 0.855773, 0.019296, and 0.999792 while the minimum values are -0.196595, -3.723443, -1.836464, -0.058111 and -0.240286. The standard deviations of the variables are 0.079513, 0.433124, 0.250577, 0.258166, and 0.121304 while the skewness of the variables are 0.345143, -6.639671, 1.409671, -3.606125, -2.307012 and -9.767665.

Table 3: Correlation Analysis

Correlation Probability Observations	PAT	OCF	ICF	FCF	FIS	FIC
PAT	1.000000					

	156					
OCF	0.522260	1.000000				
	0.0000	-----				
	156	156				
ICF	0.193554	0.089514	1.000000			
	0.0490	0.3662	-----			
	156	156	156			
FCF	0.186657	0.076058	0.029340	1.000000		
	0.0578	0.4429	0.7675	-----		
	156	156	156	156		
FIS	0.059108	0.059805	0.448703	0.826163	1.000000	
	0.0512	0.0465	0.0000	0.0000	-----	
	156	156	156	156	156	
FIC	0.240544	0.004619	0.232880	0.717722	0.609970	1.000000
	0.0139	0.9629	0.0174	0.0000	0.0000	-----
	156	156	156	156	156	156

Source: Eviews Version10

Table 3 shows the correlation analysis shows that profit after tax (PAT) has a correlation with operating cash flow, investing cash flow, financing cash flow, firm size and financial leverage.

Table 4: Result on Regression Equation of PAT

Variable	Coefficient	Std. Error	t-Statistic	Prob.
LogOCF	3.211062	0.921333	3.485235	0.0018

LogICF	=3.829126	0.914271	-4.188176	0.0014
LogFCF	177.0182	30.14749	5.871740	0.0040
LogFIS	2.442075	0.620739	3.934141	0.0002
FIL	5.936128	0.723149	-8.208723	0.0000
C				

Effects Specification

Cross-section fixed (dummy variables)

Weighted Statistics

R-squared	0.725447	Mean dependent var	-2.502106
Adjusted R-squared	0.674954	S.D. dependent var	1.181383
S.E. of regression	0.866958	Sum squared resid	65.39059
F-statistic	14.36740	Durbin-Watson stat	1.65321
Prob(F-statistic)	0.000000		

Unweighted Statistics

R-squared	0.432826	Mean dependent var	-2.177589
Sum squared resid	80.65596	Durbin-Watson stat	1.587538

Table 4 shows the multiple regression analysis of profit after tax and operating cash flow, financing cash flow, investing cash flow, firm size, and financial leverage. The result shows operating cash flow with a probability of 0.0018 is less than the critical value of 0.05 revealed a positive (t-value of 3.485235) and significant relationship between operating cash flow and profit after tax of listed consumer goods manufacturing firms. The result also revealed that investing cash flow with a probability of 0.0014 is less than the p-value of 0.05; which means that there is a negative (t-value of -4.188176) and significant relationship between investing cash flow and profit after tax of listed consumer goods manufacturing firms. The result further revealed that financing cash flow with a probability of 0.0040 is less than the p-value of 0.05; which means that financing activities is positively and significant related to profit after tax. Additionally, the result showed a positive and negative relationship between firm size and financial leverage on profit before tax of listed consumer goods manufacturing firms.

TheR2 (coefficient of determination) of 0.72557 and adjusted R2 of 0.67495 shows that the variables combineddetermines about 73% and 64% of profit after tax. The F-statistics and its probability shows that theregression equation is well formulated explaining that the relationship between cash flow accounting and profit after tax are statistically significant (F-stat = 14.31740; F-pro. = 0.000000).

VI. Discussion of Findings

Hypothesis One: Operating cash flow does not have a positive and significant relationship on profit after tax of listed companies in Nigeria. The multiple regression analysis revealed that there is a positive and significant association between operating cash flow and profit after tax of listed consumer goods manufacturing firms in Nigeria. This result is consistent with the findings of Bingilar and Oyadonghan (2014); Nwanyanwu (2015); Ghanbari *et al* (2015); Nwakaego, et al (2015); Amah, et al (2016);Nwaiwua and Oluka (2017);Soet, et al (2018); Liman and Mohammed (2018); Musah and Kong (2019) that cash flow from operating activities and financial performance have asignificant positive relationship. On the other hand, the result contradicts the findings of Mongo (2010), Guda (2013) and Gheshlaghi, et al (2014);Nangih, et al (2020) the relationship between cash flow from operating activities and financialperformance is significantly negative. The result of this study implies that operating cash flow of organisations improves the level of financial performance.

Hypothesis Two: Investing cash flow does not have a positive and significant relationship on profit after tax of listed companies in Nigeria. The multiple regression analysis suggested that investing cash flow negatively and significant affects financial performance of listed consumer goods manufacturing firms in Nigeria. This result conforms to the studies of Bingilar and Oyadonghan (2014); Gheshlaghi, et al (2014);Nwakaego, et al (2015); Amah, et al (2016); Nangih, et al (2020)investing cash flow activities and corporate financial performance are negatively and significantly related. The study disagrees with the findings of Ghanbari et *al* (2015), Guda (2013) and Mongo (2010) that cash flow from investing activities has a positive and significant relationship withfinancial performance. The result of this study implies that an increase in the investing activities in any given organization reduces the level of financial performance.

Hypothesis Three: Financing cash flow does not have a positive and significant relationship on profit after tax of listed companies in Nigeria. The multiple regression analysis revealed a positive and significant association between financing cash flow and corporate financial performance of listed consumer manufacturing firms in Nigeria. This result is consistent with the findings of Mongo (2010), Guda (2013); Bingilar and Oyadonghan (2014); Nwakaego, et al (2015);Nangih, et al (2020) that there is a positive and significant relationship between financing activities and corporate financial performance of firms. On the other hand, the result disagrees with the findings of Ghanbari et *al* (2015) and Amah, et al (2016) that negative association exists between financing cash flow activities and corporate financial performance.

Hypothesis Four: Firm size does not have a positive and significant relationship on profit after tax of listed companies in Nigeria. The multiple regression analysis revealed a positive and significant association between financing firm size and profit after tax of listed consumer manufacturing firms in Nigeria. This result conforms to the findingsAkinyomi and Adebayo (2013); Sritharan (2015); Liman and Mohammed (2018); Oyelade (2019) that there is a positive association between size and corporate financial performance. On the other hand, the study disagrees with the findings of Vintila and Duca (2013); Tailab (2014); Močnik, &. Širec (2015) that there is a negative associationbetween firm size and corporate financial performance.

Hypothesis Five: Financial Leverage does not have a positive and significant relationship on profit after tax of listed companies in Nigeria. The multiple regression analysis suggested that financial leverage negatively and significant affects financial performance of listed consumer goods manufacturing firms in Nigeria. This result conforms to the studies of While other studies of Liman and Mohammed (2018); Iqbal and Usman (2018); Onaolapo and Kajola (2010); Oke and Afolabi (2011)there is a negative association between financial leverage and corporate financial performance. On the other hand, several studies such as Chandrakumarmangalam and Govindasamy (2010); Ibhagui and Olokoyo (2018); Iqbal and Usman (2018) have shown a positive association between firm size and corporate performance.

Conclusion, Implications and Recommendations
This study examined the influence of cash flow accounting on corporate financial performance of listed consumer goods manufacturing firms in Nigeria. The study reviewed prior studies on cash flow accounting and corporate financial performance. The reviewed studies provided positive and negative association between cash flow accounting and corporate financial performance. The result from the current study revealed a positive relationship between operating activities, financing activities and firm size on corporate financial performance of listed consumer goods manufacturing firms in Nigeria. On the other hand, investing activities and leverage showed a negative and significant relationship with corporate financial performance of listed consumer goods manufacturing firms in Nigeria. The paper therefore concludes that cash flow accounting influences the corporate financial performance of firms. The paper recommends that companies should understand their characteristics with regards to the sensitivity of liquidity and profitability; regulatory authorities should evolve appropriate policies that would discourage high profit-taking shareholder; Firms should always strike a balance between liquidity and profitability in their capital expenditure decision making. Also, the study has implications for theory and policy. The validation of agency theory underscores the relevance of the study in enriching literary content and advancement of social science as a discipline. Also, the policy implications of managers of companies to put in place appropriate polices of cash flow management that would improve corporate performance.

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