

MODERATING ROLE OF BOARD EXPERTISE ON THE EFFECT OF WORKING CAPITAL MANAGEMENT ON PROFITABILITY OF FOOD AND BEVERAGES COMPANIES QUOTED IN NIGERIA

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Abstract

Working capital management is deciding how to plan and control current assets and obligations, using both aggressive and cautious methods. The main objective is to evaluate the moderating role of board expertise on the effect of working capital management on profitability of food and beverages companies quoted in Nigeria from 2010-2020. The study adopts the ex-post facto research design. The scope of this study covers 15 food and beverage companies for a ten (10) year period from 2010-2020. The population consists of the 23 food and beverage companies operating in Nigeria. The sample size comprises 14 companies selected from the 15 quoted on the Nigerian stock exchange (NSE) by purposive sampling method which filters out those which do not meet the purpose of this study. The data used for this study were sourced from the various editions of the financial statements of the quoted firms sampled. Robust Generalized least square multiple regression technique was used to model estimation. The findings among others show that when the time to convert assets to cash for use is longer, the company's profitability will decrease having a reduction effect on return on assets that will accrue to shareholders. The study recommends among others that food and beverage companies should ensure that the set-in motion a buoyant arrangement with their debtor that will help them recover debts without much delay because prolonging the accounts receivable period has a negative effect on profitability.

Keywords: Board Expertise, Working Capital Management, Profitability

1. Introduction

Working capital management encompasses both aggressive and conservative approaches to planning and regulating current assets and liabilities. According to Akindele and Odusina (2019), firms that implement aggressive strategies invest in low levels of current assets as a percentage of total assets, meaning that the fraction of current liabilities in total liabilities will be considerable. Working capital

management is based on the idea of ensuring that an organization generates enough positive working capital in the form of cash from ongoing business operations to satisfy both debt payments and operating expenses on a regular basis (Martin, 2018).

The accounts receivable period (ARP), often known as the debtor's collection time, is the result of credit sales. When a company sells commodities on credit, it collects accounts receivables, and depending on the payment

terms, the company may receive cash weeks or even months after the goods have been delivered, according to Horne and Wachowicz (2017).

The Cash Conversion Cycle is the number of days between a company's payables payment and receivables collection. In terms of the regularity with which receivables are turned into cash, the firm's credit collection policy has an impact on account receivables. The cash conversion cycle is the time interval between the outlay of cash on raw materials and the inflow of cash from completed goods sales, and it indicates the number of days of operation for which financing is required; it can be used to calculate the amount of cash required for any sales level; it is the time interval between the outlay of cash on raw materials and the inflow of cash from completed goods sales, and it indicates the number of days of operation for which financing is required (Ojeani, 2017).

Return on assets (ROA) is an accounting ratio that measures a company's profitability as a percentage of total assets. The ability of a company's management to create revenue through the use of its assets is assessed by its return on assets (ROA). Return on Assets (ROA) is a financial performance indicator that tells users of financial statements how well a company uses its assets to generate income (Musa, Success and Ifurueze 2013). A higher return on investment (ROI) shows that a company is performing well. A increasing ROA, for example, may appear desirable at first glance, but it is unfavorable when compared to other companies in the same industry or the industry average (Siminica, et al, 2012).

The percentage of board members with a strong background in finance and accounting who can apply their knowledge to the organization's operations to achieve its goals is referred to as board expertise. Because it has the ability to alter both the direct and indirect relationships between working capital management and profitability, it is used as a moderating variable (Musa, Ifurueze and Bernard 2013).

Recent study on the impact of working capital management on corporate profitability, on the other hand, has shown mixed results, indicating that additional research is needed. Working capital management, for example, has no

significant impact on profitability, according to researchers such as Uzoamaka et al. (2017) and Taani (2019). The examined literature lacked critical analysis in which the researcher's personal viewpoint should be expressed, leaving a void that this study seeks to fill. Similarly, previous research on the impact of working capital management on corporate profitability has omitted a moderating factor. This is an area that this study focuses on by incorporating a moderating variable (board expertise) into the analysis of the effects of working capital management on the profitability of Nigerian food and beverage enterprises.

The main objective of this study is to evaluate the moderating role of board expertise on the effect of working capital management on profitability of food and beverages companies quoted in Nigeria from 2010-2020, while the specific objectives are to:

- i determine the effect of account receivables period on return on assets of foods and beverages companies in Nigeria,
- ii, establish the effect of cash conversion cycle on return on assets of foods and beverages companies in Nigeria,
- iii analyze the moderating role of board expertise on the effect of average receivables period on the return of assets of Nigerian foods and beverages companies, and
- iv investigate the moderating role of board size on the effect of cash conversion cycle on return on assets of foods and beverages companies in Nigeria.

2. Literature Review

Conceptual Framework

Working capital management, as represented by accounts receivable period (ARP), cash conversion cycle (CCC), and business profitability, as assessed by return on assets (ROA), comprise the conceptual framework, with board experience serving as a moderating variable.

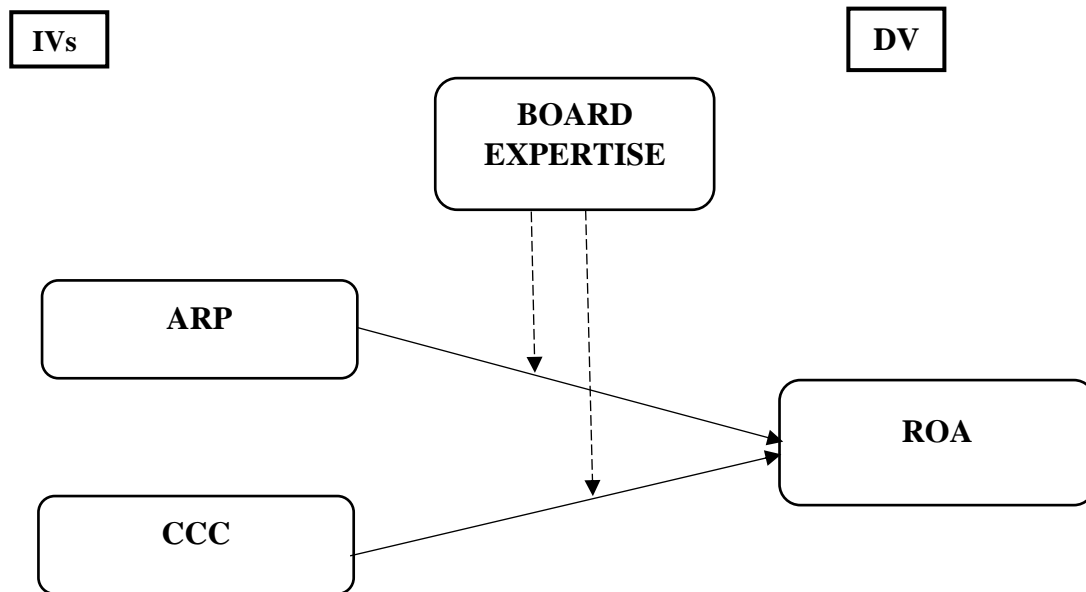


Figure 2.1 The Framework of the Study

Source: Researcher's Construct, 2022.

Working Capital Management

Working capital management is the process of managing a company's link between short-term assets and short-term liabilities so that it does not run out of cash when it is most required. According to Azeez (2015), working capital management refers to a company's decisions about how to attain the best current asset and current liability mix. Working capital is defined as the difference between current assets and current liabilities by Ojeani(2014), and its management is concerned with the availability of finances to run a business.

Khan and Rehman (2012) define working capital as money kept in materials, work-in-progress, finished goods, receivables, and cash equivalent. A company's working capital management ensures that the company's operations function smoothly and efficiently. Working capital is defined by Khan and Rehman (2012) as the monies held in materials, work-in-progress, finished goods, receivables, and cash equivalent. Working capital management is used by a company to ensure the smooth continuation of its operations and appropriate cash flow to pay down maturing short-term debt and upcoming operational expenses.

Preve et al. (2018) define working capital management as the choice on how much cash to set aside to satisfy short-term commitments as a

result of operational operations, which is the definition used in this study. This is because the goal of working capital management, according to this study, is to ensure that a company does not run out of cash when it is needed and does not have too much cash on hand.

Profitability

Profitability, as a measure of a company's financial performance, refers to the outcome of a company's overall policies and activities in terms of money earned in excess of expenditure. Financial performance, according to Kabethi (2013), is the process of calculating the monetary results of a company's policies and operations. According to Machiuka (2010), financial performance analysis represents the company's financial status, its level of competitiveness in the same sector, and a full understanding of the firm's cost and profit centers.

Return on assets (ROA), return on equity (ROE), earning per share (EPS), return on capital employed (ROCE), dividend per share (DPS), and return on investment (ROI) are some of the measures used to measure financial performance. For the purposes of this study, profitability is determined by the efficiency with which a firm's assets were utilised to generate returns for its owners or return on assets (ROA).

Accounts Receivable Period and Return on Assets

The length of time it takes consumers to settle their debts is referred to as the accounts receivable period (ARP) or debtor's collection period (DCP). According to Lantz (2008), the average number of days it takes a corporation to receive payments from consumers to whom items have been given is the account receivable period. Account receivable time is calculated by dividing the average debtor's payment by net sales and multiplying the result by the average number of days in a year, which is usually 365 days. According to Korede (2017), ARP analyzes the average number of days it takes customers to pay their invoices, demonstrating how effective the company's credit and collection processes are.

According to Almazari (2013), the Account Receivables Period and Gross Operating Profit have a significant negative association. Molina and Preve (2019) investigate the impact of trade receivables on firm financial difficulties and discover that when a company invests heavily in clients through credit sales, it faces cash flow issues. According to Erik (2012), where an organization's policy allows customers to pay over a longer length of time, profitability may grow.

Cash Conversion Cycle and Return on Assets

The cash conversion cycle, according to Korede (2017), is a cash flow calculation that aims to assess the time it takes a company to convert its inventory and other resource inputs into cash. In other words, the cash conversion cycle is the time it takes for cash to be held in inventory until it is sold and collected from customers. Cash conversion cycle is a comprehensive metric of measuring the efficiency of working capital management, according to Dong and Su (2010). According to Azeez (2015), the cash conversion cycle, also known as the cash cycle, is a measurement of the period between cash distribution and cash collection, and it is simply the number of days that pass before credit sales are paid by a company, as assessed by when companies actually pay for their inventories.

Cash conversion cycle has a positive relationship with company performance, according to Sharma and Kumar (2011), and cash collection cycle has a good relationship with firm performance, according to Akinlo

(2011). According to Lazaridis and Tryfonidis (2016), there is a negative association between cash conversion cycle and company performance, and organizations can increase profits by properly managing the cash conversion cycle and keeping each component at an optimal level. According to Azeez (2015), the longer the cash conversion cycle is, the more working capital investment is required. The length of the cash conversion cycle is determined by the length of the inventory conversion period, the trade receivables collection period, and the trade payables deferral period.

Moderating Variable: Board Expertise

The proportion of a company's board of directors that have specialist understanding of accounting and finance is referred to as board expertise (Musa, Success and Nwaorgu 2015). In this study, board expertise was utilized as a moderating variable, and a variable must meet certain criteria in order to be qualified to be used as a moderating variable in a relationship between an independent and a dependent variable, including: To begin, there must be an existing relationship between the independent and dependent variables to be moderated, and in this study, the accounts receivable period and cash conversion cycle are linked to company profitability. Second, the independent variable (board size) must be chosen in such a way that the importance of the moderating variable on the independent variable is clearly justified. Third, there must be an established and consistent association between independent and dependent variables, and the moderating variable must be capable of assessing the dependent variable independently even when the independent variable is absent (Kennedy, 2008).

Theoretical Review

Contingency Theory

In his seminal 1964 article, A Contingency Model of Leadership Effectiveness, Australian Psychologist Fred Edward Fiedler proposed the contingency theory of leadership. CT is founded on the assumption that a good match between certain components of a managerial organization and certain situations will increase the performance of that organization. Among these, the organization's structure is probably the most frequently linked to contingencies. Environment, organizational size, strategy, and

technology are all factors that influence the structure of an organization. A contingency is a relationship between two phenomena in which, if one phenomenon exists, a conclusion about the other phenomenon can be derived. According to contingency theory, each of these contingencies demands the presence of specific structural traits. When an organization's structure matches the qualities of the scenario in question, it's a good match. The organization's performance should improve as a result of this fit (Harney, 2016). A one-size-fits-all strategy, according to contingency theory, is ineffective since management strategies' effectiveness is reliant on the situation in which they are used. Another assumption underlying contingency theory is that no single organizational structure is equally suitable to all organizations, and that there is no one ideal way to organize because the right shape varies on the task or environment.

One advantage of the contingency theory is it seemingly simplistic approach.

The contingency theory, which holds that managers assess the situation at a given time while making decisions that influence the firm, is the theory that underpins this research. Because, like the theory, this study argues that the pressure on how quickly debtors should pay their obligations and how short the cash conversion cycle should be is situational, it is based on the contingency theory (contingent).

Empirical Review

Olaoye and Okunade (2020) look into the effect of working capital management on the profitability of Nigerian publicly traded manufacturing firms. Using panel least square multiple regression for model estimate, the study discovers a significant effect of working capital management (ITID, CPP, and ACP) on profitability of listed manufacturing businesses in Nigeria. The payment length for creditors, on the other hand, has a significant impact on profitability, whereas inventory turnover days and account receivables period have little impact. They believe that effectively managing working capital over time will help industrial companies improve their financial performance. They failed to identify the time period covered by their research, casting serious doubt on their findings.

Wang, et al. (2020) look into the effect of working capital management (WCM) on a

company's financial performance at different stages of its life cycle (CLC). Between 2005 and 2014, the research sample comprised of Pakistani non-financial listed firms nested in 12 different industries, and the hierarchical linear mixed (HLM) estimator was used to examine multilevel data where observations were not completely independent. According to the statistics, WCM has a negative impact on firm performance. This influence, on the other hand, varies depending on where a company is in its life cycle. According to the authors, firms should follow an aggressive strategy because they require specialized WCM methods to achieve long-term financial success at each point of their life cycle. Because it was conducted or released in a different economic situation than Nigeria, and it used data from 2014, which is six years behind 2020, their research suffers significantly from a currency problem.

The impact of working capital management on supermarket financial performance is investigated by Kabuye et al. (2019). This research was cross-sectional and correlational, and it employed firm-level data from 110 supermarkets in Uganda collected using a questionnaire survey. The findings show that working capital management has a significant impact on financial performance and that, contrary to popular assumption, internal control systems have no significant impact on financial success. They argue that further research is needed to better understand the impact of internal control systems and working capital management on financial performance. They obtained their data using surveys, which have validity and reliability difficulties. They advise enterprises to follow an aggressive strategy because long-term financial performance requires bespoke WCM programs at each stage of a company's life cycle. Because it was conducted or released in a different economic situation than Nigeria, and it used data from 2014, which is six years behind 2020, their research suffers significantly from a currency problem.

Prempeh (2019) looks into how working capital management affects company profitability in emerging countries. A balanced panel of 11 manufacturing businesses was used on the Ghana Stock Exchange. From 2011 to 2017, the study was carried out. The influence of working capital management on profitability was

explored using dynamic panel regression (Arellano-Bond Estimation). According to the study, working capital management has a significant positive impact on firm profitability. They advise managers to design a policy for managing working capital that is both effective and efficient. policies aimed at achieving long-term financial performance at each stage of a company's life cycle. Their research is limited by the fact that it was performed or published in a foreign currency because the study was conducted or published in a different economic situation than Nigeria, and because it used 2014 data, which is six years behind 2020 when the study was conducted or published.

Using data from listed enterprises on the Ho Chi Minh Stock Exchange, Le et al. (2018) evaluate the impact of working capital management on financial performance (HOSE). A total of 69 public companies were included in the sample, which was collected over a three-year period from 2014 to 2016. Working Capital Management is measured using the variable Cash Conversion Cycle (CCC). Return on Assets (ROA), Return on Equity (ROE), and Return on Sales are the variables that are used to measure financial performance (ROS). Working Capital Management has a beneficial impact on the financial performance of the companies in the sample, according to the results of ordinary least square regression. They advocate for greater study that takes into account more variables. For data analysis, they employed conventional least square without pooling to panel format, which is an ineffective analytical method for panel data.

Abdulazeez et al. (2018) investigate the impact of working capital management on the financial performance of Nigerian listed conglomerate companies over a ten-year period (2005-2014). The study's data was gathered statistically from the companies' annual reports and financial statements. The study used descriptive statistics to characterize the variable, while correlation was used to determine correlations between the variables. The presence or absence of multicollinearity was determined using the Variable Inflation Factor (VIF), and the data was analyzed using Ordinary Least Square (OLS) regression. It was discovered that the collection duration for receivables and the payment term for payables have a negative impact on profitability, but the cash conversion cycle has a

favorable but negligible impact on the financial performance of the organizations analyzed. They recommend, among other things that listed conglomerate firms keep or minimize their receivables collection term in order to preserve or improve financial performance. For data analysis, they employed conventional least square without pooling to panel format, which is an ineffective analytical method for panel data.

Gap in Literature

The most major gap this study fills is the addition of board experience as a moderating variable, which was not included in all of the literature examined. Second, unlike any of the other research studied, this study included critique as part of the empirical evaluation. Second, data from 2018 was included, which had previously been excluded by analyses done even in 2020, such as Wang, Akbar, and Akbar (2020). Finally, the Ramsey RESET was used to ensure model validity, the heteroskedasticity test was used to ensure residual variance stability, the Pearson correlation and variance inflation factor was used to test and confirm the presence or absence of multicollinearity, and the Shapiro-Wilk data normality test was used to ensure data normality. None of the studies examined used this number of pretests. By integrating a moderating variable, including critique in the empirical review, using 2018 data that was excluded by 2020 research, and failing to undertake adequate pre-estimation testing, this study fills gaps in the literature.

3. Methodology

Because the events under investigation have already occurred and historical data is already available in the financial accounts of the individual companies, the study uses an ex-post facto research design as stated in the work of Musa, Success and Iyaji (2014). The study's scope spans 15 food and beverage firms over a ten-year period, from 2010 to 2020. The study's population comprises of the 23 food and beverage enterprises that operate in Nigeria. The sample size consists of 14 businesses chosen from the 15 listed on the Nigerian Stock Exchange (NSE) using a purposive sampling strategy that eliminates companies that do not match the study's objectives. The information for this study came from various editions of the financial statements of the foods and beverages

that were sampled. Robust Model estimate was done using the generalized least square multiple regression technique. The robust least square technique was employed to estimate model parameters since it is the most effective method for evaluating linear relationships between cross-sectional or longitudinal panel data, which was the case in this investigation..

Model Specification

This adopts a bi-model approach for ease of presentation and clarity of analysis adapted from Yahaya and Bala (2015)

$$(ROA_{it} = \beta_0 + \beta_1(CUR)_{it} + \beta_2(QUR)_{it} + \beta_3(CAR)_{it} + \beta_4(PS)_{it} + \mu_{it})$$

is presented as follows:

$$ROA = f(ARP + CCC + BEXPT) \quad (1)$$

In econometric term, the above equation becomes:

$$ROA_{it} = \beta_0 + \beta_1ARP_{it} + \beta_2CCC_{it} + \beta_3BEXPT + \mu_{it} \quad (2)$$

Where,

ROA = an indicator representing Profitability (Dependent Variable);

= Intercept term (a constant);

and = Coefficient of un-moderated independent variables (ARP and CCC);

and = Coefficient of the board expertise-moderated variables;

ARP = a predictor representing Independent Variable (accounts receivable period)

CCC = a predictor representing Independent Variable (cash conversion cycle);

BEXPT*ARP = A predictor for board expertise moderated accounts receivable period;

BEXPT*CCC = A predictor for board expertise moderated cash conversion cycle;

= Residual term (Impact of Omitted variables);

= Firms;

= Periods

f = Functional relationship.

4. Data Presentation and Analysis

Descriptive Statistics

Table 1 below is the summary statistics which describe the extent of dispersion of the variables

Table 1: Summary of Descriptive Statistics

Variables	Obs	Mean	Std. Dev.	Min	Max
ROA	140	.0279	.3783	-2.36	2.82
ARP	139	267.537	1164.356	-6084.08	8270.21
CCC	140	3741744	1.91e+07	-6.38e+07	1.02e+08
BEXPT	140	.5208	.0877	.36	.75

Source: STATA 12 output, 2022.

Table 1 shows that, with the exception of board skill, all of the variables have a higher standard deviation (.3783, 1164.356, and 1.91e07) than their respective mean (.0279, 267.537, and 3741744), showing that they grew at a quicker rate during the time period analyzed. The standard deviation of board expertise is.0877, which is lower than the mean (-5208), indicating a modest growth rate. The table also demonstrates that all of the variables have means that are predicted to be within the range of the minimum and maximum values, indicating that they were uniformly distributed.

Ramsey RESET

The Ramsey regression equation specification error test (RESET), which determines the adequacy of the supplied model, is shown in Table 2. A model with a p. value less than 0.05 is well defined, while one with a p. value greater than 0.05 is miss-specified, according to the rule of thumb.

Table 2: Ramsey RESET test using powers of the fitted values of ROA

Statistic	p-value
F(3, 132) = 23.21	Prob> F = 0.0062

Source: STATA 12 output, 2022.

Table 2 above shows a prob. value of 0.0062 which is lower than 0.05 meaning that the null hypothesis which states that the model has no omitted variables is accepted indicating that the model is well specified.

Variance Stability Test: Heteroskedasticity

The results of the heteroskedasticity test to determine the residual variance's stability are shown in Table 2. The rule of thumb is that if the prob chi2 value is less than 0.05, the model is heteroskedal (non-constant variance), whereas if the prob chi2 value is greater than 0.05, the model is homoskedal (constant variance), and the findings gained are good for forecasting future outcomes.

Breusch-Pagan / Cook-Weisberg test for heteroskedasticity

Ho: Constant variance

Variables: fitted values of roa

chi2(1) = 74.83

Prob> chi2 = 0.1899

Source: STATA 12 output, 2022.

Table 2 above shows that the model has a prob. chi2 of 0.1899 which is higher than 0.05 indicating that the null hypothesis that there is a constant variance is accepted as the model is homoskedal.

Pearson Correlation Test for Multicollinearity

Table 3. below shows the correlation matrix that reveals the strength of the relationship between the proxies of the independent variable.

```

-----
roa      arp      ccc      bexpt
-----
roa      1.0000
arp      -0.0141  1.0000
ccc      0.0113  0.0236  1.0000
bexpt    -0.0879 -0.0892  0.0160  1.0000
-----
    
```

Source: STATA 12 output, 2022.

According to Hair, et al., a multicollinearity problem does not exist in this model because no two independent variables correlate up to 0.85, which is the point above which multicollinearity difficulties arise (2005). However, another test (variance inflation factor) was performed to confirm the results obtained from the Pearson correlation in Table 3.4 above.

Variance Inflation Factor

A further multicollinearity test using variance o=inflation factor is conducted with the results in Table 4 below. According to Eriabie and Izedonmi (2016), any variable with VIF greater than 10 has multicollinearity problem.

```

-----
Variable VIF    1/VIF
-----
arp      1.01    0.9914
bexpt    1.01    0.9917
ccc      1.00    0.9991
-----+-----
Mean VIF |    1.01
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```

Source: STATA 12 output, 2022.

Table 4 above reveals that the independent variables have VIF that are far less that 10 with a mean VIF of 1.01 confirming the correlation test which revealed the absence of multicollinearity among the independent variables.

Data Normality Tests

The results of the data normality test using the Shapiro-Wilk normality test are shown in Table 5. Any variable with a p. value less than 0.05 is not normally distributed, but those with a p. value more than 0.05 are normally distributed.

Table 5: Shapiro-Wilk Normality Test

Variable	Obs	W	V	z	Prob>z
Roa	140	0.47655	57.416	9.149	0.00000
arp	139	0.33620	72.367	9.668	0.00000
ccc	140	0.76168	26.141	7.372	0.00000
bexpt	140	0.98520	1.624	1.095	0.13680

Source: STATA 12 output, 2022.

Table 5 shows that three of the 75 percent of the model's variables were not normally distributed, with p. values of 0.0000 or less than 0.05. Even though just 25% of the board's expertise was regularly dispersed, it is possible to conclude that the model is not normally distributed. Because one of the key assumptions of OLS, that of normal data distribution, has been violated, the ordinary least square (OLS) technique cannot be utilized to estimate the model..

Regression Analysis Using Robust Generalised Least Square

This model captures the direct effect of the independent variables (including the moderating variable) on the dependent variable.

Table 6 Model Regression Analysis.

Robust				
Roa	Coef.	Std. Err.	t	P> t
arp	-6.5306	6.5806	-1.19	0.609
ccc	-1.0109	6.8310	-1.88	0.062*
bexp	t.2433	.28440.86	0.408	
_cons	.1526	.14731.04	0.319	
R-squared overall		0.4309		
F-statistics		22.49		
Prob> F		0.000		

Source: STATA 12 output, 2022.

Table 6 shows that the overall R-squared, which represents the model's goodness of fit, is 0.4309, or about 43%, implying that the independent variables, accounts receivable period (ARP), cash conversion cycle (CCC), and the moderating variable (board expertise), have a combined effect of 43% in the systematic variation experienced in return on assets of

foods and beverages companies over the ten years studied. The combined F-statistics of 22.49 and F-prob. of 0.000 indicate that the model is fit.

Table 6 also shows that accounts receivable period (ARP) has an insignificant negative effect on return on assets with a t-value of -1.19 and a p. value of 0.609, and cash conversion cycle has an insignificant negative effect on profitability measured by return on assets (ROA) with a t-value of -1.88 and a p. value of 0.0602. The moderating variable (BEXPT) has an insignificant direct effect on return on assets

Test of Hypotheses: Hypothesis One: Ho1: Accounts receivable period (ARP) has no significant effect on profitability measured by return of asset of foods and beverages companies in Nigeria.

Interpretation: This result shows that accounts receivable period has an insignificant (0.499) negative effect (-.70) on return of assets of the foods and beverage companies in Nigeria from 2010-2020.

Decision rule and action: The decision rule is to reject the null hypothesis if the prob. value is lower than 0.05 or accept the hypothesis if prob. value is higher than 0.05. Based on this, the null hypothesis is accepted.

Hypothesis Two: Ho2: Cash conversion cycle (CCC) has no significant effect on profitability measured by return of asset of foods and beverages companies in Nigeria.

Interpretation: This result shows that cash conversion cycle (CCC) has a significant (0.022) negative effect (-2.12) on return of assets of the foods and beverage companies in Nigeria from 2010-2020.

Decision rule and action: The decision rule is to reject the null hypothesis if the prob. value is lower than 0.05 or accept the hypothesis if prob. value is higher than 0.05. Based on this, the null hypothesis is rejected.

Hypothesis Three: Ho3: Board expertise plays no significant role on the effect on accounts receivable period (ARP) on profitability measured by return of asset of foods and beverages companies in Nigeria.

Interpretation: This result shows that board expertise plays an insignificant moderating role

(0.564) on the effect of accounts receivable period on return of assets of the foods and beverage companies in Nigeria from 2010-2020.

Decision rule and action: The decision rule is to reject the null hypothesis if the prob. value is lower than 0.05 or accept the hypothesis if prob. value is higher than 0.05. Based on this, the null hypothesis is accepted.

Hypothesis Four: Ho4: Board expertise plays no significant role on the effect of cash conversion cycle (CCC) on profitability measured by return of asset of foods and beverages companies in Nigeria.

Interpretation: This result shows that board expertise plays a significant moderating role (0.003) on the effect of cash conversion cycle on return of assets of the foods and beverage companies in Nigeria from 2010-2020.

Decision rule and action: The decision rule is to reject the null hypothesis if the prob. value is lower than 0.05 or accept the hypothesis if prob. value is higher than 0.05. Based on this, the null hypothesis is rejected.

5. Discussion of Findings

Accounts receivable period (ARP) has a coefficient of 0.00005, a t-value of -.70, and a p-value of 0.499, indicating that accounts receivable period has an insignificant negative effect on return on assets (ROA) and that, holding other variables constant, a unit increase in the number of days debtors delay in paying these foods and beverages companies in Nigeria will result in a 3.12 unit decrease in return on assets. This study concurs with Olaoye et al (2019) and Lawal (2017), who found that the accounts receivable term had no substantial impact on financial performance. However, it contradicts the findings of Vartaket al (2019), Bhutto et al (2018), and Korede (2017), who found a substantial association between accounts receivable period and financial success.

The cash conversion cycle (CCC) has a coefficient of -2.1309, a t-stat of -2.12, and a prob. of 0.022, indicating that it has a significant effect on return on assets (ROA), such that a unit increase in the cash conversion cycle will have a decreasing effect on firm performance of quoted foods and beverages companies in Nigeria from

2010 to 2020. This finding agrees with those of Abdullazeez et al (2018), Uzoamaka et al (2017), and Niresh (2013), who discovered that the cash conversion cycle had a negligible impact on profitability. However, this conclusion contradicts Lawal (2017) and Akindele et al (2015), who found that CCC had a significant impact on company performance.

The study also finds that board expertise has a minor impact on the effect of the accounts receivable term on the return of assets of Nigerian food and beverage enterprises. While board expertise is important in determining the impact of the cash conversion cycle on financial success as measured by ROA.

6. Conclusion and Recommendations

From the findings and summary of this study, the following conclusions were drawn.

- i. That when the time to convert assets to cash for use is longer, the company's profitability will decrease having a reduction effect on return on assets that will accrue to shareholders.
- ii. That increase in the number of days debts are recovered (accounts receivable period) has shown to reduce profitability because when debtors are allowed more days before paying their debts, the cash availability especially for unanticipated beneficial business opportunities reduce and so profitability will decrease as it exerts a negative effect.
- iii. Board expertise has shown to be non-useful moderator on the effect of accounts receivable period on profitability.
- iv. Board expertise has proved to be an important moderating variable in the estimating the effect of cash conversion cycle on profitability

Based on the findings of this study, the following recommendations are made:

- i. Foods and beverages companies should ensure that the set-in motion a buoyant arrangement with their debtor that will help them recover debts without much delay because prolonging the accounts receivable period has a negative effect on profitability.

ii. Foods and beverages companies should ensure that a perfect material recycling strategy is adopted to avoid delay in converting materials to cash since extended conversion cycle has a negative effect on profitability of their firms.

iii. Board expertise should be regarded as an important moderator when the effect of accounts receivable period on profitability is to be determined as it plays no significant role in the relationship.

iv. Board expertise should be recognized as useful moderating variable when ascertaining the effect of cash conversion cycle on profitability as it plays a significant role in their relationship.

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