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RESPONSIVENESS OF FIRM PERFORMANCE INDICES TO FINANCIAL ASSETS OF BANKS IN NIGERIA

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Abstract
The study carried out an empirical analysis of the responsiveness of firm performance indices to financial assets of banks in Nigeria covering the period 2007-2016. To actualize the objectives of the study, data was extracted from the financial annual statements/reports of the selected money deposit banks. The data collected were time series secondary data and variables used were treasury bills, borrowings, investment in securities and profit before tax. The methodology adopted in the research is the panel data regression technique. Findings from the analysis revealed that treasury bills have a positive but insignificant responsiveness on profit before tax of selected money deposit banks in Nigeria, borrowings have a positive but insignificant responsiveness on profit before tax of selected money deposit banks in Nigeria and investment securities have a positive but insignificant responsiveness on profit before tax of selected money deposit banks in Nigeria. It was therefore recommended in the study that the management of financial assets should ensure an optimal balance between treasury bills, borrowings and investment securities and investors and analysts should be encouraged to use the position of financial assets in evaluating the performance of banks before forming opinion on the firm.
Keywords: Firm Performance, Firm Performance Indices, Financial Assets, Nigeria

1.1 Introduction
The primary aim of any organization is to always attain to an impressive level of performance. The performance of a firm is the signal of its sustainability and survival. The economic well-being of any organization, whether in production or in services depends on careful monitoring and management of the financial assets within and outside of that organization from time to time. The present world of business operation is characterized by considerable amount of uncertainty regarding the demand, supply and market price as there are operational costs for every business activities while business information is costly and not evenly distributed. Similarly, every firm has its own limits on the production capacity and technology in terms of core competency which determine the nature of investments and financing risk Benjamin (2009).

Financial assets are one of the most important factor that can affect the performance and survival of an organization. The position of financial assets especially in the banking sector according to Helen (2002) is one of the most common financial reports to assess the steps and decisions taken by management in the running of the organization. Financial asset is a

concept in accounting and finance used to describe a non-physical asset whose value is derived from a contractual claim, such as bank deposits, bonds, and stocks, etc. Financial assets are usually more liquid than other tangible assets, such as commodities or real estate, and may be traded on financial markets. The status of financial assets and quality as an aspect of bank management entails the evaluation of a firm asset in order to facilitate the measurement of the level and size of credit risk associated with its operation. It focuses on the quality of loans which provides earnings for a bank. Financial asset quality and loan quality are two terms with basically the same meaning while its management is considered extremely important by the banking sector. According to the Basle Committee on Banking Supervision, the core principles for effective banking supervision comprised twenty-five core principles out of which seven are designed to address the relevant issues of bank asset quality or credit risk management Basle (1997). This implied that asset quality is of general concern to financial supervisory authorities in every country throughout the world.

1.2 Statement of Problem

The sustainability and impressive performance of any bank is highly dependent on the availability, management and flexibility of its financial assets. However, uncertainty beclouds the management of the financial assets of banks in Nigeria and this, to a large extent, affects their performance, since the Nigerian business environment is not completely immune from this global trend of financial crisis and uncertainties. The Central Bank of Nigeria (CBN) over the years has developed several measures aimed at providing sound banking environment and safeguarding various stakeholders' interest in the financial system, but despite their efforts, the banking system continues to experience some hitches that erode investors and depositors such as the bail-out of some ailing banks. This banking challenge raised a research enquiry on the nature of the relationship between banks financial assets and performance in Nigeria due to the indispensable nature of banking operation in the financial intermediation process and development.

1.3 Objectives of the Study

The general objective of this study is to carry out an empirical analysis of the responsiveness of firm performance indices to financial assets of banks in Nigeria. This necessitates the actualization of the following specific objectives:

1. To ascertain the effect of treasury bills on profit before tax of selected money deposit banks in Nigeria.
2. To evaluate the effect of borrowings on profit before tax of selected money deposit banks in Nigeria.
3. To ascertain the effect of investment securities on profit before tax of selected money deposit banks in Nigeria.

1.4 Research Questions

The following research questions are raised for the sturdy:

1. To what extent has treasury bills affected profit before tax of selected deposit money banks in Nigeria?

2. What level of impact do borrowings have on profit before tax of selected deposit money banks in Nigeria?

3. To what extent has investment securities affected profit before tax of selected deposit money banks in Nigeria?

1.5 Statement of Hypotheses

In the course of the study, the following hypotheses were tested:

i. Ho: Treasury bills have no positive and significant impact on profit before tax of selected money deposit banks in Nigeria.

ii. Ho: Borrowings have no positive and significant impact on profit before tax of selected money deposit banks in Nigeria.

iii. Ho: Investment Securities have no positive and significant impact on profit before tax of selected money deposit banks in Nigeria.

REVIEW OF RELATED LITERATURE

2.1 Conceptual Reviews

2.1.1 Financial Assets

According to Scott (2003), financial asset shall be recognized in accounting when, and only when, an entity receives or in accordance with the ongoing contract obtains a right to receive cash or another financial asset. Forecast transactions and received guarantees are not recognized as the entity's assets as long as they do not meet the definition of financial assets. At initial recognition, notes Scott (2003), shall measure a financial asset at its acquisition cost. The acquisition cost of a financial asset might also include direct transaction costs.

According to IFRS (2006), Acquisition cost is determined on the basis ofthe amount of cash paid for a financial asset or the value of another delivered asset. If payment for a purchased asset is deferred for a period longer than 12 months, and the interest rate is not prescribed by the contract or it significantly differs from the market interest rate, the acquisition cost is determined by discounting the total payable amount to the present value at the market interest rate. The difference is recognized as interest expenses over the entire period of repayment.Acquisition cost of a financial asset received in an exchange transaction is determined by adding all related transaction costs to the value prescribed by the exchange agreement. If the value of the asset is not prescribed by the exchange agreement, the acquisition cost of the financial asset equals to the fair value of the financial asset given up in exchange.

2.1.2 Financial Performance

Financial performance is a subjective measure of how well a firm can use assets from its primary mode of business and generate revenue, Investopedia (2016). It is also a measure of the result of a firm’s policies and operation in monetary terms. Banks performance is usually evaluated using parameter such as turnover made during the year and ability to sustain it, extension of branches to the grass root, net profit of the bank, computerization of its numerous branches, net profit after tax, ratios, return on capital employed, return on equity, share price, improvement in the employee performance and returns on Assets, Dermerguckunt and Huizinga (1999); Naccur (2003).

2.1.3 Profitability

Profit and profitability are two different words although they may look alike. Profit is the difference between revenues earned from sales of products and the cost acco-mpanied with the customer relationship in a given period. Dauda, Maishanu and
Mwoli (2013) opine that profit is the remaining of the revenue generated after a business has finished paying all expenses associated with the running of the business operating activities. They further described profitability as an index for measuring efficiency that is related to the success or failure of a business. In the light of the above, profitability also means a process of a business to produce a return on an investment based on its resources in comparison with an

alternative investment. Both are metric for measuring the restriction of a company's profit in relation to the magnitude of the business. However, profit is an index for measuring the relationship that exists between customer and the firms. Customers who are not viable or beneficial to the firms are subsequently detached to avoid losses. Firms often have proactive measure in determining the future value to be derived by serving a customer Kapian and Narayan (2) The theories related to the concept under study are reviewed in this section of the study.

2.2. Theoretical Reviews

2.2.1 Financial Intermediation Theory

This theory holds that a bank's financial assets can be managed through the proper phasing and structuring of the loan commitments made by a bank to the customers. Here the assets can be planned if the scheduled loan payments by a customer are based on the future of the borrower. According to Nzotta (1997) the theory emphasizes the earning potential and the credit worthiness of a borrower as the ultimate guarantee for ensuring adequate liquidity. Nwankwo (1991) posits that the theory points to the movement towards self-liquidating commitments by banks. This theory has encouraged many commercial banks to adopt a ladder effects in investment portfolio.

2.3 Empirical Reviews

Some of the related previously studies on the subject were examined in this section:

Berger and Bouwman (2009) carried out a research on the relationship between financial assets management and bank profitability, found a significant positive relationship between financial asset management and bank profitability. Despite the overwhelming evidence of significant positive relationship between financial asset adequacy and bank financial performance, the study of Eichengreen and Gibson (2001) indicated the need to be cautious because their results showed that capital would only have significant positive relationship with profitability to a certain limit, thereafter, the relationship could be negative due to bureaucratic and other reasons.

Hayden, Porath and Westernhagen (2007) and Berger, Hasan and Zhou (2010) investigated the effect of financial assets on financial performance of banks in the German and Chinese banking sector respectively. Both studies revealed that an increase in loan diversification reduces bank financial performance. Similarly, Tabak, Fazio and Cajueiro (2010) tested whether diversification of financial assets is associated with better financial performance of the Brazilian banking system. They found that financial assets concentration increases returns and reduces default risk.

Aremu (2011) investigated liquidity series of Nigerian banks to highlight aspects of vulnerabilities. The study focused on the Central Bank's Lender of Last Result (LOLR) policy may affect banking in the period of liquidity crises. Time series data were extracted from the three biggest banks (in terms of assets, capital base, turn over and branch networks) for the study. The Ordinary Least Square (OLS), Johansen co-integration, Error Correction Mechanisms (ECM), and Granger Causality tests were employed to show prima facie evidence that bank A and B are more liquid than bank C because proxies of liquidity series and Tobin's Q of the banks are significant.

Benjamin and Kamalavali (2006) had current ratio, quick ratio, inventory turnover ratio, working capital turnover ratio, debtor's turnover ratio, ratio of current asset to total asset, ratio of current asset to operating income, comprehensive liquidity index, net liquid balance independent variables while the dependent variable was return on investment (ROI) in an investigation that revealed a negative association between ROI and current ratio, cash turnover ratio, current asset to operating income and leverage. There was a positive

association between ROI and quick ratio, debtor's turnover ratio, current asset to total asset and growth rate.

Saleem and Rehman (2011) examined the influence of treasury bills on profitability, with Return on Equity (ROE), Return on Assets (ROA), and Return on Investment (ROI) as exogenous variables, while the endogenous variables are current ratio, acid test ratio or quick ratio and liquid ratio. By adopting the linear regression model, the study provided evidence that ROA is significantly influenced by treasury bills but ROE is unaffected by other treasury bills.

Bordeleau and Graham (2010) determined the impact of financial assets on bank profitability for a panel of Canadian and US Banks over the period of 13 years (1997 – 2009) through econometric analysis. Result suggests increased profitability for banks with some quantum of liquid assets, however, beyond a point, holding further liquid assets diminish a bank's profitability. Further empirical evidence also suggests that the link between the duos is dependent on the bank's framework and the economy in general.

Amah et al (2016) examined the relationship between financial assets and performance in the Banking sector of Nigeria. The study involved a survey of four (4) Banks quoted in the Nigeria Stock Exchange. Data were obtained from the annual report and accounts of selected Banks. The data were subjected to statistical analysis using correlation technique. The result of the study revealed that operating financial assets has a significant and strong positive relation with performance in the Banking sector in Nigeria, it was also reified that investing financial assets and financing cash flow have negative and weak relationship. The study recommends that regulatory authorities such as Central Bank of Nigeria (CBN), Securities and Exchange Commission (SEC), Corporate Affairs Commission (CAC) and Nigeria Deposit Insurance Corporation (NDIC) should be securitizing their financial statement and also external auditors of the quoted Banks in the Banking sector to use cash flow ratio in evaluating performance which will help investors make good decisions.

Kolapo, Oyeni and Oke (2012) carried out an empirical investigation into the quantitative effect of credit risk on the performance of commercial banks in Nigeria over the period of 11 years (2000-2010). Five commercial banking firms were selected on a cross sectional basis for eleven years. The traditional profit theory was employed to formulate profit, measured by Return on Asset (ROA), as a function of the ratio of Non-performing loan to loan & Advances (NPL/LA), ratio of Total loan & Advances to Total deposit (LA/TD) and the ratio of loan loss provision to classified loans (LLP/CL) as measures of credit risk. Panel model analysis was used to estimate the determinants of the profit function. The results showed that the effect of credit risk on bank performance measured by the Return on Assets of banks is cross-sectional invariant. That is the effect is similar across banks in Nigeria, though the degree to which individual banks are affected is not captured by the method of analysis employed in the study. A 100 percent increase in non-performing loan reduces profitability (ROA) by about 6.2 percent, a 100 percent increase in loan loss provision also reduces profitability by about 0.65percent while a 100 percent increase in total loan and advances increase profitability by about 9.6 percent. Based on our findings, it is recommended that banks in Nigeria should enhance their capacity in credit analysis and loan administration while the regulatory authority should pay more attention to banks' compliance to relevant provisions of the Bank and other Financial Institutions Act (1999) and prudential guidelines.

Abata (2014) examined banks asset quality and performance in Nigeria using secondary data obtained from the annual reports and accounts of the six largest banks listed on the Nigeria Stock Exchange based on market capitalization with a sample interval of fifteen-year period from 1999 to 2013. The study adopted the use of ratios as a measure of bank performance and asset quality since it is a verifiable means for gauging the firms' level of activities while the

data were analyzed using the Pearson correlation and regression tool of the SPSS 17.0. The findings revealed that asset quality had a statistically relationship and influence on bank performance. Based on the findings the study recommends policies that would encourage revenue diversification, minimize credit risk, and encourage banks to minimize their liquidity holdings. Further research on factors influencing the liquidity of commercials banks in the country could add value to the profitability of banks and academic literature.Adeusi et al (2014) focuses on the association of risk management practices and bank financial performance in Nigeria. Secondary data sourced was based on a 4year progressive annual reports and financial statements of 10 banks and a panel data estimation technique adopted. The result implies an inverse relationship between financial performance of banks and doubt loans, and capital asset ratio was found to be positive and significant. Similarly it suggests the higher the managed funds by banks the higher the performance. The study concludes a significant relationship between banks performance and risk management. Hence, the need for banks to practice prudent risks management in order to protect the interests of investors.

Anjichi (2014) determine the effects of asset liability management on the financial performance of commercial banks in Kenya between the years of 2004- 2013. The factors identified under AML that affect financial performance were based on the CAMEL approach which includes capital adequacy, asset quality, management efficiency, liquidity and operational efficiency. ALM deals with the optimal investment of assets in view of meeting current goals and future liabilities. It is related to the management of the risks associated with liquidity mismatch, interest rates and foreign exchange movements. Therefore, ALM is concerned with an attempt to match assets and liabilities in terms of maturity and interest rate sensitivity to minimize interest rate and liquidity risks. Financial Performance on the other hand is a measure of how well a firm can use assets from its primary mode of business and generate revenues. This term is also used as a general measure of a firm's overall financial health over a given period of time, and can be used to compare similar firms across the same industry or to compare industries or sectors in aggregation. The study adopted a descriptive design in its methodology and the researcher chose to study commercial banks due to availability of needed data and convenience. All the 43 commercial banks in Kenya were targeted for this study. Secondary data was obtained from annual Central bank of Kenya Banks supervision reports. SPSS version 20.0 was used for data analysis. The t-test with a 5% level of significance was used in the study and the correlation coefficient (r), coefficient of determination and analysis of variance (ANOVA) were calculated. The analysis showed that all the CAMEL factors had a statistically significant impact on financial performance. Based on the findings, the study recommended policies that would encourage revenue diversification, reduce operational costs, minimize credit risk and encourage banks to minimize their liquidity holdings.

METHODOLOGY

3.1 Research Design

This study adopted the *Ex post facto* design. This is a quasi-experimental design examining how an independent variable affects a dependent variable. The design also creates a framework whereby the researcher has no direct control over the variables but will estimate them as they are, objectively.

3.2 Method of Data Analysis

In order to estimate the parameters for this study, panel data regression analysis (longitudinal data) is employed because of the estimation of three banks and the presence of both cross sectional and time series component. Panel data makes it possible to get a handle

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on the time ordering of variables and to monitor the individual trends over time. In additional, complex and difficult data can be estimated using panel data Berrington, Smith and Sturgis, (2006).

3.3 Model Specification

The guiding econometric model for this research is specified thus:

Implicitly: $PBT_{it} = f(TB_{it}, BOR_{it}, INVSEC_{it})$ …….. (3.1)

The explicit panel econometric model is specified thus:

$$PBT_{it} = \beta_{0it} + \beta_{it}TB + \beta_{it}BOR + \beta_{it}INVSEC + \mu$$

Where:

PBT = Profit before Tax

TB = Treasury Bills

BOR = Borrowings

INVSEC = Investment Securities

i = Individual Banks

t = Time Series

β 's = structural Parameters to be estimated

μ = Stochastic Error Term

This gives way to two types of panel data technique which include the fixed effect model and random effect model.

3.3.1 Fixed Effect (FE) Panel Model

The fixed effect panel model or least square dummy variable model makes the assumption that the intercept is constant but it is entity (bank) specific. It was designed to ascertain the causes of the changes in an entity. One of the advantages of the fixed effect model is that it makes it possible to control all time invariant differences between the banks, so that the estimated coefficients of the fixed effect model will be free from bias due to the lack of time-invariant characteristics between the sample countries.

The general form for panel fixed effect model is given as:

$$Y_{it} = \beta_i + X_{it} + \mu_{it}$$

Where β_i = the unknown intercept for each bank.

3.3.2 Random Effect Model

Random Effect model assumes that the intercept is not constant but it is bank specific. It assumes that the differences across banks are stochastic and uncorrelated with the regressors in the model. Unlike the fixed effect model, the random effect model can include time invariant characteristics.

The general form for panel random effect model is given as:

$$Y_{it} = \beta + X_{it} + \mu_{it} + \psi_{it}$$

Where ψ_{it} = error term that changes within the cross-section but remains constant over time (within-entity error term

3.4 Panel Diagnostic Tests

3.4.1 Consistency and Efficiency

Based on the law of large numbers, consistency could have been improved by the availability of quarterly data for each entity which will increase the number of observation for more

precise and accurate estimates, however annual data were only accessible for most variables. Consistency was however enhanced through a balanced panel data set with complete cross sectional and time series data from 2010-2016 X 6 (35 Observations).

3.4.2 Panel Unit-Root Test

A Panel unit root test will be conducted as an alternative to time series unit root test to ensure that the data collected is stationary before usage.

3.4.3 Hausman Specification Test

A Hausman test which tests if the μ_{it} correlates with the independent variables (regressors) will be estimated to decide between the fixed or random effects where the:
H_0: The suitable model is the random effects model.
H_1: The suitable model is the fixed effects model.

Decision Rule

If probability of the Chi square test is greater than the p value =0.05 or 5%, the H_0 will be rejected and the fixed effects model estimator will be used to achieve consistent results, however if the p value is less than 5%, the null hypothesis will be accepted and random effects estimator will be used in order to achieve consistent results.

3.5 Source of Data

The data to be used in this study will be extracted from the financial annual reports of the selected money deposit banks in Nigeria namely; Diamond Bank plc., Fidelity Bank Plc., Skye Bank Plc. and First City Monument Bank (FCMB) plc. from 2007-2016 being a period of 10 years. Data on treasury bills, borrowings, investment securities and profit before tax will be extracted.

Data presentation and analysis.

4.1 The Empirical Results

In order to give meaning to the generated data and to actualize the objectives of the study, the panel data regression technique was employed to estimate the parameters of the model and the E-views econometric software was used for the analysis. This section of the study displays the results, analysis and hypothesis choice based on the findings of the study.

Table 4.1.1:*Pooled Regression Analysis*

Dependent Variable: LOG(PBT)
Method: Panel Least Squares
Date: 09/00/18 Time: 07:56
Sample: 2007 2016
Periods included: 10
Cross-sections included: 4
Total panel (balanced) observations: 40

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	3.443167	1.477913	-2.329749	0.0263
TB	0.006325	0.007123	0.887982	0.3812
BOR	0.020057	0.026351	0.761170	0.4521
INVSEC	0.068954	0.078998	0.761170	0.3218
R-squared	0.224332	Mean dependent var		-2.797307
Adjusted R-squared	0.186647	S.D. dependent var		1.732711

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S.E. of regression	1.764174	Akaike info criterion	4.055059
Sum squared resid	99.59397	Schwarz criterion	4.188375
Log likelihood	-67.96354	Hannan-Quinn criter.	4.101080
F-statistic	0.399025	Durbin-Watson stat	1.807445
Prob(F-statistic)	0.674266		

Source:*Researcher's Computation Using E-views*

Table 4.1.1 clearly shows that the numerical coefficients of treau (TB), borrowings (BOR) and investment securities (INVSEC) yielded positive numerical coefficients at the magnitude of 0.006325 0.020057 and 0.068954 respectively with corresponding probability values of 0.3812, 0.4521 and 0.3218 respectively. This clearly shows that the contribution of TB, BOR and INVSEC to the performance of selected deposit money banks are positive but not significant. However, in the pooled regression analysis, we assume the pooled regression displayed in table 4.1.1 that all four banks are the same. However, that normally does not happen, hence, we cannot accept the outcome of this pooled regression model estimates. We therefore proceed to estimate the fixed and random effects.

Table 4.1.2:*Fixed Effect Model*
Dependent Variable: LOG(PBT)
Method: Panel Least Squares
Date: 09/10/18 Time: 08:00
Sample: 2007 2016
Periods included: 10
Cross-sections included: 4
Total panel (balanced) observations: 40

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	3.496433	1.689101	2.069997	0.0478
TB	0.007033	0.008028	0.876032	0.3885
BOR	0.022069	0.029723	0.742511	0.4640
INVSEC	0.032781	0.047653	0.541170	0.4218

Effects Specification

Cross-section fixed (dummy variables)

R-squared	0.227011	Mean dependent var	-2.797307
Adjusted R-squared	-0.181487	S.D. dependent var	1.732711
S.E. of regression	1.883391	Akaike info criterion	4.280881
Sum squared resid	99.32052	Schwarz criterion	4.591951
Log likelihood	-67.91542	Hannan-Quinn criter.	4.388262
F-statistic	0.129551	Durbin-Watson stat	1.806868
Prob(F-statistic)	0.991523		

Source:*Researcher'sComputationUsingE-views*

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Table 4.1.2 being an output of fixed effect model clearly shows that the numerical coefficients of TB, BOR and INVSEC yielded positive numerical coefficients at the magnitude of 0.007033 0.022069 and 0.032781 respectively with corresponding probability values of 0.3885, 0.4640 and 0.4218 respectively. This clearly shows that the contribution of the specified financial assets to the performance of selected deposit money banks are positive but not significant.

Table 4.1.3:*Random Effect Model*

Dependent Variable: LOG(PBT)
Method: Panel EGLS (Cross-section random effects)
Date: 09/10/18 Time: 08:03
Sample: 2007 2016
Periods included: 10
Cross-sections included: 4
Total panel (balanced) observations: 40
Swamy and Arora estimator of component variances

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	3.443167	1.577785	2.182279	0.0365
TB	0.006325	0.007605	0.831774	0.4117
BOR	0.020057	0.028131	0.712988	0.4810
INVSEC	0.022256	0.043229	0.982311	0.5643
	Effects Specification			
			S.D.	Rho
Cross-section random			0.000000	0.0000
Idiosyncratic random			1.883391	1.0000
	Weighted Statistics			
R-squared	0.224332	Mean dependent var		-2.797307
Adjusted R-squared	-0.036647	S.D. dependent var		1.732711
S.E. of regression	1.764174	Sum squared resid		99.59397
F-statistic	0.399025	Durbin-Watson stat		1.807445
Prob(F-statistic)	0.674266			
	Unweighted Statistics			
R-squared	0.024332	Mean dependent var		-2.797307
Sum squared resid	99.59397	Durbin-Watson stat		1.807445

Source:*Researcher's Computation Using E-views*

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Table 4.1.4:*Hausman Specification Test*

Correlated Random Effects - Hausman Test
Equation: Untitled
Test cross-section random effects

Test Summary	Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.
Cross-section random	0.077089	2	0.9622

Cross-section random effects test comparisons:

Variable	Fixed	Random	Var(Diff.)	Prob.
TB	0.007033	0.006325	0.000007	0.7833
BOR	0.022069	0.020057	0.000092	0.8339
INVSEC	0.032781	0.022256	0.000008	0.7765

Source:*Researcher's Computation Using E-views*

The essence of this test is to ascertain on either using the fixed or random effect output as the basis of our analysis. It is anchored on the hypothesis specified thus:

H_0: The suitable model is the random effects model.

H_1: The suitable model is the fixed effects model.

Decision Rule

If probability of the Chi square test is greater than the p value =0.05 or 5%, the H_0 will be rejected and the fixed effects model estimator will be used to achieve consistent results, however if the p value is less than 5%, the null hypothesis will be accepted and random effects estimator will be used in order to achieve consistent results.

Decision: Since the probability of the Hausman specification test yielded a probability value of 0.9622 and it is greater than 0.05, this therefore compels us to accept the null hypothesis and thereby conclude that the suitable model is the random effects model. Hence, our decision will be based on table 4.1.3

Table 4.1.3:*Random Effect Model*

Dependent Variable: LOG(PBT)

Method: Panel EGLS (Cross-section random effects)

Date: 09/10/18 Time: 08:03

Sample: 2007 2016

Periods included: 10

Cross-sections included: 4

Total panel (balanced) observations: 40

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Swamy and Arora estimator of component variances

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	3.443167	1.577785	2.182279	0.0365
TB	0.006325	0.007605	0.831774	0.4117
BOR	0.020057	0.028131	0.712988	0.4810
INVSEC	0.022256	0.043229	0.982311	0.5643

Effects Specification		
	S.D.	Rho
Cross-section random	0.000000	0.0000
Idiosyncratic random	1.883391	1.0000

Weighted Statistics

R-squared	0.224332	Mean dependent var	-2.797307
Adjusted R-squared	-0.036647	S.D. dependent var	1.732711
S.E. of regression	1.764174	Sum squared resid	99.59397
F-statistic	0.399025	Durbin-Watson stat	1.807445
Prob(F-statistic)	0.674266		

Unweighted Statistics

R-squared	0.024332	Mean dependent var	-2.797307
Sum squared resid	99.59397	Durbin-Watson stat	1.807445

Source:*Researcher's Computation Using E-views*

Table 4.1.3 reveals the output of the random effect model and it clearly shows that the numerical coefficients of TB, BOR and INVSEC yielded positive numerical coefficients at the magnitude of 0.006325, 0.020057 and 0.022256 respectively with corresponding probability values of 0.4117, 0.4810 and 0.5643 respectively. The empirical implication of

this result is that a 1% increase in treasury bills of bank assets is expected to increase the level of deposit money bank performance by 0.006325 and vice versa, a 1% increase or change in borrowings is expected to increase or change the level of performance by 0.020057 and a 1% change in investment securities is expected to increase the level of performance by 0.022256. This result conforms to economic a priori expectation because an increase in the three independent variables is expected to enhance the performance of the banking system. In summary, this clearly shows that the contribution of treasury bills, borrowings and investment securities to the performance of selected deposit money banks are positive but not significant.

The R-Squared clearly shows that just 22% of the variations in profit before tax (PBT) is explained by changes in treasury bills, borrowings and investment securities in the selected deposit money banks in Nigeria. This implies that about 78% of the changes in PBT is explained by other variables outside the model.

The F-statistics ratio which yielded 0.399025 with a corresponding probability value of 0.674266 implies that the test is not statistically significant at the entire regression plane. It implies that treasury bills, borrowings and investment securities do not jointly have a significant impact on the performance of selected money deposit banks in Nigeria.

5.0 SUMMARY, CONCLUSION AND RECOMMENDATIONS

5.1 Summary of Findings

This primary essence of this study has been able to estimate an empirical analysis of the responsiveness of firm performance indices to financial assets of banks in Nigeria covering the period 2007-2016. The major findings of the study are:

1. Treasury bills have a positive but insignificant impact on profit before tax of selected money deposit banks in Nigeria.
2. Borrowings have a positive but insignificant impact on profit before tax of selected money deposit banks in Nigeria.
3. Investment securities have a positive but insignificant impact on profit before tax of selected deposit money banks in Nigeria.

5.2 Conclusion of the Study

This study has been able to explore the responsiveness of bank performance to financial assets of banks in Nigeria for the period 2007-2016. Findings from the study reveal that financial assets have a positive contribution to the performance of deposit money banks in Nigeria but the contribution is not significant. The selected financial assets variables are treasury bills, borrowings and investment securities. The conclusion to be drawn from the results is that there are other items in banking operations which has more influence on bank performance.

5.3 Recommendations

Based on the findings of the study, the following recommendations are suggested:

1. The management of financial assets should form one of the most sensitive priorities of the managers of deposit money banks in Nigeria. They should ensure an optimal balance between treasury bills and loans and advances.
2. Investors and analysts should be encouraged to use the position of financial assets in evaluating the performance of banks before forming opinion on the firm. This will help them make good decisions with respect to their investments.
3. The banks need to be more aggressive in the area of profit enhancement. While we emphasize the need for more aggressive approach to investing idle cash, of more

importance is the need for proper investment analysis, which has the benefit of sieving out unprofitable investments and even avoiding unnecessary taking of risk.

References

1. Abata, N. (2014). An Empirical Analysis of the relationship between cash flow and dividend charges in Nigeria. Journal of Research in Development and management, 15(3549).
2. Adeusi, P., Michael, P. & Josephine, I. (2014). Working capital management and profitability, case of Pakistani firms. International review of business research papers, 3(1), 279-300.
3. Allen, M. &Santomero, F. E. (1998). Information and the Intermediary: Are
4. Market Intermediaries Informed Traders in Electric Markets? Journal of Financial andQuantitative Analysis, 43(1): 1-28.

5. Anjichi, A.S. (2015). The effect of credit risk management on financial performance of the Jordanian commercial banks, Investment Management and Financial Innovations, Volume 12, Issue 1, 338 – 345.

6. Aremu, A. M. (2011). A perspective on liquidity and assets management of commercial banks in Nigeria: Evidence from some selected banks, Journal of Emerging Trends in Economics and Management Sciences (JETEMS) 2(6): 454-460.

7. Amah, A. F., Dalgic, C. H. and Demirci, M. (2016) Global Crisis and Net Interest Rate Margin in a time of trouble. What matters more for an Emerging Market Economy, Bogazici University, Mimeo.

8. Basle, J.C. (1997). Comparative analysis of computerized accounting system and manual accounting system of quoted Microfinance Banks (MFBs) in Nigeria. *International Journal of Academic Research in Accounting, Finance & Management Sciences,* 7(2), 30-42.
9. Benjamin T. (2013). An empirical investigation of the financial report practices and banks' stability in Nigeria. International review of management and business research, 2(1), 22- 32
10. Benjamin, S. C. and Kamalavalli, A. L. (2006). Sensitivity of profitability to working capital management in Indian corporate hospitals. Eletronic copy avaible at HTTP://ssrn. com/abstract, 1331500.
11. Berger, A. and Bouwman, B.E (2009) Sensitivity of profitability to working capital management in Indian corporate hospitals. Eletronic copy avaible at HTTP://ssrn. com/abstract, 1331500.
12. Berger, A. N., Hasan, I. and Zhou, M. (2010). The effects of focus versus diversification on bank performance: evidence from Chinese banks. Journal of Banking and Finance, 34, 1417-1435.
13. Bordeleau, E. and Graham, C. (2010). The impact of liquidity on banks profitability. Bank of Canada Working Paper, 2010-38.
14. Cham, A., Greenbaum, J. and Thakor, M (1992) Working capital management and profitability–case of Pakistani firms. International review of business research papers, 3(1), 279-300.
15. Dauda, W., Maishanu, K.L and Mwoli, O. (2013) Recapitalization and banks' performance: a case study of Nigerian banks. African Economic and Business Review, 6 (1): 1-17.

16. Dermerguckunt, A. and Huizinga, J.O (1999). The determinants of the tunivian deposit banks performance", Applied financial economics, 317-319. Evidence: paper retrieved on August 8, 2018 from http://www.academicdb.com/riskmanagementcasestudy.
17. Diamond, A. (1984) A Transaction Cost Approach to the Theory of
18. Financial Intermediation. *Journal of Finance*, 31(2): 215-231.

19. Francis T.G (2007). Corporate governance of banks in developing economies: Concepts and issues on corporate Goverance, international Review.12, 371-377.
20. Hayden, E., Porath, D. &Westernhagen, N. (2007). Does diversification improve the performance of German banks? Evidence from individual bank loan portfolios, *Journal of Financial Services Research*, 32, 123-140.
21. Helen, C.C (2002). The efficiency of liquidity management and banking performance in Nigeria. International review of management and business research, 2(1), 22-42.
22. Kapian, O. and Narayan, J. (2011). The Market for Lemons: Quality Uncertainty and the Market Mechanism, Quarterly Journal of Economics, 48, 488-500.
23. Kosmidou, A.T (2004) Impact of financial assets on the financial performance of quoted deposit money banks in Nigeria.
24. Kolapo, J. M., Oyeni, A. and Oke (2012). Liquidity on the profitability of Nigerian banks, Research Journal of Management, 2(7).
25. Naccur, A. (2003). Corporate governance of banks in developing economies: Concepts and issues on corporate Goverance, international Review.12, 371-377.
26. Nzotta, A. (1997) A Model of Financial Capital Liquidity Based on Intermediary Capital. *Journal of European Economic Association*, 8(2-3): 456-466.

27. Nwankwo, A. (1991) Cost of Financial Intermediation in the Banking Sector of
28. Jordan. *International Research Journal of Finance and Economics, Issue 56: 7-21.*

29. Saleem, Q. and Reheman, R. U. (2011). Impacts of liquidity ratios on profitability. Interdisciplinary Journal of Research in Business, 1(7), 95-98.

30. Scot, H. (2003). Financial assets and Bank profitability, in Financial structure and economic growth; A Cross-country comparison of banks, market and development, MIT press.
31. Scholten, B. and Wensveen, U. (2003). Financial Intermediaries as Markets for Firms'Assets. *Economic Journal*, 117: 1380- 1402

32. Tabak, B. M., Fazio, D. M. and Cajueiro, D. O. (2010). The effects of loan portfolio concentration on Brazilian banks' return and risk. Working Paper Series, Banco Central Do Brasil, No. 215

33. Tektas, N.N., Abiahu, M.F.C., Okika, E.C., and Obi, J.C. (2005). Detrminants of Financial Assets: Empirical evidence from quoted electric and electronic technology firms in Nigeria. Proceedings of Faculty of Management Sciences, International Conference, NnamdiAzikiwe University, 29-38.
34. Yin, T.N (2014). The relationship between capital and earnings in banking, *Journal of Money, Credit and Banking*, 27,432-456.