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Effect of Exchange Rate Fluctuation on Firm Profitability: Evidence from Selected Quoted Conglomerates in Nigeria

Okika Christian E.M¹, Udeh, Francis N.P (PhD)², Okoye Greg. O (PhD)^{3*}

Department of Accountancy, Nnamdi Azikiwe University, Awka, Anambra State^{1,2}, Nigeria, Madonna University, Okija, Anambra State, Nigeria³. Email: elojah85@gmail.com¹, fn.udeh@unizik.edu.ng², okoyegrego01@gmail.com³

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Abstract: The main aim of this study is to find out the effect of exchange rate fluctuation on the firm profitability of selected quoted conglomerates in Nigeria. Specifically, it investigated the extent to which exchange rate fluctuation affect return on capital employed. In pursuit of the objectives of this study, two hypotheses were formulated and tested using secondary data obtained from the firms' annual report and CBN annual statistical bulletin. Data were analyzed using multiple regression analytical estimation technique with the aid of SPSSv21 which was used in determining the effect of exchange rate fluctuation on firm profitability. The findings confirmed that the two hypothesis tested were insignificant. Therefore, the researcher recommends that Government should uphold the restriction policy on the importation of similar products manufactured in Nigeria. If this is religiously pursued, it will create and open more markets for the locally manufactured goods to thrive. Also Government should make policy that aims at naira appreciation against foreign exchange which will greatly help reduce the cost of production in the manufacturing sector.

Keywords: Exchange Rate, Fluctuation and Firm Profitability.

Introduction

Conglomerates are often large and multinational companies in nature. They embarks on various types of businesses. In Nigeria, they are under the regulation of the Nigerian Stock Exchange (NSE) and are mainly established to accomplish synergies, diversification and earnings growth. In early 1960s conglomerates were very popular in developed countries, but due to the difficulty associated with managing unrelated business units effectively they are now less popular. In developing countries like Nigeria, apart from the problem of managing unrelated units, conglomerates also face the problem of managing conflict with the immediate environment in which the business units are established (Shehu, 2015). This implies that large diversification of the production activities of conglomerates leads to larger problems to handle. The conglomerate sector has been contributing greatly to the

development of the Nigerian economy since 1800s and has been the fore runner in manufacturing, marketing, automobile, logistics, real estate, agriculture, electrical and so on. Many companies in the Nigeria conglomerates sector have survived for many decades despite various policy changes and financial crises that have taken place in the country since their establishment (Ubesie & Ezeagu 2014). The sector has also in other years, contributed greatly in the provision of employment, goods and services in Nigeria. Most conglomerates embark on international trade which involves different countries' currencies with their exchange rate value.

Exchange rate plays an increasingly significant role on companies' performance in Nigeria as it directly affects domestic selling price level, profitability, allocation of resources and investment decision in the companies (Kituku, 2014). These as seen in the exchange rate against one USD to get to as high as N390 making it difficult for the companies to operate at the minimum cost and price level desired. The fluctuation or volatility in the exchange rate has attracted public attention especially from importers who have argued that the strengthening naira is eroding their competitiveness (Ndung'u, 2000). The need to investigate the effect of this volatility of exchange rate on the performance of companies in Nigeria is important for the economy. For a country that is import dependent, the stability of its exchange rate is important for credit allocation (Adebiyi, 2006). Despite the obvious attentions exchange rate fluctuations has drawn in Nigeria, there is still not enough study that has been done to examine the extent to which exchange rate fluctuations affect Nigerian company's financial performance and how this effects can be minimized or curbed.

Exchange rate movement in Nigeria has been variable with periods of rapid depreciation of the domestic currency Nigerian Naira, which adversely affect the Nigerian economy. Even though studies have been conducted on the exchange rate regimes and the implications for macroeconomic management as well as managing foreign exchange risk on economy growth, very little has been done on the study of companies' exposure to exchange risk in Nigeria. It is in this context that this paper is to evaluate the effects variations in the exchange rate has on the financial performance of quoted conglomerates in the Nigeria Stock Exchange.

Despite various efforts by the government of Nigeria to maintain a stable exchange rate, the naira had increased from N8.0378-N85.98 in a progressive order from the year 1990 to the year 1999 and has continued to depreciate from N151.51 in 2010 to N162.30 in 2011 to N156.15 in 2012 all against one US dollar. Continuously, the naira depreciated at N158.05 in 2013, N175.85 in 2014, N232.40 in 2015 and on 31st December, 2016, the exchange rate appreciated to N300.757 as at the time of writing this paper it is already at N365per dollar. Also as in May 2017, the average exchange of one dollar to naira (CBN rate) is N390. It is on this note that this study seeks to examine the effects of of exchange rate fluctuations on financial performance of conglomerates in Nigerian over a period of 6 years 2008– 2017.

Objectives of Study

The main objective of this study is to empirically examine the effects of exchange rate fluctuation on the firm profitability of selected quoted conglomerates in Nigeria.

Other specified objectives guides to this study are:

1. To determine the extent to which exchange rate fluctuation affect return on capital employed (ROCE) of selected conglomerates in Nigeria.

2. To ascertain the extent to which exchange rate fluctuation affect return on asset (ROA) of selected conglomerates in Nigeria.

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Research Hypotheses

The following null hypotheses were formulated to guide the investigation of this work:

Ho1: Exchange rate fluctuation does not significantly affect return on capital employed (ROCE) of selected conglomerates in Nigeria.

Ho2: There is no significant relationship between exchange rate fluctuation and return on asset (ROA) of selected conglomerates in Nigeria.

Conceptual Framework

According to Jhingan (2004), the exchange rate between the dollar and the pound refers to the number of dollars required to purchase a pound. The rate is normally determined in the foreign exchange market. Exchange rate is the rate at which a currency is exchanged for another currency. It is referred to as the ratio at which a unit of currency of one country is expressed in terms of another currency.

The foreign exchange market is a market where currencies of different countries are bought and sold. It is a market where the values of local and foreign currencies are determined. As noted by Jhingan (2004), the national currencies of all countries are the stock-in-trade of the foreign exchange market, and as such, it is the largest market to be found around the world which functions in every country.

Also, Bradley and Moles (2002) defined exchange rate as the price of a unit of foreign currency against domestic currency. Exchange rate is the value of the one unit of foreign currency against local currency and Exchange rate serves as the basic link between the local and the overseas market for various goods, services and financial assets (Reid and Joshua, 2004). Omagwa (2005) posit that exchange rates like any other commodity are explained by the law of demand and supply. Supply of currency is explained by changes in fiscal policies whereas currency demand is influenced by a wide range of factors such as inflation rates and interest rates. Murthy and Sree (2003) argued that exchange rate enables comparison of prices of commodities quoted in diverse currencies.

According to Atile and Anan (1984), a stock Exchange is a place where individuals and investors can make or lose money easily. Stock Exchange presents an ideal setting for smart and daring speculator to make a fortune with relatively little effort. Stock exchange is a market place where those who wish to buy or sell shares, stocks, government bonds, debentures and other approved securities can do so though only through members of the stock exchange (Anyanwu, 1993). Thus, it is a market where large and small investors alike buy and sell through stock brokers. In this sense, the stock exchange provides the essential facilities for companies and government to raise money for business expansion and development projects through investors who own shares in companies for ultimate economic benefits of all members of the society.

Thomas (2006) found that since the early 1970s, foreign rate exchange system had been a floating one in most countries. The findings were that such nations permitted exchange rates to change in the market place from day to day as per market forces. Before this eventuality central banks of nations intervened in determinations of the exchange rate. This meant that international transactions were never subjected to exchange rate fluctuations risk and as such international transactions were less dynamic. He further stated that since the collapse of this exchange rate system it is markets forces that determine the exchange rate of a nation's currency. Thus such rates keep on fluctuating as per market forces and therefore exposing international transactions to exchange fluctuation risks.

Foreign currency exposures arise whenever a company has an income or expenditure or an asset or liability in a currency other than that of the balance-sheet currency. Indeed exposures can arise even for companies with no income, expenditure, asset or liability in a currency different from the balance-sheet currency.

When there is a condition prevalent where the exchange rates become extremely volatile the exchange rate movements destabilize the cash flows of a business significantly (Gatobu, 2013). The table below illustrates the movement of the USD, Euro, GBP, JPY and CFAFr to the Nigerian naira exchange rate from November, 2006 to May, 2017.

| wajor joreign currencies mean exchange rates to the Naira, years 2006 to 2017. | | | | | | | | |
|--|--------|----------|--------|------|-------|--|--|--|
| Time(Years) | USD | GBP | EURO | JPY | CFAFr | | | |
| 2006 | 129.82 | 242.67 | 155.10 | 1.04 | 0.25 | | | |
| 2007 | 123.80 | 242.73 | 173.40 | 1.06 | 0.26 | | | |
| 2008 | 119.10 | 179.07 | 148.53 | 1.19 | 0.23 | | | |
| 2009 | 152.95 | 248.34 | 223.07 | 1.67 | 0.34 | | | |
| 2010 | 153.13 | 237.62 | 203.64 | 1.78 | 0.31 | | | |
| 2011 | 160.35 | 243.45 | 208.78 | 2.06 | 0.32 | | | |
| 2012 | 159.32 | 248.69 | 199.91 | 1.94 | 0.30 | | | |
| 2013 | 167.14 | ` 250.76 | 210.17 | 1.59 | 0.32 | | | |
| 2014 | 175.85 | 249.96 | 107.60 | 1.48 | 0.30 | | | |
| 2015 | 232.40 | 299.38 | 211.53 | 1.61 | 0.32 | | | |
| 2016 | 415.36 | 379.49 | 329.84 | 2.76 | 0.50 | | | |
| 2017 | 429.48 | 378.13 | 327.35 | 2.83 | 0.50 | | | |

| Table 1 | |
|---|------------------------------|
| Major foreign currencies mean exchange rates to the | e Naira, vears 2006 to 2017. |

Data source: http://www.likeforex.com (2006 to 2017).

Adetayo, Dionco and Oladejo (2004) explain that exchange rate variation is significant in determining a country's balance of trade. According to Omagwa (2005), fluctuations in exchange rates impacts on prices of imports directly thus inversely affecting a country's external sector. Murthy and Sree (2003) postulated that country's foreign debt is significantly affected by the fluctuations in exchange rates. The central bank typically under a fixed exchange rate system will set a par value between foreign and domestic currencies which may be adjusted from time to time (Reid and Joshua, 2004).

Movements in exchange rates tend to be influenced by two important variables namely the relative prices of goods in two countries and relative interest rates. The Purchasing Power Parity (PPP) theorem explains the relationship between relative prices of goods and exchange rates. The PPP theorem propounds that under a floating exchange regime, A relative change in purchasing power parity for any pair of currency calculated as a price ratio of traded goods would tend to be approximated by a change in the equilibrium rate of exchange between these two currencies (Shapiro and Rutenberg, 1976).

Determinants of Exchange Rates

Numerous factors determine exchange rates, and all are related to the trading relationship between two countries. Remember, exchange rates are relative, and are expressed as a comparison of the <u>currencies</u> of two countries. According to Jason Van Bergen (2017), the following are some of the principal determinants of the exchange rate between two

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countries. Note that these factors are in no particular order; like many aspects of <u>economics</u>, the relative importance of these factors is subject to much debate.

Differentials in Inflation

As a general rule, a country with a consistently lower inflation rate exhibits a rising currency value, as its purchasing power increases relative to other currencies. During the last half of the 20th century, the countries with low inflation included Japan, Germany and Switzerland, while the U.S. and Canada achieved low inflation only later. Those countries with higher inflation typically see <u>depreciation</u> in their currency in relation to the currencies of their trading partners. This is also usually accompanied by higher interest rates.

Differentials in Interest Rates

Interest rates, inflation and exchange rates are all highly correlated. By manipulating interest rates, <u>central banks</u> exert influence over both inflation and exchange rates, and changing interest rates impact inflation and currency values. Higher interest rates offer <u>lenders</u> in an economy a higher return relative to other countries. Therefore, higher interest rates attract foreign capital and cause the exchange rate to rise. The impact of higher interest rates is mitigated, however, if inflation in the country is much higher than in others, or if additional factors serve to drive the currency down. The opposite relationship exists for decreasing interest rates - that is, lower interest rates tend to decrease exchange rates.

Current-Account Deficits

The <u>current account</u> is the <u>balance of trade</u> between a country and its trading partners, reflecting all payments between countries for goods, services, interest and dividends. A <u>deficit</u> in the current account shows the country is spending more on foreign trade than it is earning, and that it is borrowing capital from foreign sources to make up the deficit. In other words, the country requires more foreign currency than it receives through sales of exports, and it supplies more of its own currency than foreigners demand for its products. The excess demand for foreign currency lowers the country's exchange rate until domestic goods and services are cheap enough for foreigners, and foreign assets are too expensive to generate sales for domestic interests.

Public Debt

Countries will engage in large-scale deficit financing to pay for public sector projects and governmental funding. While such activity stimulates the domestic economy, nations with large public deficits and debts are less attractive to foreign investors. The reason? A large debt encourages inflation, and if inflation is high, the debt will be serviced and ultimately paid off with cheaper real dollars in the future.

In the worst case scenario, a government may print money to pay part of a large debt, but increasing the <u>money supply</u> inevitably causes inflation. Moreover, if a government is not able to service its deficit through domestic means (selling domestic <u>bonds</u>, increasing the money supply), then it must increase the supply of securities for sale to foreigners, thereby lowering their prices. Finally, a large debt may prove worrisome to foreigners if they believe the country risks <u>defaulting</u> on its obligations. Foreigners will be less willing to own securities denominated in that currency if the risk of default is great. For this reason, a country's debt rating (as determined by <u>Moody's & Poor's</u>) is a crucial determinant of its exchange rate.

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Terms of Trade

A ratio comparing export prices to import prices, the <u>terms of trade</u> is related to current accounts and the <u>balance of payments</u>. If the price of a country's exports rises by a greater rate than that of its imports, its terms of trade have favorably improved. Increasing terms of trade shows greater demand for the country's exports. This, in turn, results in rising revenues from exports, which provides increased demand for the country's currency (and an increase in the currency's value). If the price of exports rises by a smaller rate than that of its imports, the currency's value will decrease in relation to its trading partners.

Political Stability and Economic Performance

Foreign investors inevitably seek out stable countries with strong <u>economic performance</u> in which to invest their capital. A country with such positive attributes will draw <u>investment</u> <u>funds</u> away from other countries perceived to have more political and economic risk. Political turmoil, for example, can cause a loss of confidence in a currency and a movement of capital to the currencies of more stable countries.

Return on Capital Employed (ROCE)

The key measure of profitability is the return on capital employed (ROCE) which is a primary ratio and the factors involved (profit and capital employed or total assets) can be progressively subdivided into, more and more detailed ratios which highlight the influence of sales, the type of assets and the various types to costs, on overall company performance as expressed by the ROCE, T.Lucey (2003).

It shows the net profit that is generated from every N1 of assets employed.

Mathematically, it is calculated as

ROCE = <u>Net Profit (PBIT)</u> * 100

Capital Employed

• ROCE is sometimes calculated using PBIT instead of net profit.

• Capital Employed = total assets less current liabilities. This is also equal to total equity plus long term debt.

• Capital Employed maybe based on net book value (NBV), gross book value or replacement cost.

ROCE is easy to calculate and the figures are readily available. It also measure how well s business is utilizing the funds invested in it and is often used by external analysts/investors.

An increase in ROCE could be achieved by:

• Increasing net profit, e.g. through an increase in sales price or through better control of costs

• Reducing capital employed, e.g. through the repayment of long term debt.

The ROCE can be understood further by calculating the net profit margin and asset turnover: ROCE = net profit margin * asset turnover

Return on Asset (ROA)

Khrawish (2011) explain that ROA is significant in explaining companies' profitability. For comparative proposes, it is a ratio of income to its total asset. It measures the ability of an organization's management to generate income by utilizing company assets at their disposal. Return on Assets (ROA) is measures of firm performance that reveals to the users of financial

statement how well a company uses its assets to generate income. A higher ROA denotes a higher level of firm performance. A rising ROA, for instance, may initially appear good, but turn out be unimpressive if compare with other companies in same line of activities or industrial average.

Hence, if company's ROA is below industrial average the company is not utilizing its full capacity.

Booth et al. (1999) posits that this measure was used in their study because it was the only variable that can be calculated across countries. They conclude that country comparisons of profitability are therefore difficult. Among other authors that adopted this measure in their empirical studies are Zeitun and Tian (2007), Zeitun (2009), Tze-Sam and Heng (2011), Onaolapo and Kajola (2010) and Khan (2012). The ROA ratio may thus be more useful when compared to the risk free rate of return to be rewarded for the additional risk involved. If a firm's ROA is equal or even less than the risk free rate, investors will be indifferent and better off just purchasing a bond with a guaranteed yield.

ROA is calculated as: <u>Profit before interest and Tax (PBIT)</u> *100 Total Assets

Effect of Exchange Rates Fluctuations on Financial Performance of Companies

Exchange rate fluctuations influence a country's prices through import prices of consumption and intermediate goods (Watkins, 2014). Currency fluctuations enter directly into the import price, producer price and Consumer Price Index (CPI). Exchange rate fluctuations affect domestic prices through three channels; first is through prices of imported consumption goods, exchange rate fluctuation affects domestic prices directly, second is through prices of imported intermediate goods, exchange rate fluctuation affects production cost of domestically produced goods and third is through prices of domestic goods priced in foreign currency (Gatobu, 2013). The extent to which those changes are reflected in the consumer price index (CPI) depends on the share of imports in the consumption basket. If depreciation results in higher prices for imported goods, demand for domestic goods that compete with imports will increase. As demand rises, there will be upward pressure on domestic prices and nominal wages. Rising wages will exert further upward pressure on domestic prices (Bailliu and Bouakez, 2004).

The fluctuations in currency exchange rates could generate significant gains or losses and the entry of these into the income statement could produce a distorted impression of what is happening to financial institution concerned (Watkins, 2014). Jamal and Khalil (2011) documented that the more a company is involved in international trade, the more its accounting exposure and unless a company hedges this risk then it faces financial gains and/or losses from transaction and translation of foreign activities. Another unique dimension of exchange rate exposure is that of projects funded by foreign donors as Kinyuma (2013) investigated. Unrealized foreign exchange gains/losses according to Gatobu (2013) have an effect on the Net Income of multinational companies as posted to either income statement or owners equity reserves. Foreign exchange fluctuations affect the companies' imports, accounts payables, export sales and accounts receivables; with the net effect on the Net Income of through the income statement or the owners' equity reserves.

Open economy macroeconomics theory postulates that a small open economy is an international price taker. Therefore in every aspect of trade in exports, the government will

make deliberate efforts to encourage exports at all costs. In this pursuit, the government will deflate the exchange rate. According to Goldberg and Knetter (1997) only about 60% of exchange rate changes are passed onto import prices in the US. The main explanation for this phenomenon is that many importing and exporting firms choose to hold their prices constant and simply reduce or increase the mark up of prices, when the exchange rate is changing. Such behaviour is referred to as—pricing-to-market. Many firms might choose to make temporary losses on their revenue not to lose market share to competition.

Theoretical Framework

This study is anchored on Purchasing Power Parity Theory

The Purchasing Power Parity theory (PPP): Advanced by Menon and Viswanathan (2005) PPP theory explains that the value of homogenous goods is similar in different countries based on the currency of each country. According to them, when purchasing power is similar in different countries then the exchange rates between the country's currencies will be at equilibrium. Reid and Joshua (2004) postulated that ratio of commodities price levels should equal the country's currency. According Ross (2008), a country's currency may be incorrectly valued whereby money has no purchasing power against the country's commodities level. This theory is based on the assumptions that there are no transactional costs, no barriers to trade and the commodities being traded are homogeneous. If the trading currency is exchanged at the spot exchange rate, the price of a homogenous commodity should be identical across borders. The theory suggested use of price indexes to determine the exact price of a homogenous commodity between countries. The main challenge of this belief is in measuring Purchasing Power Parity constructed from price indexes given that different countries use different goods to determine their price level (Reid, 2005).

Menon and Viswanathan (2005) showed two classification of PPP; relative and absolute. According to them, absolute PPP implies that regardless of the currency similar commodities should cost the same thus emergence of the Law of One Price. Due to limitations in the absolute PPP, another form of PPP has evolved, the relative PPP. Relative PPP recognizes imperfections of the markets; it indicates what exchange rate changes rather than absolute exchange rates over time (Ross, 2008). This theory is relevant for this study as it explains a country's currency value over another country's currency. This theory argues that in the equilibrium exchange rate is one that ensures that the value exchanged can purchase the same basket of goods and services from either of the countries involved.

Empirical Review

Ayodele (2014) evaluated empirically the impact of exchange rate on the Nigerian economy. The study investigated how economic induces such as exchange rate and inflation rate affects changes in Gross Domestic Product (GDP) in Nigeria. The study used Secondary data collected from Annual Reports of Central Bank of Nigeria (CBN), Nigerian Stock Exchange (NSE), and Nigeria Securities and Exchange Commission (SEC) which were analyzed through the multiple regression analysis using the Ordinary Least Squares (OLS) method. The result showed that the two factors –exchange rate and inflation rate- impact significantly on the Gross Domestic Product and economic growth of Nigeria. Exchange rate has a negative impact on the GDP because as it increases, the economic growth is negatively affected, while inflation rate exerts a positive impact on GDP, indicating that firms are more willing to produce when inflation rate is high and vice versa. The outcome of the research was that the government should

make Nigerian economic climate investment friendly by restoring security of lives and property, infrastructural development and improvement of local production in order to reduce the pressure on the dollar and that this would go a long way to boost the exchange rate in favour of the naira and hence improve the Gross Domestic Product

Ebaidalla (2014) examined real exchange rate misalignment and economic performance in Sudan. The study investigates the behavior of equilibrium exchange rate and real exchange rate misalignment in Sudan over the period 1979–2009. In addition, the impact of real exchange rate misalignment on economic performance is examined. The empirical results show that the equilibrium exchange rate is significantly influenced by economic policy variables such as trade openness, government expenditure and taxes. The results also reveal that the Sudanese economy exhibited an exchange rate overvaluation over the period under consideration.

Pitia and Lado (2015) sought to test of relationship between exchange rate and inflation in South Sudan using granger-causality approach using time series monthly data for the period August 2011 to November 2014. The study reveals that there exists a unidirectional causality from exchange rate to CPI without feedback. This means depreciation of South Sudanese currency is detrimental to the economy of South Sudan. Although CPI failed to cause changes in exchange rate, there is no way to conclude with greater confidence that the results are true. The effect of the pressure of an increase in price level on exchange rate could have been from the response of monetary authorities in bridging the gap between the price level and the purchasing power of people in the economy.

Aloku (2009) analyzed the effect of interest rate, exchange rate on the Nigerian economic growth using the annual data between 1975 and 2008. Using Ordinary Least Square technique, the result revealed that interest rate and exchange rate exerted negative impact on economic growth in Nigeria.

Akpan (2009) studied the relationship between exchange rate and economic growth in an emerging petroleum based economy using the annual data for the period of 1970 to 2007. Using Ordinary Least Square (OLS) technique, the result revealed that there is a positive relationship between exchange rate and economic growth in Nigeria.

Opaluwa, Umeh and Ameh (2010) examined the effect of exchange rate fluctuations on the Nigerian manufacturing sector during a twenty (20) year period (1986 - 2005). The argument was that fluctuations in exchange rate adversely affected output of the manufacturing sector. This was because Nigerian manufacturing was highly dependent on import of inputs and capital goods paid for in foreign exchange whose rate of exchange was unstable. The methodology adopted for the study was empirical. The econometric tool of regression was used for the analysis. In the model that was used, manufacturing output employment rate and foreign private investment were used as the explanatory variables. The result of the regression analysis shows that coefficients of the variables carried both positive and negative signs. The study shows adverse effect and is all statistically significant in the final analysis.

Shehu (2012) examined the relationship between exchange rate volatility, trade flows and economic growth in Nigeria using the annual data for period of 1970 to 2009. Using a Vector Auto-regression (VAR) technique, the result revealed that exchange rate volatility has positive effects on the economic growth in Nigeria.

Adeniran (2012) studied the impact of exchange rate fluctuation on the Nigerian economic growth using annual data for the period of 1980 to 2010. Using ordinary least square(OLS)

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technique, the study revealed that exchange rate has positive impact on economic growth in Nigeria.

Dada and Oyeranti (2012) examined the effect of exchange rate volatility on economic growth in Nigeria using the annual data for the period of 1970 to 2009. Using Vector Auto-regression (VAR) technique, the studied revealed that economic growth is negatively related to exchange rate in the long run while in the short run, a positive relationship exist between the two variables in Nigeria.

Asher (2012) examined the impact exchange rate fluctuation on the Nigerian economic growth using annual data for the period of 1980 to 2010. Using Ordinary Least Square (OLS) technique, the study revealed that exchange rate has a positive effect on the GDP.

Obansa (2012) investigated the relationship between exchange rate, interest rate and economic growth in Nigeria using annual data for the period of 1970 to 2010. Using Vector Auto-regression (VRR) technique, the study revealed that exchange rate has a significant impact on economic growth in Nigeria.

Fapetu (2013) investigated the relationship between foreign exchange and the Nigerian economic growth using the annual data for the period of 1960 to 2012. Using Ordinary Least Square (OLS) technique, the result revealed that exchange rate explained and accounted for about 99% variation in economic growth.

Owoeye, and Ogunmakin (2013) examined exchange rate volatility and bank performance in Nigeria. This study investigated the impact of unstable exchange rate on bank performance in Nigeria using two proxies for bank performance, namely loan loss to total advances ratio and capital deposit ratio. Government expenditure, interest rate, real gross domestic product were added to exchange rate as independent variables. The two models specified show that the impact of exchange rate on bank performance is sensitive to the type of proxy used for bank performance. Loan loss to total advance ratio shows that fluctuating exchange rate may affect the ability of lenders to manage loans resulting into high level of bad loans while capital deposit ratio does not have significant relationship with exchange rate. A core recommendation of this study is that a stable exchange rate is needed to improve the ability of the banking sector to channel credit to the economy.

Adetayo (2013) examined management of foreign exchange risks in a selected commercial bank, in Nigeria. The study sought to determine how the risk involved in foreign exchange can be effectively managed, by determining the following specific objectives: to determine the various exchange risks which the treasurer of the selected bank is exposed to in its foreign exchange transaction; to investigate how these risks can be effectively managed and to identify risk and exposure management techniques required for treasury management. The selected firm used for this study was a Commercial Bank of International Standard, located in Lagos, the business center of Nigeria. The study exploited both the primary and secondary sources of information. The primary source comprised of a structured questionnaires, to elicit pertinent responses from the respondents. A non-parametric measure based on chi-square statistics was employed to test the hypothesis and determine if there is any association between foreign exchange trading and risk management issues. Spot transaction technique was founded to be effective in minimizing foreign exchange risk.

Materials and Method of Data

The study made use of ex-post facto method. The ex post facto is also chosen by the researchers because secondary data were collected as no attempt is made to control or manipulate the relevant independent variables. The population size of the study is made up

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of all 6 quoted conglomerates firms in Nigeria stock Exchange as at 2017. The researchers made used of judgmental techniques in determination of the sample size of the study which is 5 firms.

The analytical technique that was used in this research was the multiple linear regression which is used to evaluate the differences in the observed values of the variables. The basis for the acceptance or rejection of the hypothesis is the f-ratio. The decision rule is that if f-calculated > f-critical, reject the null hypothesis and if otherwise, accept the alternative hypothesis, vice-versa at 5% level of significant.

Presentation and Analyses of Data

In this research study, data used were obtained from publications of the Nigerian Stock Exchange (NSE) and the annual report and accounts of consumer goods companies quoted on Nigeria stock exchange from 2008 to 2017.

Test of Hypothesis one

H₀: Exchange rate fluctuation does not significantly affect return on capital employed (ROCE) of selected conglomerates in Nigeria.

Table 1

| Mod | el | Sum of Squares | df | Mean Square | F | Sig. |
|-----|------------|----------------|----|-------------|-------|-------------------|
| | Regression | 162.472 | 3 | 54.157 | 1.530 | .300 ^b |
| 1 | Residual | 212.377 | 6 | 35.396 | | |
| | Total | 374.849 | 9 | | | |

ANOVA on Exchange rate fluctuations on ROCE

a. Dependent Variable: ROCE

b. Predictors: (Constant), Int Rate, ExchR, InfRate Source: SPSS vr 21

Table 2

Coefficients^a on Exchange rate fluctuations on ROCE

| Model | | Unstandardized Coefficients | | Standardized Coefficients | t | Sig. |
|-------|----------------|--------------------------------|------------|------------------------------|--------|------|
| | | В | Std. Error | Beta | | |
| | (Constant) | 10.560 | 35.094 | | .301 | .774 |
| 1 | Exchange Rate | 224 | .132 | 527 | -1.691 | .142 |
| Ŧ | Inflation Rate | .675 | .600 | .369 | 1.126 | .303 |
| | Interest Rate | .793 | 2.033 | .130 | .390 | .710 |

a. Dependent Variable: ROCE

Source: SPSS vr 21

Interpretation

The coefficients table showed that the significance value for the calculated t-statistics (t = -1.691, 1.126, and .390) for Int Rate, ExchR, InfRate Rate are higher than the 0.05 level of significance used for this study.

The above table shows the regression analysis coefficients as the beta of the standardized coefficient in table shows -0.527 and the P-value 0.142 which is greater than 0.05 at 95%

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confidence level, therefore we reject alternate hypothesis and accept null hypothesis which states that exchange rate fluctuations have no significant effect on return on capital employed of conglomerates companies in Nigeria.

Hypothesis Two

Ho: There is no significant relationship between exchange rate fluctuation and return on asset (ROA) of selected conglomerates in Nigeria

| | | | | <i>a</i> | | |
|-------|------|-------------|-------|--------------|-----|-------|
| ANOVA | on | Fxchanae | rate | tluctuations | on | ROA |
| / | 0.11 | Excitatinge | , arc | Juccuations | 011 | 110/1 |

| Model | | Sum of Squares | df | Mean Square | F | Sig. |
|-------|------------|----------------|----|-------------|------|-------------------|
| | Regression | .090 | 3 | .030 | .700 | .476 ^b |
| 1 | Residual | 7.930 | 6 | .063 | | |
| | Total | 8.019 | 9 | | | |

a. Dependent Variable: ROA

b. Predictors: (Constant), Int Rate, ExchR, InfRate RATE

Source: SPSS Ver 21

Table 4

Coefficients^a on Exchange rate fluctuations on ROA

| Model | | Unstandardized Coefficients | | Standardized Coefficients | t | Sig. |
|-------|----------------|-----------------------------|------------|------------------------------|-------|------|
| | | В | Std. Error | Beta | | |
| | (Constant) | -5.246 | 228.488 | | 023 | .982 |
| | Exchange Rate | .956 | .862 | .395 | 1.109 | .310 |
| T | Inflation Rate | 3.655 | 3.906 | .351 | .936 | .386 |
| | Interest Rate | -9.843 | 13.235 | 283 | 744 | .426 |

a. Dependent Variable: ROA

Source: SPSS Ver 21

Interpretation

The coefficients table showed that the significance value for the calculated t-statistics (t = -1.109, 0.936, and -744) for Int Rate, ExchR, InfRate Rate are higher than the 0.05 level of significance used for this study.

The values of R- squared & the adjusted R- squared in the model summary table (0.011 and - 0.012) indicating that exchange rate fluctuation for just for 1.1% variation in the Return on Assets of conglomerates. The overall regression model is not statistically significant in terms of its overall goodness of fit (f =0.700, P =0.476 > 0.05).

Decision Rule: Accept null hypothesis if f_{cal} is less than f_{tab} . However, reject null hypothesis and accept alternate hypothesis if f_{cal} is greater than f_{tab} .

Therefore, the P-value is 0.310 which is greater than 0.05 critical level, with the beta of standardized coefficient (R^2) of 0.395, we accept null hypothesis and uphold that exchange rate fluctuations have no significant effect on Return on Assets of conglomerates in Nigeria.

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Discussion of Results

From the analysis above, results showed that, exchange rate fluctuation is insignificant. The coefficient of determination (r^2) shows that 43.3% of the changes in return on capital employed could be explained by our model, while the remaining 56.7% could be explained by factors not contained in our model. The regression coefficient of 0.658 shows, that there is a high correlation between the independent variables and return on capital employed. Table above indicates that our model has no significant effect at 95% confidence level P = 0.300 > 0.05.

Finally, table 3 indicates that the coefficient of determination R² of 0.26 implies that 26% of the changes in the return on assets of this sector can be explained by our model, while 74% of the changes in return on assets are due to factors outside our model. In view of these therefore, the finding testify that exchange rate has a positive and non-significant effect on Return on Assets. The finding concurs with Eme et al. (2012) that no evidence of strong direct relationship between changes in exchange rate gross domestic product. The finding is in contrary to that of Helhel (2015) that exchange rate is negatively related to firms' assets size.

Summary of Findings

The study revealed that:

1. Exchange rate has no significant / statistically effect on return on capital employed of conglomerates.

2. It was also discover that exchange rate fluctuations have no significant / statistically effect on Return on Assets of conglomerates in Nigeria.

Conclusion

The conclusion from our study has revealed some estimates of the effects of exchange rate on firm profitability measured by return on capital employed and return on assets. Conclusively, hypothesis tested were all insignificant and in view of these, the finding testify that exchange rate has a positive and non-significant effect on return on capital employed and Return on Assets.

Recommendations

Based on the findings and conclusion above, the following recommendations were made;

1. Government should formulate policies that will be very consistent in controlling or managing exchange rate fluctuations, as exchange rate fluctuation has the capacity of distorting labour rate and other cost of material inputs. Also Authorities in conglomerates should ensure that they engage experts who could forecast accurately the direction of the movement in exchange rate.

2. Government should uphold the restriction policy on the importation of similar products manufactured in Nigeria. If this is religiously pursued, it will create and open more markets for the locally manufactured goods to thrive. More market share for Nigerian manufacturing sector will improve their return on assets, which is a proof of making maximum utilization of their assets in generating earnings.

References

Adamu, N., Zubairu, I.K., Ibrahim, Y.M., Ibrahim, A.M. (2011). Evaluating the impact of product diversification on financial performance of selected Nigerian construction firms. *Journal of Construction in Developing Countries*, *16*(2), 91- 114.

Adeniran, J.O., Yusuf, S.A., & Adeyemi, O.A. (2014). The impact of exchange rate fluctuation on the Nigerian economic growth: An empirical investigation. *International*

Journal of Academic Research in Business and Social Sciences, 4(8), 224-233.

Aghion, P, Bacchetta, P, Ranciere, R & Rogoff, K (2009) Exchange rate volatility and

- productivity growth: the role of financial development. Journal of monetary economics 56 (4) 494-513
- Ahmed, L (2015) The effect of foreign exchange exposure on the financial performance of
- commercial banks in Kenya. International journal of sciences and research publications, vol.5(11)115-150
- Akpan, E.O., & Atan, A.J (2012). Effects of exchange rate movements on economic growth

in Nigeria. CBN Journal of Applied Statistics, 2(2), 1-14.

Akpan, P.L (2008). Foreign exchange market and economic growth in an emerging petroleum based economy: Evidence from Nigeria(1970-2003).*African Economic and*

Business Review, 6(2), 46 - 58.

- Aliyu, S.R.U (2011). Impact of oil price shock and exchange volatility on economic growth
- in Nigeria: An empirical investigation. *Research Journal of International Studies*, 1(1), 103-120.
- Arinze, A.C., Osang, T., & Slottje, D.J. (2000). Exchange ratevolatility and foreign
- trade: Evidence from thirteen LDCs. *Journal of Business and Economic Statistics*, 18(1), 10-17.
- Asher, O.J. (2012). The impact of exchange rate fluctuation on the Nigerian economic growth
- (1980-2010).Unpublished B.Scthesis of Caritas University, Enugu State, Nigeria.
- Azeez, B.A., Kolopo, F.T. & Ajayi, L.B. (2012). Effect of exchange rate volatility on macroeconomic performance in Nigeria. *Interdisciplinary Journal of Contemporary Research in Business.* 4(1), 149–155.
- Barkoulas, J.T., Baum, C., & Caglayan, M. (2000). Exchange rate effect on thevolume and variability of trade flows. *Journal on International Money and Finance*, *21*(3), 481-496.
- Dada, E.A & Oyeranti, O.A. (2012). Exchange rate and macroeconomic aggregates in Nigeria. *Journal of Economic and* Sustainable Development, 3(2), 93-101.
- Dickson, O.O. (2012). Exchange rate volatility and economic growth in Nigeria. *Mediterranean*

Journal of Social Sciences, 3(3), 23-38.

Dmitri, R. (2003). The real exchange rate and the Balassa- Samuelson Hypothesis: An

appraisal of Israel's case since 1986.*Jerusalem*,*Research Department of Bank of Israel*.P.1-35. Retrieved from http://www.bankisrael.gov.il

Gounopoulos, D., Molyneux, P., Staikouras, S.K, Wilson, J.O. & Gang, Z. (2012). Exchange rate risk and equity performance of financial intermediaries: Evidence from

- an international sample. International Review of Financial Analysis, 29(2013), 271-282.
- Graham, J.R., Campbell, R.H., & Rajgopal, S. (2005). The economic implications of corporate financial reporting. *Journal of Accounting and Economics*, 40(3), 3–73.
- Jhingan, M.L.(2002). Macroeconomic Theory, 10th Edition. New Delhi, Vrinda Publications

Ltd.

Kanagaraj, A.&Sikarwar, E. (2011). A Firm Level Analysis of the Exchange Rate exposure of

Indian Firms. *Journal of Applied Finance* Banking, 1(4), 163- 184.

Katarzyna, T., & Magdalena, K. (2014). Analysis of factors affecting fluctuations in the exchange rate of Polish zloty against euro. *Human capitalwithout borders: Knowledge and learning for quality of life*. Portoroz, Slovenia. P. 889-898.

Lindo, D. K. (2008), Assets management is your job. In Super Vision.69 (1),14-18.

Magda, K. (2004). Exchange rate fluctuations and economic activity in developing countries: theory and evidence. *Journal of Economic Development*, 29(1),85-108.

Mordi, C.N. (2006). Challenges of exchange rate volatility in economic management in Nigeria. *Central Bank of Nigeria Bullion,30*(3), 24-33.

Morley, S. A. (1992). The effect of devaluation during stabilization programs in LDCs. *Review*

of Economics and Statistics, 74(1), 21–27.

Mushtaq, R., & Shafiq, R. (2010).Relationship of exchange rate with various macroeconomic variables. Retrieved from <u>www.brecorder.com</u>

Mushtaq, R., & Shafiq, R. (2003). f exchange rate and financial performance. Retrieved from <u>www.brecorder.com</u>

Ndung'u, N.S. (1997). Price and exchange rate dynamics in Kenya: An empirical investigation 1970-1993. *AERC Research Paper*, *3*(1), 58-66.

Nelson, E., & Kara, A. (2002). The exchange rate and inflation rate in the UK. *External Monetary Policy Committee Unit Discussion Paper No. 11.* Bank of England.

Ngugi, R.W. (2001). An empirical analysis of interest rate spread in Kenya. *ICFAI University*

Olaoluwa, R. (2015, May 4). Nigeria should buy locally made goods to grow the economy.

Vanguards. Retrieved from <u>www.vanguardngr.com/2015/05/nigeria-should-buy-locally-</u> made-goods

Omerbegovic, A. (2011). Exchange Rate in Transition: Testing for Real Exchange Rate Convergence; Case of Bosnia and Herzegovina, Croatia and Macedonia, International

Conference on Economy of Integrations (ICEI) *Univerzitet u Tuzli, Conference Proceedings*, 2011. UDK 336.748:330.342.14/.15(497).

Omojimite, B.U., & Akpokodje, A. (2010). The impact of exchange rate reforms on trade performance in Nigeria. *Journal of Social Sciences, 23*(1), 53-62.

Rogers, J.H. & Wang, P. (1995). Real exchange rate movements in high inflation countries.

- Presented to the Board of Governors of Federal Reserve System. *International Finance Discussion Paper*, No 501.
- Sadeghi, M., Hussain, S., & Sherafat, N. (2007). Inflation targeting exchange rate policy for an

oil producing country: Case of Iran. *International Research Journalof Finance and Economics*, 12(1). Retrieved from: http://www.eurojournals.com/finance.htm

Sanginabadi, B. & Hassan, H. (2012). The effect of exchange rate volatility on
growth in Iran. Actual Problems of Economics. 132 (6).http://mpra.ub.uni-

muenchen.de/52406/

Saraki, B. (2016, Mach 11). Saraki canveasses support for made in Nigeria products. *Punch.* Retrieved from www.punchng.com

Siminica, M., Circiumaru, D., & Simion, D. (2012). The correlation between the return on assets and measure of financial balance for Romanian companies. *International Journal of Mathematical Models and Methods In Applied Sciences*. 6(2), 249 – 256.

Simon, D.N. & Razak, A.W. (1999). Nominal exchange rate and nominal interest rate differentials. *IMF Working Papers*. WP/99/141.

Slawinski, A. (2008). Poland's exchange rate policy before joining the euro zone – UMCS Lublin.

Sullivan, R. L. (1996). 'Soup, Oil what's the difference?' Forbes 158, 78-79

Suranovic, S. (2012). International finance theory and policy.

http.www.internationalecon.com/finance/fch30/f30-3.php

Twarowska, K. & Kakol, M. (2014). Analysis of factors affecting fluctuations in the exchange rate of Polish zloty against euro. *Human Capital Without Borders:knowledge and Learning for Quality of Life.* 2014 International conference,

Portoroz, Slovenia. P. 889-898.

Uchendu, O. (1993). Interest rate Policy, Savings and Investment in Nigeria. *CBN* Quaterly *Review*, *31*(1), 34-52.