



The Effect Foreign Portfolio Investment on Economic Growth in Nigeria

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Authors' contributions

This work was carried out in collaboration among all authors. All authors read and approved the final manuscript.

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ABSTRACT

This study examined the relationship between foreign portfolio investment and economic growth in Nigeria between the periods 1986 to 2017. The study employed the Vector Error Correction model (ECM) and granger causality. Market capitalization, foreign portfolio investment and trade openness were the independent variables while gross domestic product is proxy for economic growth in Nigeria. Findings revealed that of the three study variables, trade openness and market capitalization proved to be significant in promoting economic growth in Nigeria while foreign portfolio investment is negative and insignificant. As such, we recommend that policy makers should endeavour to boost the capital market activities so as to foster capital transactions and subsequently increase economic performance and growth in the nation.

Keywords: Foreign portfolio investment; foreign private investment; economic growth.

1. INTRODUCTION

Lack of savings is one of the major economic problems in developing countries. This situation

makes the foreign capital important to fill savings gap [1]. Foreign capital is mainly divided into two categories which are foreign portfolio investment (FPI) and foreign direct investment (FDI). Every

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nation overtime have endeavoured to maintain a positive economic performance. Enhanced economic output is a crucial means of uplifting living standards as well as achieving economic growth and development [2] and one of the vital ways towards enhancing this growth is through capital formation in the form of Foreign Portfolio Investment towards upholding aggregate economic performance.

Foreign Portfolio Investment (FPI) is perceived as one of the most important strategies for the promotion of economic growth and development in developing countries such as Nigeria. This is because Foreign Portfolio Investment can serve as catalyst for growth by increasing the opportunity for developing the countries integration into global financial and capital flows, expand employment and export base, generate technological capability-building and efficiency spill overs to local firms, as well as establish investment arrangements that increase the potential of host countries for economic growth [3,4].

Nigeria is one of the economies with great demand for goods and services and has attracted some Foreign Portfolio Investment over the years, More so International Economic Relation Department whose primary function is to inform foreign investors about the conducive investment environment in Nigeria has been established to facilitate the inflows of portfolio investment into the nation (Gbosi, 2002).

The inflow of portfolio investment into Nigeria may also have been limited by the infancy of Nigerian capital and money market. Although the markets have undergone considerable growth and development in recent years, they are not yet as huge, vibrant and sophisticated as their counterpart in the industrialized nations and as such, cannot compete favourably with them for investment funds. Various outcomes have been seen resulting from capital inflows, But regardless of the claim by most scholars that Nigeria attracts the most flows in Sub-Saharan Africa; its impact is yet to be felt in the workings of the Nigerian economy as the level of economic development is unstable. Also, the dichotomy between the empirical findings of previous studies has created a lot of problems in the establishment of direction of the relation between foreign portfolio investment and economic growth. In the opinion of cooper and Hardt [5], foreign portfolio investment has failed to promote economic growth due to high incidence of

uncontrolled Capital outflows; And these, according to Kolapo and Ojo, [6], will not only aggravate the shortage of resources for development; but also indirectly leads to a decline in growth of an economy.

Therefore, it is not enough that a country attracts international financial flows rather how well are these flows being managed in order to promote the growth of an economy. The destabilizing effect of foreign portfolio inflow has aroused concern over their potential effects on macroeconomic stability, the competitiveness of the export sector, and external sector viability. The most serious risks are that they fuel inflation and drive the real effective exchange rate to unsustainably high levels [7]. It is on this backdrop that this study finds more justification; as such tend to deviate from previous works by means of including more variables. The objective of this study is to examine the nexus between foreign portfolio investment and economic growth in Nigeria.

1.1 Literature Review

1.1.1 Conceptual review

1.1.1.1 Foreign portfolio investment (FPI)

Baghebo and Apere, (2014) defined Foreign Portfolio Investment (FPI) to include investments by a resident entity in one country in the equity and debt securities of an enterprise, resident in another country which seek primarily capital gains and do not necessarily reflect a significant and lasting interest in the enterprise. The category includes investments in government bonds, notes, money market instruments and financial derivatives other than those included under direct investment or in other words, investments which are both below the 10 percent rule and do not involve affiliated enterprises. In addition to securities issued by enterprises, foreigners can also purchase sovereign bonds issued by government. According to IMF (1996) Coordinated Portfolio Investment Survey Guide, the essential characteristics of instruments classified as portfolio investment is that they are traded or tradable and fundamentally made of up of:

- i) Equity securities: These have been defined in the Survey as instruments and records acknowledging after the claims of all creditors have been met claims to the residual values of incorporated enterprises

- (shares, stocks, mutual funds, and investment trusts
- ii) Debt securities: They include bonds and notes, money market securities (instruments such as treasury bills, commercial and finance paper, negotiable certificates of deposits with maturities of one year or less), and financial derivatives or secondary instrument, such as options.

1.1.2 Differences between FDI and FPI

At this point, we shall look at the differences between FDI and FPI and why international investors choose one or the other form of capital to invest abroad. Historically, as Goldstein Razin and Tong [8] pointed out, that multinational corporation chose FDI while private equity funds, mutual funds and hedge funds focused on FPI. This fact allows us to assume that quite similar investors channel their funds through FDI and FPI. Modelling the investor's decision, we assume the investors decision- making process consists of many steps. Firstly, investors decide how much they invest. Secondly, they decide how much to invest aboard, and then in which region to allocate their capital. Finally, they decide to invest in one particular country and choose the proportions of FDI and FPI. We consider the first steps as given and describe the latter two in more details. We analyze the long- run investment strategy as well as short – run adjustments.

An important question is how investors decide whether to engage in FDI or FPI or in both types of investment. Goldstein and Razin [9] analyze this question from the investor's point of view. The main difference between FDI and FPI originates from a trade-off between *profitability* and *liquidity*. FDI allows investors to make decisions in the firm as they are not only the owner, but also the manager of it. Thus, in relation to portfolio investors, FDI investors have a higher control over the firm and more information about its fundamentals that enables them to run it more efficiently and to maximize profits. However, the privileged position of FDI investors comes with a cost. Because FDI is less liquid than FPI, investors might find it difficult to sell their project prematurely when faced with a liquidity shock. Even if FDI investors manage to find a potential buyer, they might sell their shares at a lower price than they are indeed worth. An important assumption in the Goldstein and Razin [9] paper is that market participants know that the FDI investor has insider

knowledge about the firm he owns. If FDI investors decide to exit the investment project, potential buyers assume that there are some risks concerning the investment or that it generates only limited returns.

Another study that deals with the question whether to invest in FDI or FPI was performed by Aynur and Bilgin (2015). According to them, the decision depends on whether the investor wants a high-yield, but less liquid asset or one that is less profitable, but allows withdrawing money quite fast.

1.1.3 Arguments against private foreign investment

Two groups of arguments against private foreign investment are both economic and philosophical or ideological [10].

1.1.4 Economic argument

The gap-filling appropriate foreign investment positions are countered by the following:

- a. Although Multi-national Corporations' (MNCs) provide capital they might diminish domestic savings and investment rates by stifling competition, failing to reinvest much of their profits, generating internal incomes for those groups with lower savings propensities, impeding the expansion of indigenous firms who may otherwise supply them with intermediate good by their practice of importing these products from overseas affiliates and imposing high interests cost on capital borrowed by host government.
- b. The MNC investment might reduce the long-run foreign exchange earnings on both current and capital accounts despite the initial impact of improving the recipient's foreign exchange position. The capital account might deteriorate due to the overseas repatriation of profits, interests, royalties, management fees, etc. the current account might worsen due to substantial importation of intermediate or capital goods.
- c. While the MNCs do contribute to public revenue in the form of corporate taxes they can also diminish the revenue due to liberal tax concessions, disguised public subsidies, tariff protection, and investment allowances provided by the host government.
- d. The technology, management, entrepreneurial skill and oversees contact provided by MNCs rather than developing

local sources of these scarce skills and resources might inhibit their development by stifling the growth of indigenous entrepreneurship – due to the MNCS dominance of local markets

1.1.5 Philosophical/ideological argument

Anyanwu [10] further came up with the following philosophical arguments.

- a. Multinational Cooperation's (MNCs) produce inappropriate goods (those demanded by a small rich minority of the local population), stimulate inappropriate consumption pattern through monopolistic market power and advertizing. All these are done with inappropriate (capital- intensive) technologies of production.
- b. MNCs activities promote uneven development while reinforcing dualist economic structures and exacerbating income inequalities. They tend to worsen income inequalities.
- c. MNCS divert resources away from needed food production to the manufacture of sophisticated goods catering mainly for the tastes and demands of local elites.
- d. As a result of (a) and (b) above, local resources are allocated towards socially undesirable projects which in turn aggravate the already sizeable imbalance between the urban and rural economic opportunities.
- d. Powerful MNCs have the ability to gain control over local assets and job and hence exert considerable influence on political decisions at all levels. In some

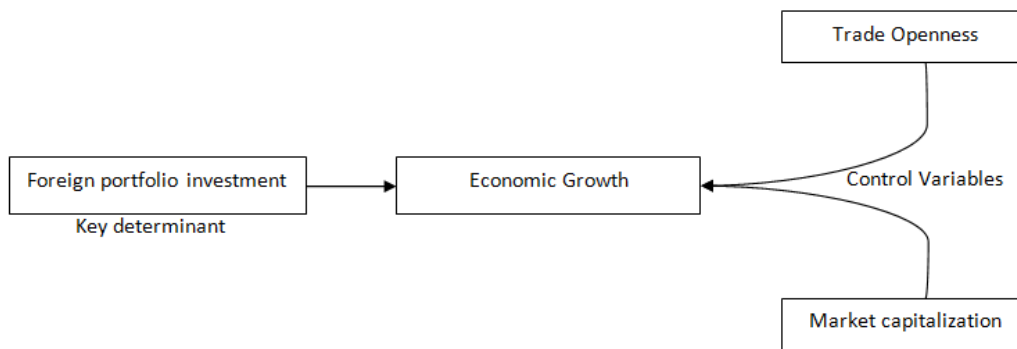
extreme cases, they subvert the very political process of host countries up to the point of overthrowing or sponsoring their overthrow.

- e. MNCs suppress domestic entrepreneurship and use their superior knowledge, worldwide contacts, advertising skills and range of essential competitors and impede the emergence of smaller scale local enterprises.
- f. MNCs use their economic power to engage in activities inimical to the development of their host nations. For instance, they can avoid local taxation by means of artificially inflating the price it pays for intermediate goods purchases from overseas affiliates, so as to lower its practice over which host nations can exert little control so long as corporate tax rates differ from one country to the other.

1.2 Theories of Investment

1.2.1 Keynesian theory of investment

In Keynesian terminology, investment refers to real investment which adds to capital equipment. It leads to increase in level of income and production by increasing the production and purchase of capital goods. Investment thus includes new plant and equipment, construction of public works like roads, dams, buildings, e.t.c In the words of John Robinson, "By investment, is meant an addition to capital, such as occurs when a new house is being built or a new factory is built. Investment means making an addition to the stock of goods in existence." [11].



Theoretical Framework

1.2.2 Acceleration theories of investment

The principle of acceleration is based on the fact that the demand for capital goods is derived from the demand for consumer goods which the former helps to produce. The acceleration principle explains the process by which an increase or decrease in the demand for consumption goods leads to an increase or decrease in investment on capital goods. The accelerator coefficient is the ratio between induced investment and an initial change in consumption expenditure.

1.2.3 Portfolio investment theory

This theory has highlighted different factors governing the international movement of capital. Some theories have considered market imperfections as the reason for foreign direct investment flows while others have considered oligopolistic and monopolistic advantages.

Hymer [12] developed the Foreign Direct Investment theory approach of industrial organization. The essence of Hymer's theory is that firms operating abroad have to compete with domestic firms that are in an advantageous position in terms of culture, language, legal system and consumer's preference. Furthermore, foreign firms are also exposed to foreign exchange risk. These disadvantages must be offset by some form of market power in order to make international investment profitable [13].

1.3 Empirical Review

Tokunbo et al [14] stressed that despite the increased flow of Foreign Portfolio Investment to developing countries in especially sub Sahara African countries including Nigeria, low level of per capita income, high unemployment rate, low and falling GDP are still prevalent. In recent times Nigeria government has initiated policies to attract Foreign Portfolio Investment but this has not impacted positively on the growth rate of GDP. The study therefore analyzed the direction and significance of the effect of Foreign Portfolio Investment in the economic growth in Nigeria covering the period 1990-2005. The study revealed that Foreign Portfolio Investment, Domestic Investment growth and Net Export growth impacted positively and significance on economic growth in Nigeria.

Akinbobola, Ibrahim and Ibrahim [15] investigate the nexus between foreign portfolio investment

and economic growth in Nigeria using the causality and co-integration mechanism. The study lasted for 27 years where trade openness, market capitalization and fording portfolio investment where the explanatory variables while gross domestic product is the explained variable. Finding reveals the existence of long run relationship among the study variables while foreign portfolio investment was found to be significant in promoting economic growth in Nigeria. Result of the causality test provides an evidence of bi-directional relationship between FPI and GDP.

Baghebo and Apere (2014) examined the interrelationship between foreign portfolio investment and economic growth in Nigeria between the periods 1986 to 2011. A three stage methodological process was adopted; one was to check the stationary status of the variables using Augmented Dickey Fuller Unit Root test, which confirmed that the variables had unit root problems, the second was to check for the possibility of a long run relationship using Johansen co-integration test; the third was the parsimonious error correction result. The variables considered are foreign portfolio investment, inflation rate, market capitalization, trade openness. It discovers that foreign portfolio investment; market capitalization and trade openness has a positive long-run relationship with real gross domestic product in Nigeria. Ongoing efforts therefore to sanitize the capital market should be vigorously pursued.

Rachdi and Saidi [16] in their study of the impact of FDI and FPI on economic growth of 100 developing and developed countries over the period 1990 to 2009, found mixed results. First, portfolio investment coefficient was found to be negative and statistically not significant in developing countries, while the reverse was the case for developed countries. Even after including the random effect in a GMM procedure, the coefficient for developing countries while positive, was still not statistically significant [17].

Elekwa, Aniebo and Ogu (2016) investigating the effects of foreign portfolio investment on employment growth in Nigeria employed the ordinary least square (OLS) technique to estimate a single equation model, employed data for the period 1980 to 2014, it was found that in the long term, portfolio investment impacts on employment growth was positively significant. Baghebo, Apere (2014) studying the impact of foreign portfolio investment (FPI) on economic

growth as well as the long run determinants of FPI in Nigeria, employed the ordinary least square (OLS) technique to estimate a single equation model, employed data for the period 1986 to 2011. They concluded that foreign portfolio investment; market capitalization and trade openness has a positive long-run relationship with real gross domestic product in Nigeria [17].

2. MATERIALS AND METHODS

The study utilizes the Ex-post Factor Research Design also known as the Investigative econometric research design as it undertakes the examination of a data-set and looking for potential relations between variables, Due to lack knowledge of the direction and strength of the relation. And based on the fact that variables are subject to concerns regarding internal validity, because the predictor and criterion groups may not be comparable at baseline. The study sample is strictly on the Nigerian economy alongside some related variables that has to do with the topic in question. This related variables includes foreign portfolio investment, market capitalization, trade openness against the gross domestic product between the periods 1986 to 2017

Generally, secondary data were used in this work. These data were time series and cross section (Panel). In Nigeria on yearly basis for the period covered in the work (i.e 1986-2017). The data were sourced and extracted from existing documents and materials. These include the Central Bank of Nigeria (CBN) statistical Bulletin, CBN Annual Report and Statement of Account, CBN Bullion, text books, journals, internet sources, and lecturer's notes relating to the research work among others.

2.1 Method of Data Analysis

- i. Unit Root Test: The unit root test is a test of reliability that seeks to establish the reliability strength of the data. Following the postulation of Gujarati and Porter (2009), that time series data are prone to stationarity problems, therefore, this study will subject the data to unit root test to avoid having spurious result.
- ii. Johansen Co-integration Test: In other to ascertain the long run relationship among the employed

variables, this study will also employ co-integration Test.

- iii. Error Correction Model: The presence of co-integration will lead us to error correction model. The essence of error correction model is to ascertain the speed at which disequilibrium in the short run is corrected in the long run.
- iv. Granger Causality Test: This seeks to test for the influence of one variable on the other. This estimation tool will help in ascertaining the influence of one variable on the other.

2.2 Model Specification

In line with previous related works, the following model was estimated to capture the relationship between the study variables. note that trade openness and market capitalization are modelled as control variables:

$$GDP_t = f(FPI_t, TROP_t, MCAP_t) \quad (1)$$

Converting to econometric form by the introduction of the constant term (α_0) and error term (μ)

$$GDP_t = \alpha_0 + \alpha_1 FPI_t + \alpha_2 TROP_t + \alpha_3 MCAP_t + \mu \quad (2)$$

Where:

- GDP = Gross domestic product
- TROP = Trade openness
- FPI = Foreign portfolio investment
- MCAP = Market capitalization
- α_0 = Constant Term
- $\alpha_1 - \alpha_4$ = Coefficients of Predictors

2.3 Data Analysis and Interpretation

2.3.1 Unit root tests

From the result of the Augmented Dickey-Fuller (ADF) test presented in Table 1 above, we found that all the variable used in these research work has unit root at level and therefore are not stationary. Further research reveals that all the variable became stationary after first differencing in the order of 1(1) integration which suggest that we can proceed to test for long run nexus between all the variables using Johansson co-integration test presented in the table below.

2.3.2 Cointegration test (Johansen Cointegration)

This test is carried out in order to ascertain the trend of long run association that exist among the variables used in the process or research.

The co-integration test tends to empirically define the long-run nexus/association between a given set of variable and identifies the stochastic drift amongst the variables. The decision rule here is that the value of the trace statistic must be greater than the critical value at their various level of significant. From the output on table presented above, it is obvious that three co-integration equation is signed and all the critical value are lesser than the trace statistic at each level. These suggest that there exist 3 co-integrating equation which implies that there is a long run association between all the variable used in the process of research since the probability level exhibit values lower than 0.05 level of significance in which case we reject the

null hypothesis and thus proceed to Vector Error Correction.

2.3.3 Vector error correction model (VECM)

The multiple regression was carried out using the Ordinary Least Square regression tool, as it is the best unbiased linear regression estimator, it was carried out in the normal form and the log-linear form.

The Error Correction estimates results shown in Table 4 above provide substantial evidence to confirm that in the long run, variations in all the foreign portfolio indices (foreign portfolio, market capitalization and trade openness) account for about 88% of the changes in gross domestic product in Nigeria. The coefficient of the ECM has a value of -0.6016 approximately 60%, thus indicating the speed at which gross domestic product adjust back to equilibrium within the year following short run distortions in the foreign portfolio investment inflows.

Table 1. ADF unit root test results

Variables	ADF-statistic	Test Critical Values	Order of Integration	Prob.
D(FPI)	-9.199737	1% level = -3.670170 5% level = -2.963972 10% level = -2.621007	I(1)	0.0000
D(TROP)	-4.250697	1% level = -3.670170 5% level = -2.963972 10% level = -2.621007	I(1)	0.0024
D(MCAP)	-5.335851	1% level = -3.670170 5% level = -2.963972 10% level = -2.621007	I(1)	0.0001
D(GDP)	-3.545294	1% level = -3.699871 5% level = -2.976263 10% level = -2.627420	1(1)	0.0143

Source: E-View 9.1 Output

Table 2. Presentation of Co-integration test output

Date: 04/10/19 Time: 14:25				
Sample (adjusted): 1988 2017				
Included observations: 30 after adjustments				
Trend assumption: Linear deterministic trend				
Series: GDP FPI TROP MCAP				
Lags interval (in first differences): 1 to 1				
Unrestricted Cointegration Rank Test (Trace)				
Hypothesized		Trace	0.05	
No. of CE(s)	Eigenvalue	Statistic	Critical Value	Prob.**
None *	0.777032	87.09535	47.85613	0.0000
At most 1 *	0.517717	42.07361	29.79707	0.0012
At most 2 *	0.413220	20.19686	15.49471	0.0091
At most 3	0.130749	3.203694	3.841466	0.0603

Trace test indicates 3 cointegrating eqn(s) at the 0.05 level

* denotes rejection of the hypothesis at the 0.05 level

**MacKinnon-Haug-Michelis (1999) p-values

Source: Extraction from E-views 10.

Table 3. Presentation of VECM result

	Coefficient	Std. Error	t-Statistic	Prob.
Dependent Variable: GDP				
Method: Least Squares (Gauss-Newton / Marquardt steps)				
Date: 04/10/19 Time: 14:43				
Sample (adjusted): 1987 2017				
Included observations: 31 after adjustments				
GDP = C(1)*GDP(-1) + C(2)*FPI(-1) + C(3)*TROP(-1) + C(4)*MCAP(-1) + C(5)*ecm(-1)				
C(1)	1.068877	0.038810	27.54092	0.0000
C(2)	-0.019504	0.047445	-0.411084	0.6844
C(3)	0.260056	0.103882	2.503389	0.0189
C(4)	0.200471	0.188762	-1.062028	0.0280
Ecm(-1)	-0.601616	440.3910	-1.695451	0.0019
R-squared	0.897997	Mean dependent var		29640.18
Adjusted R-squared	0.887689	S.D. dependent var		35594.76
S.E. of regression	1711.155	Akaike info criterion		17.87441
Sum squared resid	76129320	Schwarz criterion		18.10570
Log likelihood	-272.0534	Hannan-Quinn criter.		17.94981
F-statistic	3238.799	Durbin-Watson stat		1.635863
Prob(F-statistic)	0.000000			

Source: Extraction from E-views

However, while the ECM F-statistics and coefficient are significant at 0.05 level with acceptable Durbin Watson statistics value. Report further shows that trade openness and market capitalization exhibited a positive coefficient of 0.20047 and 0.20047 alongside a significant P-value of 0.0189 and 0.0280 respectively. This thus suggest that trade openness and market capitalization significantly promote economic growth in Nigeria all things being equal. Finally, foreign portfolio investment exhibited a negative coefficient of -0.019504 alongside an insignificant P-value of 0.6844 thus suggest the existence of insignificant P-value. The economic implication of this is that one unit increase in the inflow of foreign portfolio investment is capable of downsizing economic growth in Nigeria to the tune of 0.01950 all thing being equal.

2.3.4 Presentation of pair-wise granger causality test results

The result of Pair-Wise Granger Causality tests conducted on employment of the study's time series data are presented in Table 4 below.

The results of Pair-Wise Granger Causality test shown in Table 4 above indicate absence of any bi-directional causal relationship among any of the paired variables. However two significant uni-directional causal relationships are observed to prevail between (i) trade openness and gross domestic product and (ii) market capitalization and gross domestic product. In both cases,

causality flows from trade openness and market capitalization to gross domestic product. The causality between gross domestic product and foreign portfolio investment manifest Schumpeterian independence hypothesis. In this instance, they appear to be operating independent of gross domestic product in Nigeria.

2.4 Test of Hypotheses

The hypothesis is tested using the result of the vector error correction model estimate and the causality test where the P-value of each of the series will be considered accordingly.

2.4.1 Hypothesis one

Ho₁: There is no significant relationship between foreign portfolio investment and gross domestic product in Nigeria

Following the result of the vector error correction model, foreign portfolio investment exhibited a negative coefficient of -0.01950 alongside an insignificant P-value of 0.6844 thus suggests an insignificant relationship among the series. The result of the granger causality test further suggests absence of causality between foreign portfolio investment and gross domestic product in Nigeria. To this end, we do not reject the null hypothesis and thus conclude that there is no significant relationship between foreign portfolio investment and gross domestic product in Nigeria.

Table 4. Results of pair-wise granger causality tests

Pairwise Granger Causality Tests			
Date: 04/10/19 Time: 15:09			
Sample: 1986 2017			
Lags: 1			
Null Hypothesis:	Obs	F-Statistic	Prob.
FPI does not Granger Cause GDP	31	0.29135	0.5936
GDP does not Granger Cause FPI		0.21073	0.6497
TROP does not Granger Cause GDP	31	5.43453	0.0272
GDP does not Granger Cause TROP		0.60746	0.4423
MCAP does not Granger Cause GDP	31	0.05832	0.8109
GDP does not Granger Cause MCAP		17.1915	0.0003

Source: Extraction from E-views

2.4.2 Hypothesis two

H₀₂: Market capitalization does not significantly promote gross domestic product in Nigeria.

Findings show that market capitalization exhibited a positive coefficient of 0.20047 alongside a significant P-value of 0.0280. Granger causality test result further support this view as we found causality flowing from market capitalization to gross domestic product. As such, we reject the null hypothesis and thus conclude that Market capitalization significantly promote gross domestic product in Nigeria.

2.4.3 Hypothesis three

H₀₃: Significant relationship does not exist between trade openness and gross domestic product in Nigeria.

The result of the vector error correction model provided evidence that trade openness exhibited a positive coefficient of 0.260056 alongside a significant P-value of 0.0189 thus suggesting the existence of significant relationship among the series. Further, the result of the causality test further provides prevailing evidence in support of trade openness. We found that causality flow from trade openness to gross domestic product. On this premises, we reject the null hypothesis and thus conclude that there is a significant relationship between gross domestic product in Nigeria.

2.4.4 Discussion of findings

Foreign Portfolio Investment and Gross Domestic Product in Nigeria.

Finding from this study provide an evidence of absence of significant relationship between foreign portfolio investment and gross domestic product. This can be evidenced from the result of

the vector error correction model as foreign portfolio investment exhibited a negative coefficient of -0.019504 and an insignificant P-value of 0.6844. The thus suggest that one percent rise in the inflow of foreign portfolio investment is capable of downsizing economic growth to the tune of 0.01950 unit all things being equal. The report here negates the position of Baghebo and Apere (2016), Akinbobola, Ibrahim, Ibrahim [15] whose study reported that foreign portfolio investment significantly promote economic growth in Nigeria. The negative contribution of foreign portfolio investment to economic growth could be attributed to the under-development in the Nigerian financial market which discourage more foreign investors [17].

2.5 Market Capitalization and Gross Domestic Product

Finding shows that market capitalization exhibited a positive coefficient of 0.20047 alongside a significant P-value of 0.0280 thus suggesting the existence of significant relationship among the series. Further, granger causality test result provided a prevailing evidence of causality flowing from market capitalization to gross domestic product. The economic implication of this is that one unit increase in market capitalization will promote economic growth to the tune of 0.20047 unit all things being equal. The result here is in consonant with the empirical findings of Baghebo and Apere (2016), whose study suggest that the intervention of the government in the capital market has brought about significant change which affect market capitalization. One of this policy include the deregulation of the capital market in 1993 which made the federal government to internationalize the market in 1995 with the abrogation of laws that constrained foreign participation in the Nigeria capital market.

2.5.1 Trade openness and gross domestic product in Nigeria

Result of the vector error correction model shows that trade openness exhibited a positive and significant relationship on economic growth. The result of the causality test further proves that trade openness cause economic thus suggesting that economic growth process in Nigeria is a function of trade openness. By implication, further opening of the economy will increase inflows of foreign investor in the economy and thus promote economic growth in Nigeria. Meanwhile, policies to check the content of imported commodities and trade should be implemented as an excessively opened economy could become a dumping ground for other foreign partners.

3. CONCLUSION AND RECOMMENDATIONS

3.1 Conclusion

This study examines the relationship between foreign portfolio investment and economic growth in Nigeria between the periods 1986 to 2017. Based on the result of the vector error correction model result and pairwise granger causality test which was used in testing our hypothesis, this study reports that of the three exogenous variables used as an indicator of foreign portfolio investment, only trade openness and market capitalization was able to pass test of hypothesis. The study thus conclude that foreign portfolio investment does not significantly promote economic growth in Nigeria while trade openness and market capitalization rate does.

3.2 Recommendations

Based on our findings, it is therefore important to consider policies that would promote economic growth in Nigeria. As such we recommend thus;

- Based on the significance of market capitalization, policy makers should endeavour to boost the capital market activities so as to foster capital transactions and subsequently increase economic performance and growth in the nation. There is the need for greater foreign participation in the stock market which could be achieved by greater openness.
- Economic, political and institutional environment should be well stabilised to encourage more inflows of foreign portfolio investment.

- Finally, transformation policy of the federal government of Nigeria should target macroeconomic stability, effective institutional settings, and investment friendly policies and discourage capital flight of any form in the country.

COMPETING INTERESTS

Authors have declared that no competing interests exist.

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