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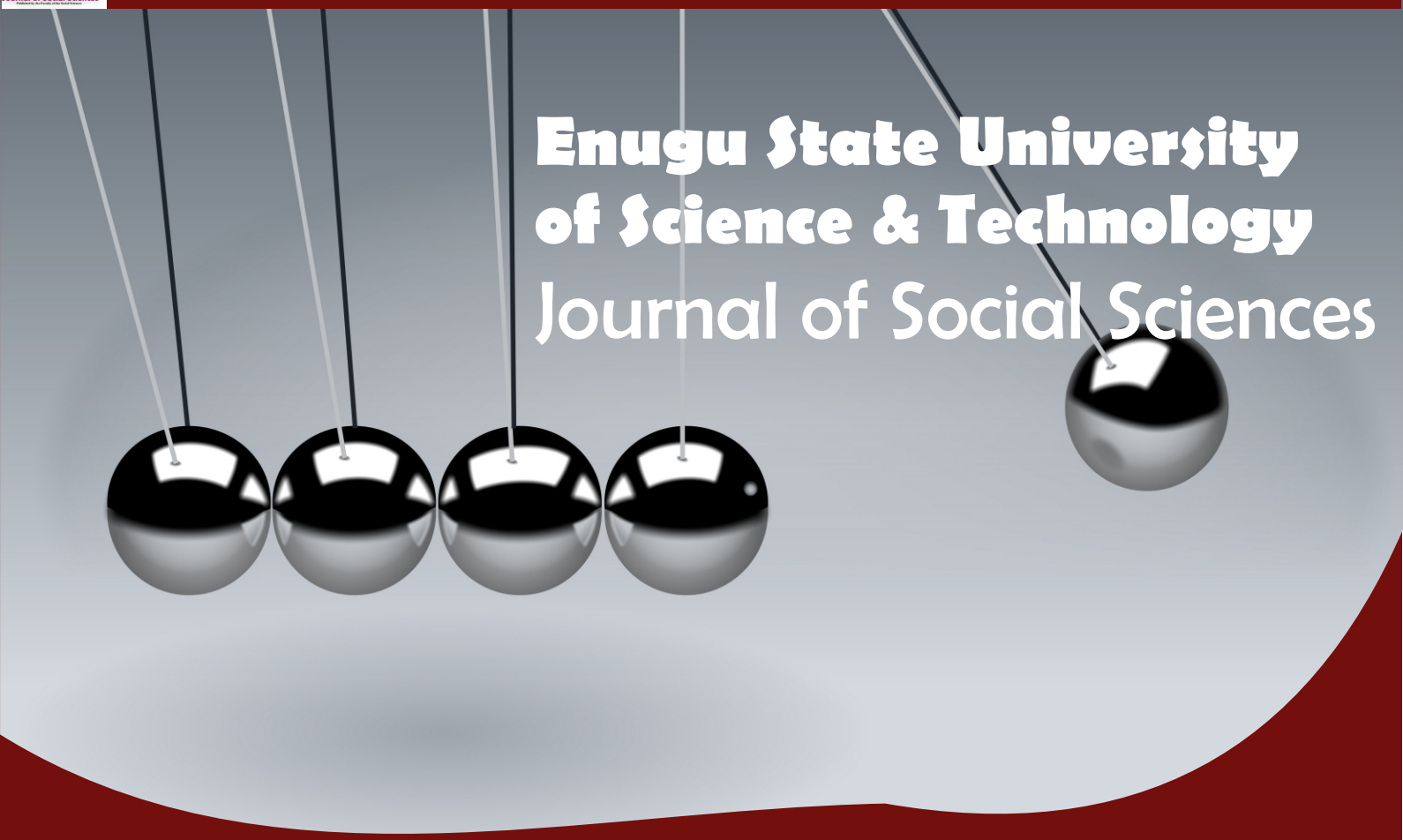

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Impact of Non-Oil Export on Economic Growth in Nigeria

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Abstract
Nigeria given her natural resource base and large market size qualifies to be a world leading economy in production of goods and services, which could be made possible through massive production for both domestic consumption and export. This study investigated impact of non-oil export on economic growth in Nigeria using the auto regressive distributive lag method (ARDL) for both long-term and short-term relationships. Data on Real Gross Domestic Product, Exchange Rate, Inflation, Non-Oil Export and Trade Openness for the period 1981-2017 were collected from Central Bank of Nigeria (CBN), Statistical Bulletin, 2017. The ARDL results revealed that all the variables tend to move together in the long run. However, the impact of non-oil exports on economic growth in Nigeria is not significant enough to take the country to an enviable level within the period under the study. It also indicated that all variables considered possess inherent capacity to contribute to the growth of non-oil export if effectively, efficiently and adequately managed. Therefore, it was recommended that Government should reduce the current exchange rate by 3%. Government should strengthen the current policy on non-oil export to ensure proper implementation and monitoring. They should ensure that implementation plans were strictly adhered to and monitoring agencies were empowered and are actually doing their job properly etc.
Keywords: Non-Oil Export, Economic Growth, natural resources and Nigeria.

Introduction

Two macroeconomic issues that have been the problems of many nations in the world today is the need to reduce inflation and unemployment. These can be combated when nations increase their productive potentials. A nation's productive potentials are among the central factors in determining economic growth of nations because it will also determine wages and standard of living. Every nation, whether develop or undeveloped, strives towards economic growth. Economic growth is the increase in the inflation–adjusted market value of goods and services produce by a nation over time. Most economists believed that export promote economic growth. In fact, the top 20 richest countries in the world today are exporting nations and this goes on to suggest that no country can grow without exporting (Nwanne, 2014; Samuelson and Nordhaus, 2001).

According to Mankiw (2009), exports are goods produced domestically and sold abroad. To Smith (1999), export is to sell a product to another nation. To him, the product(s) can either be crude oil or manufactured goods. Therefore export is of two types: oil and non-oil exports. Oil exports include the exportation of oil products which include crude petroleum and natural gas, among others while non-oil exports include the exportation of non-oil products which are agricultural, industrial and manufacturing outputs (Jhingan, 2011; Kale, 2016).

The Nigerian economy has been depending on foreign trade and investment for growth. Before independence, the economy was characterized by the dominance of non oil exports of which the major component is Agriculture which was then the mainstay of the economy. It contributed so much to the GDP growth of the nation. It provided foreign exchange and employment to the nation. The dominant position of agriculture and the relative unimportance of mining activities in terms of their share of GDP continued until 1970. From the early 1970's, mining and quarrying took over as the major contributor to GDP. This was mainly as a result of the increased production of petroleum and allied products (Okereocha, 2016; Nwankwo, 2015).

The industrial and manufacturing sector has a humble development in the economic history of the country. Before independence, manufacturing industries failed drastically to contribute meaningfully to the Nigerian economy because industrialization was not part of the colonial economic policy. Emerging from total neglect of this sector by our colonial rulers, the contribution of industries to GDP stood at a meager average of 4% between 1970 and 1974. In the 1970's, this sector finds it difficult to rise due to competition for scarce resources with other trade and commercial sub sectors. Currently, industry in Nigeria has traditionally been based on small scale manufacturing and processing (Olayiwola & Okodua, 2014).

Since then, the growth of Nigeria's non-oil exports became sluggish and discouraging. An assessment of the trend and patterns of activities in the non-oil sector of Nigeria revealed that despite the various policies, strategies and reform programmes, the contributions of the sub-sectors of this sector have been dismal, disheartening and below its full potentials.

The end of the oil boom around 1980 led to a significant moderation in the economic environment and industrial policy. The import substitution policy rather than aiming at industrial growth, the targets were on balance of payments crisis, failing foreign exchange receipts and trade payments problem. The various foreign exchange conservation measures implemented in the period 1982-85 led to several of the industries dependent on imported inputs having to operate considerably below capacity, hence reduced growth and worsening unemployment. The adoption of the Structural Adjustment Programme (SAP) in 1986 introduced yet another policy regime. The programme represented a fundamental shift in the basic philosophy of economic management at the national level. The SAP was continued in a three years Economic Consolidation and Expansion Progarmme (ECEP). Followed by other policies, since 1999 – till date, export promotion is a major focus (Chima, 2016).

Nigeria has several incentives for export promotion, but still uses import prohibition to protect its manufacturing and agricultural sectors. The rationale is that the production base is relatively weak, import-dependent, and limited in technological capability. The import prohibition list includes a wide range of manufactured consumer goods that were often dumped in Nigeria's relatively large market. A few agricultural products (e.g. fresh fruits, pork, and frozen poultry) that are produced locally in large quantities are also included in the list to protect the local industry and encourage job creation. On the export prohibition list are staple foods/crops that are important for food security, commodities that could serve as raw materials to local industries and living organisms that are becoming rare. Such commodities include maize, hides and skin, scrap metals, and wildlife animals classified as endangered species.

Another longer-term economic development program is the United Nations (UN)-sponsored National Millennium Goals for Nigeria. Under the program, which covers the years from 2000 to 2015, Nigeria is committed to achieving a wide range of ambitious objectives involving poverty reduction, education, gender equality, health, the environment, and international development cooperation. In an update released in 2004, the UN found that Nigeria was making progress toward achieving several goals but was falling short on others.

From 2003 to 2007, Nigeria attempted to implement an economic reform program called the National Economic Empowerment Development Strategy (NEEDS). The purpose of the NEEDS was to raise the country's standard of living through a variety of reforms, including macroeconomic stability, deregulation, liberalization, privatization, transparency, and accountability. The NEEDS addressed basic deficiencies, such as the lack of freshwater for household use and irrigation, unreliable power supplies, decaying infrastructure, impediments to private enterprise, and corruption. The government hoped that the NEEDS would create 7 million new jobs, diversify the economy, boost non-energy exports, increase industrial capacity utilization, and improve agricultural productivity. A related initiative on the state level and local government level are the State Economic Empowerment Development Strategy (SEEDS) and Local Economic Empowerment Development Strategy (LEEDS) respectively.

Agricultural Transformation Agenda (ATA) was introduced from 2011 - 2015, as a strategy that will reintroduce the Nigerian economy to sustainable agriculture centered on business-like attitude driven by the private sector. Since the fall in oil prices in 2015 and 2016, the government exchange rate policy has limited devaluation of the naira due to inflation. Now, government is making a lot of effort to see that there is a step up in the production of food crops for consumption, cash crop for export as well as raw materials for our industry. There is now hope for non-oil export in Nigeria.

ATA was followed by Agricultural Promotion Policy (APP) 2016-2020 plan, which aimed to cure two economic issues; the shortage of food for local consumption and the meagre foreign exchange earned from the export of agriculture produce. In fact, APP seeks to (i) Improve productivity into a number of domestically focused crops and activities such as rice, wheat, fish, dairy milk, soya, beans, poultry, horticulture (fruits and vegetables) and sugar. (ii) For export markets the production of crops and activities such cowpeas, cocoa, cashew, cassava (starch, chips and ethanol), ginger, sesame, oil palm, yam, horticulture, beef and cotton.

Despite all these laudable government policies/programmes, Nigeria still remains a mono-product economy depending mainly on one primary product with a lot of challenges. The economic recession the country is engulfed in indicate that she is not prepared for any shock on the economy. Thus, there is need to reposition the economy in a way that will enhance the simultaneous growth of all sectors of the economy like agriculture and industrial sectors etc, for local consumption and export thereby embracing an approach that will ensure a balanced economy.

As the front burner of all the economic discuss in Nigeria today centers more on the need to diversify the economy and in a bid to give credence to those calling for a diversified economy, hence the need to determine the impact of non-oil export on economic growth in Nigeria. This will assist in answering the questions (i) what is the extent of impact of non-oil export on economic growth in Nigeria? (ii) Is there any causality relationship between non-oil export and economic growth in Nigeria?

Literature Review

Theoretical literature

Theory of balanced growth proposed that all sectors of the economy should be growing simultaneously so as to keep a proper balanced between industry and agriculture and between production for home (domestic) consumption and production for exports. This will promotes equality in comparative prices in all the sectors, enhance growth in all sectors of the economy, increase income, demand and supply for goods whose income elasticity of demand is more. Thereby, chances of bottleneck in different sectors will be quite remote (Pettinger, and Pragyandeepa, 2012).

Absolute advantage theory means the ability of a country to produce a larger quantity of a good with the same amount of resources as another country. The country's absolute advantage may be due to the nature of its resources or to its production skills. According to Smith, each nation benefits by specializing in the production of the goods that it produces at a lower cost than the other nation, while importing the good that it produces at a higher cost. This will increase specialization, world output and the gains from trade. According to this theory, foreign trade is a positive-sum game, because both countries involved will benefit from the trade. Thus, a nation need not gain at the expense of other nations, as all nations could gain simultaneously (Mankiw, 2009; McCombie and Brue, 1993).

The export-led hypothesis states that the growth of exports has a favourable impact on economic growth. The export-led growth hypothesis postulates that exports are a main determinant of overall economic growth. The theoretical rationale for this hypothesis hinges on a number of arguments which include the following: first, that the export sector may generate positive externalities on non-export sectors through more efficient management styles and improved production techniques (Jhingan, 2011; Lipsey & Chrystal, 2011).

Second export expansion will increase productivity by offering potential for scale economies. Third, exports are likely to alleviate foreign exchange constraints and can thereby provide greater

access to international markets. These arguments have recently been extended by the literature on "endogenous" growth theory which emphasizes the role of exports on long-run growth via a higher rate of technological innovation and dynamic learning from abroad (Jhingan, 2011; Lipsey & Chrystal 2011; Mankiw, 2009; McCombie and Brue, 1993).

Empirical literature

Olayiwola and Okodua (2015) in their research on foreign direct investment, non-oil exports, and economic growth in Nigeria: a causality analysis, examined the applicability of the export-led growth (ELG) hypothesis using empirical evidence from Nigeria. The Empirical evidence from available data failed to support the export-led growth hypothesis in Nigeria. The result of the variance decomposition revealed that, a unidirectional causality runs from FDI to non-oil exports using gross domestic product, foreign direct investment and non-oil exports as variables. They failed to consider inflation, exchange and trade openness in their analyses.

Abogan, Akinola and Baruwa (2014) investigated the impact of non-oil export on economic growth in Nigeria between 1980 and 2010, using error correction mechanism, over-parametization and parsimonious. Gross domestic product, non- oil export, inflation rate and exchange rate were used in their analysis. The study reveals that the impact of non-oil export on the economic growth was moderate and not all that heartening as a unit increase in non-oil export impacted positively by 26% on the productive capacity of goods and services in Nigeria during the period. They failed to consider trade openness in their analysis. Again, the number years considered here is shorter.

Adenugba, and Dipo (2013) examined the impact of non-oil exports on economic growth in Nigeria: a study of agricultural and mineral, using descriptive and inferential statistic tools to analyze gross domestic product, non-oil exports and exchange rate. Findings from the study revealed that non-oil exports have performed below expectations giving reason to doubt the effectiveness of the export promotion strategies that have been adopted in the Nigerian Economy. The study also revealed that the Nigerian Economy is still far from diversifying from crude oil export and as such the crude oil sub-sector continues to be the single most important sector of the economy. They failed to consider inflation and trade openness in their analyses.

Raheem, Raheem, and Adeniyi (2013) examined the linkage between economic growth and non-oil export using time series data for Nigeria over a period of 1970-2010, employing both Simultaneous Equation Model (SEM) and a single equation model. Gross domestic product, non oil exports, agriculture and industrial were used in the analysis. The result shows that non oil export and agricultural performance are negatively associated with growth. It was also found that that the industrial sector performance and population growth are good determinant of economic growth. They failed to consider inflation, exchange and trade openness in their analyses.

Ifenacho, Omoniyi and Olufunke (2014) investigated the effect of non-oil export on the economic development of Nigeria using ordinary least square estimating technique. The study used per capita income as proxy for economic development and expressed it as a function of non-oil export volume, trade openness, exchange rate, capital formation and inflation rate. The result shows that

non-oil export exhibits a significant positive relationship with per capita income. This indicates that if non oil export volume is increased it is going to lead to a significant improvement in the Nigerian level of economic development. However, other variables do not have individual significant impact of economic development but jointly they can significantly influence economic development. In addition, the result shows that the coefficient of trade openness is negative thus, indicating that Nigeria might not be benefiting enough by trading with outside countries. They failed to conducted cointegration test using the auto regressive distributive lag method (ARDL) for both long-term and short-term relationships.

Olurankinse and Fatukasi (2012) analysed the impact of non-oil export on the growth of the Nigerian economy using ordinary least square (OLS) statistical tool was used to analyze the data. The findings revealed that non-oil export has positive effect on the growth of Nigerian economy during the period under review, though the performances in terms of output level and revenue generation was below expectation. They failed to conducted cointegration test using the auto regressive distributive lag method (ARDL) for both long-term and short-term relationships.

Nwanne (2014) investigated the relationship between diversification of non-oil export products and economic growth in Nigeria from 1981 and 2014 using Johansen Co integration test. The study reveals that there is significant relationship between diversification of non-oil export and economic growth in Nigeria during the period. This is because the study reveals that agricultural and manufacturing components of non-oil export has positive and significant relationship with economic growth while solid minerals components has negative and insignificant relationship with economic growth in Nigeria. They failed to conducted cointegration test using the auto regressive distributive lag method (ARDL) for both long-term and short-term relationships.

The study by Okafor, Akandu and Ike (2016) was aimed at devising a viable non-oil export-led growth policy from 1980 to 2014 using robust factor analytic model. Results indicated that there was positive significant relationship between non-oil export and growth in Nigeria which was solely attributable to the influence of foreign direct investment and trade liberalization. Moreover, the study revealed that the active variables in the constellation of foreign direct investment and trade liberalization provided the theoretical constructs for a new nonoil export-led growth policy. They failed to consider inflation and exchange in their analyses.

Igwe, Edeh and Ukpere (2015) adopted the export-led growth hypothesis to examine the impact of non-oil export to economic growth in Nigeria for the period 1981-2012. The model specified economic growth as a function of capital stock, labor and non-oil export using Johansen cointegration and the vector error correction model. Findings from the VEC analysis revealed that in both the short and long runs, non-oil export determines economic growth. Also, the cointegration analysis indicated a long run relationship between non-oil export and economic growth over the period under study. However, the Granger causality analysis indicated no causality relationship between non-oil export and economic growth. A uni-directional causality relationship runs from capital stock to economic growth. Also, a uni-directional causality relationship runs from economic growth to labor force. They failed to consider inflation, exchange and trade openness in their analyses.

Onodugo, Ikpe and Anowor (2013) investigated the impact of the non-oil exports to the growth of Nigerian economy using data between 1981 and 2012. The study adopted the Augmented Production Function (APF) to consider labour force, capital stock, oil export, non oil export & trade openness. Findings reveal a very weak and infinitesimal impact of non-oil export in influencing rate of change in level of economic growth in Nigeria. They failed to consider inflation and exchange rate.

In his research, Usman (2010) examined Non-Oil Export Determinant and Economic Growth Nigeria (1988-2008) using simple linear regressions to analyze non-oil export, exchange rate, per capita income & gross domestic product. The outcome of the analyses revealed that Nigeria non-oil export as some significant contribution on our economic growth. They failed to consider inflation and trade openness in their analyses.

Omojolaibi, Mesagan and Adeyemi (2015) examined the Impact of Non-oil Export on Domestic Investment in Nigeria using error correction model and the granger causality test to analyze non-oil export, inflation, exchange rate and total labour force. The findings revealed that the impact of non-oil export on domestic investment was positive but insignificant. The insignificance is as a result of the mono- cultural nature of production skewed towards the oil sector, although the positive coefficient shows that a lot of prospects still exist in the sector. Also, the findings show that while domestic investment granger causes non-oil export, non-oil export did not granger cause domestic investment. They failed to consider trade openness in their analyses.

Nwachukwu (2014) investigated the Impact of Non-Oil Export Strategies on Economic Growth in Nigeria from 1970-2013 using ordinary least square method to analyze gross domestic product, tariff, bank credits infrastructural facilities (transport & communication). The result shows that infrastructure bears a negative relationship with the GDP and credit from commercial bank and tariffs have positively affected economic growth in Nigeria. They failed to consider inflation, exchange and trade openness in their analyses.

Knowledge Gap

This study adopted the export-led hypothesis as its theoretical underpinning. The few empirical studies reviewed in this study have shown that there still exist a controversy on the relationship between non-oil export and economic growth. None of the aforementioned studies conducted cointegration test using the auto regressive distributive lag method (ARDL) for both long-term and short-term relationships. Again, this study covered recent years which other studies did not cover. Also, none of these studies that examined the impact of non-oil export on economic growth in Nigeria alone (that is, without appendix) considered the causality relationship between non-oil export and economic growth in Nigeria. Finally, some important variables such as inflation, exchange and trade openness were omitted in most of the studies under review. Thus, this established the premise for this research.

Method

Research Design

Since this study involves determination of the impact of some variables on the other, the appropriate research design is Ex post facto research.

Theoretical Framework

This study adopted the theory of export-led hypothesis which states that the growth of exports has a favourable impact on economic growth. The export-led growth hypothesis postulates that exports are a main determinant of overall economic growth. The theoretical rationale for this hypothesis hinges on a number of arguments which include the following: first, that the export sector may generate positive externalities on non-export sectors through more efficient management styles and improved production techniques (Jhingan, 2011; Lipsey & Chrystal, 2011). Second export expansion will increase productivity by offering potential for scale economies. Third, exports are likely to alleviate foreign exchange constraints and can thereby provide greater access to international markets. These arguments have recently been extended by the literature on "endogenous" growth theory which emphasizes the role of exports on long-run growth via a higher rate of technological innovation and dynamic learning from abroad (Jhingan, 2011; Lipsey & Chrystal 2011; Mankiw, 2009; McCombie and Brue, 1993).

Model Specification

In line with the linear model employed by Abogan, Akinola and Baruwa (2014) in analyzing the relationship between non- oil export, inflation rate and exchange rate, this study utilized a growth model which specified economic growth as a function of non- oil export, exchange rate, inflation and trade openness.

Model Estimation

We specify the following model:

RGDP = f(EXR,NOE, INF,TOP) …….(1)

The stochastic model is then as follows:

$RGDP_t=\beta 0+\beta 1 \log EXR_t+ \beta 2 \log NOE_t+ \beta 3 INF_t+ \beta 4 \log TOP_t+ \mu t$ ……((2)

Where: RGDP = Real Gross Domestic Product as a proxy for economic growth

EXR = Exchange Rate

INF = Inflation

TOP = Trade Openness: Import + Export

RGDP

The inclusion of the above control variables EXR, INF and TOP helps to explain better the relationship between non-oil export and economic growth most especially in export-led hypothesis approach.

b0, b1, b2, b3, b4, = parameters

μt = disturbance term

Apriori Expectations

f1b1, f1b3 and f1b4 < 0 and f1b2 > 0

Where: f1b1 = Exchange Rate

f1b2 = Non-Oil Export

f1b3 = Inflation

f1b4 = Trade Openness

However, in predicting the direction of causality between FDI and economic growth in Nigeria, we employed the Granger Causality test technique. The Granger causality test assumes that the information relevant to the prediction of the respective variables, real gross national product and the other variables in the regression is contained solely in the time series data on these variables.

Results and Discussion

Unit root tests results

The result of the unit root tests on the variables using the Augmented Dickey-Fuller (ADF) statistic are summarized in table 1 below:

Table1: Unit root test results of yearly data on variables with Trend 1981-2017

Variable	ADF-statistic value	5% Critical value	Probability value	Order of integration
RGDP	-3.339742	-2.948404	0.0205	I(1)
EXP	-5.588222	-2.948404	0.0000	I(1)
NOE	-7.036883	-2.960411	0.0000	I(1)
INF	-5.456032	-2.945842	0.0001	I(0)
TOP	-4.291129	-2.948404	0.0018	I(1)

Source: Extraction from estimation output using E-views 9

The unit root test results show that only inflation is integrated at level, while real gross domestic product, exchange rate, non-oil export and trade openness were integrated at first. This called for co integration test to ascertain whether there is long run relationship among the variables.

ARDL Bounds Test

Table 2: Result of Bound Test Co integration Test

Test Statistic	**Value**	**K**
F-statistic	4.902173	4
Critical Value Bounds		
Significance	I0 Bound	I1 Bound
10%	2.45	3.52
5%	2.86	4.01
2.5%	3.25	4.49
1%	3.74	5.06

Source: Extraction from estimation output using E-views 9

Table 2 above shows that the computed F-statistic (4.902173) exceeds the lower bounds and the upper bound values. Therefore, cointegration exists. Having established the existence of cointegration, we present the result of the of the ARDL estimates in Table 3 below.

4.3 ARDL test

Table 3: ARDL Short Run Result

Variable	**Coefficient**	**Std. Error**	**t-Statistic**	**Prob.**
LEXR	-0.028316	0.024442	-1.158511	0.2648
LNOE	0.069415	0.022386	3.100878	0.0073
INF	-0.001188	0.001261	-0.942333	0.3610
TOP	-0.323871	0.226990	-1.426804	0.1741
CointEq(-1)	-0.132446	0.114944	-1.152270	0.2672

Source: Extraction from estimation output using E-views 9

Short Run Result

Table 3 presented the result of the Short run ARDL model. The result indicates that exchange rate (EXR) is not statistically significant (p(t) = 0.2648) with a negative relationship with economic growth as shown by its negative sign. It could be interpreted that a one per cent increase in exchange rate would lead to 0.028316 per cent decline in economic growth. The short run result also indicates that non-oil export (NOE) is statistically significant (p(t) = 0.0073) with a positive relationship with economic growth. One per cent increase in non-oil export (NOE) would lead to

0.069415 per cent increase in economic growth. In the short run, the relationship between inflation (INF) and economic growth is negative and statistically insignificant (p(t) = 0.3610). One per cent increase in inflation leads to -0.001188 per cent decline in national output. Similarly, the relationship between trade openness (TOP) and economic growth is negative and statistically insignificant (p(t) = 0.1741). One per cent increase in trade openness leads to -0.323871 per cent decline in national output.

Table 4: ARDL Long Run Result

Variable	Coefficient	Std. Error	t-Statistic	Prob.
LEXR	0.856818	0.778780	1.100206	0.2886
LNOE	-0.801171	0.805317	-0.994852	0.3356
INF	-0.025731	0.036970	-0.696005	0.4971
TOP	8.956433	6.303014	1.420976	0.1758
C	9.058859	0.600506	15.085389	0.0000

Source: Extraction from estimation output using E-views 9

Long Run Result

Let us examine the long run ARDL result in table 4. With regards to exchange rate (EXR) there is a positive relationship between exchange rate and economic growth in the long run. One per cent increase in exchange rate leads to 0.856818 per cent in national output. This coefficient is statistically insignificant with (p(t) = 0.2886) in the long run. The relationship between non-oil export (NOE) and economic growth is negative. One per cent increase in non-oil export (NOE) is leads to a decline of -0.801171 per cent in economic growth in the long run. This coefficient is statistically insignificant (p(t) = 0.3356) in the long run. The relationship between inflation and economic growth is negative and statistically insignificant (p(t) = 0.4971) in the long run. One per cent increase in inflation leads to -0.025731 per cent decrease in national output in the long run. Similarly, the relationship between trade openness (TOP) and economic growth is positive, but not statistically significant (p(t) = 0.1768) in the long run. One per cent increase in trade openness leads to 8.956433 per cent increase in national output. Increasing trade openness exerts positive pressure on economic growth. This outcome meets a priori expectations. Jointly, all the explanatory variables are statistically significant with the value of F-statistics (4.902173).The fitness of the model is given by the coefficient of determination (R2) with the value of 0.727108. This indicates that 72.71 per cent of changes in economic growth are explained by the explanatory variables in the model. The error correction term (coefficient) is calculated as -0.132446. This implies that the speed of adjustment of GDP back to original equilibrium after a shock is 13.25 per cent.

Diagnostic tests

The objective of this test is to verify whether the error terms corresponding to different observations are serially correlated or not. Thus, Lagrange Multiplier (LM) test, heteroskedasticity test and normality test were used for this purpose.

Table 5: Result of Lagrange Multiplier (LM) serial correlation Test

F-statistic	0.183443	Prob. F(2,13)	0.8345
Obs*R-squared	0.905764	Prob. Chi-Square(2)	0.6358

Source: Extraction from estimation output using E-views 9

The result of the Lagrange Multiplier (LM) serial correlation test shows that the probability value is greater than 0.05, therefore, serials correlation is not present in a model.

Table 6: Result of Heteroskedasticity Test

F-statistic	0.752802	Prob. F(17,15)	0.7154
Obs*R-squared	15.19273	Prob. Chi-Square(17)	0.5816
Scaled explained SS	3.222870	Prob. Chi-Square(17)	0.9999

Source: Extraction from estimation output using E-views 9

The result of the heteroskedasticity test shows that its probability value is greater than 0.05, therefore, heteroskedacity is not present in the model.

Normality Test:

Table 7: Normality Test Result

Skewness	**Kurtosis**	**Jarque-berra**	**Probability**	**Test**
0.47	3.05	0.48	0.47	ND

ND- Normally distributed

Source: Extraction from estimation output using E-views 9

The table 7 shows that its probability value of 0.47 is greater than 0.05 indicating the stability of the parameters. The estimated residuals from the regression in fig 1 seem to be symmetrically distributed. Application of the skewness test shows that the skewness statistic is about 0.47 and the kurtosis test of normality shows that the error term of 3.05 in our specified equation is normally distributed. This is evidenced by the respective insignificant Jarque-Bera statistics of the relevant variables. Therefore, the error terms are normally distributed.

Table 8: Result of Granger Causality Test

Causality Relationship	F-Statistic	Prob.	Direction of causality relationship
RGDP and EXR	0.37585	0.6899	No Causality Relationship
RGDP and NOE	0.13498	0.8743	No Causality Relationship
RGDP and INF	0.99386	0.3820	No Causality Relationship
RGDP and TOP	3.35046	0.0486	Uni-Directional Causality Relationship

Source: Extraction from estimation output using E-views 9

From table above, the Granger causality test was carried out to examine the direction of the relationship between the variables involved in the research. The result of the test, as shown in table 8 above, signifies there is no causality relationship between RGDP, NOE, 1NF and EXR. Thus, none of the variables mentioned above Granger causes each other. This is justified by the fact that their various probability values corresponding to their relationship is more than the 5% level of significance. The results also indicate that there is uni-directional causality relationship that runs from RGDP to TOP. This is justified by the fact that their probability values corresponding to their relationship is less than the 5% level of significance.

Discussion of Result

The regression result indicates that exchange rate (EXR) is not statistically significant on economic growth in the short run. Since exchange rate has a negative impact on economic growth, there is a serious need to reduce the current exchange rate so as to move the economy forward. This reiterates the apriori expectation that increasing exchange rate leads to decline in economic growth in the economy. Although in the long run, exchange rate has a positive relationship between exchange rate and economic growth which indicated that it has potentials to impact positively on economic growth. Thus, a continuous reduction in exchange rate now will lead to economic growth in the long run. The result corresponds with the result of Ogunjimi, Aderinto and Ogunro (2015) that exchange rate has a negative impact on economic growth.

The short run result on non-oil export (NOE) is statistically significant with economic growth. This implies that the current policy on non-oil export has significant impact on production. Sustenance of such policy will contribute positively to economic growth as is evidenced in this study. This outcome is similar with the findings of Usman (2010) but contradict with the findings of Omojolaibi, Mesagan, & Adeyemi (2015) that non-oil exports have significant impact on Nigerian Economy. Nevertheless, the long run result shows that the relationship between non-oil export (NOE) and economic growth is negative. This may imply that the policies though good were not properly implemented and monitored.

Also the inflation result shows that both in the short and long run, it has insignificant relationship with economic growth. One per cent increase in inflation leads to decline in national output. This implies that there is need to increase local production of goods and services in other to bring down prices and inflation rate. These findings agreed with the findings of Omojolaibi, Mesagan & Adeyemi (2015) that inflation has a negative impact on economic growth.

Similarly, both in the short run and long run relationship between trade openness (TOP) and economic growth is negative and statistically insignificant. One per cent increase in trade openness leads to a decline in national output. This implies that the business environment is not friendly to promote trade. This outcome agreed with Onodugo, Ikpe & Anowor (2013) findings that trade openness is statistically insignificant.

Conclusion

This study investigated impact of non-oil export on economic growth in Nigeria using a time series data for the period 1981-2017. The ARDL bounds test confirms existence of cointegration among the variables. While exchange rate (EXR) has a negative statistically insignificant relationship with economic growth in the shortrun, its long run relationship shows a positive relationship with economic growth. However, non-oil export (NOE) has a statistically positive significant impact on economic growth. In the short run, the relationship between inflation (INF) and economic growth is negative and statistically insignificant. Similarly, both in the short run and lung run trade openness (TOP) and economic growth has a negative and statistically insignificant relationship. The Granger causality test signifies there is no causality relationship between RGDP, NOE, 1NF and EXR and uni-directional causality relationship that runs from RGDP to TOP meaning that trade openness (TOP) granger causes economic growth in Nigeria within the period under the study.

Recommendations

Based on the findings of this study, it is recommended that;

(i) Government should reduce the current exchange rate by 3%, a continuous reduction of the exchange rate will help to grow the economy in the long run as indicated by the result.

(ii) Government should strengthen the current policy on non-oil export to ensure proper implementation and monitoring. They should ensure that implementation plans were strictly adhered to and monitoring agencies were empowered and are actually doing their job properly.

(iii) Government should include all products that can be produced locally in the list of banned imported goods to promote massive production. This would push down prices of goods and services and inflation rate to 2-3%.

(iv) There is need for government to ensure that the business environment is friendly with steady power supply and enough security for industry.

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