Trade Policy and Sustainable Human Development in Nigeria

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Abstract

This study was basically carried out to assess the impact of trade policy and sustainable human development in Nigeria. Dynamic Auto-regressive distributive lag model (ARDL) was used to analyse the data from 1981 to 2020. Augmented Dickey Fuller (ADF) and Philip Peron (PP) unit root test results showed that all the variables were stationary at the first difference and the Bound test confirmed a long-run relationship among the variables. The ARDL results show the trade variables which are export (EXP), import (IMP), and trade openness (TROP) also exhibited some level of changes which in line with Nigeria's peculiarity. Also, the long-run scenario though positive is insignificant and has much to say about the current trade policies which are undermining the country's local output and reducing income per capita from the perspective of the firm's revenue due to falling demand and income of workers due to unemployment. The findings show that the short-run import (LIMP) has a negative impact on human development (LHDI) in Nigeria and this impact is statistically significant at the significance level of 0.05. The study, therefore recommended that Nigeria's trade policy should be designed within the general context of sustainable human development objectives and goals among others.

1. INTRODUCTION

Trade is an engine of growth that creates jobs, reduces poverty, and increases economic opportunity. Trade refers to the voluntary exchange of goods or services between different economic actors. Since the parties are under no obligation to trade, a transaction will only occur if both parties consider it beneficial to their interests. Trade policy refers to the agreements and regulations surrounding imports and exports between different countries. It is used to promote economic growth and competitiveness. The main instruments of trade policy in Nigeria are negotiating agreements, setting rules, and enforcing trade commitments and laws; supporting export financing and licensing market research, and trade missions; regulating and adjusting laws on imports and exports; encouraging trade and growth with developing countries; and protection and promotion through investment treaties and agreements (Deardorff, 2016; Ackermann,2012).

Sustainability concerns itself with fairness regarding the treatment of present and future generations and contends that for ethical reasons exploitation of resources should not leave future generations worse off than the current. Sustainability also requires that the current generation, though capable of acting otherwise, should manage the resource base such that the

average quality of life it ensures can potentially be shared by all future generations (Ashein, 2014). Sustainability also demands that the average quality of life be spread equitably within the present generation (intra-generational) and between the present and future generations (intra-generational) (Hanley et.al 2013). Sustainability has come to be a rallying cry and an organizing principle for much of the subsequent public discussion about natural resources and environmental policy. It, therefore, serves to encourage a longer-run perspective in policy discussions and decisions (Field, 2014). Thus, the essence of economic development is the long-run change that affects environmental quality. The expectation is that development would shift the production possibility curve outward as economies change, becoming less tied to natural resources, and as less polluting technologies are adopted, and this outward shift would improve the potential trade-offs between marketed output (Field and Field, 2014).

Bhardwaj, Ansari, and Rajput (2012) expanded the four pillars of human development by Ogunniyi (2018) to six basic pillars of human development to include: Equity and Equality, Sustainability, Productivity, Empowerment, Cooperation, and Security. Equity and equality is the idea of fairness for every person, between men and women; we all have the right to education and health care. Secondly, sustainability is the view that we all have the right to earn a living that can sustain our lives and have access to a more even distribution of goods. In addition, productivity states the full participation of people in the process of income generation. This also means that the government needs more efficient social programs for its people. Empowerment is the freedom of people to influence development and decisions that affect their lives. Cooperation stipulates participation and belonging to communities and groups as a means of mutual enrichment and a source of social meaning. Last but not least, Security offers people development opportunities freely and safely with confidence that they will not disappear suddenly in the future (Vanhanen, 2011; Escosura, 2014; Oulton, 2012; Ward and Devereux, 2012).

Trade policy and sustainable human development are interlinked. Trade policy can play an important role in providing better livelihoods and well-being and in opening societies to socioeconomic and political change. However, the links between trade and human development are not automatic; they are complex and can even be transmitted. But it is possible to understand the impacts of trade policy on human development outcomes about four criteria or pillars of human development: (1) equity and equality; (2) sustainability; (3) empowerment and (4) productivity (Ogunniyi, 2018). UNDP (2012), posit that a Country's specific situations and circumstances influence the interaction between trade and human development. These include situations that are difficult or very slow to change, such as initial factor endowments (e.g., land, labour, capital), geography (e.g., landlocked), and climate. Other factors are amenable to intervention, including trade policy reforms and actions by trading partners.

The gaps between developing countries' trade policies and international competitiveness call for a stronger emphasis on direct policy action in respect of structural production and investment conditions and reinforced international support. Price and preferential incentives alone have not brought about a broad turnaround where the production basis was not sufficiently developed to expand exports. Nor have they been sufficient in such cases to attract large-scale foreign investment. Attention could be given to a supply-side emphasis for such treatment, providing space in the multilateral trade disciplines for appropriate development policies essential for the development of a competitive supply capacity. Special and differential treatment in WTO Agreements, such as the [Agreement on Subsidies and Countervailing Measures], needs consideration to better reflect the developing countries' needs (UNDP, 2013). To improve the situation, the Nigerian government has pragmatic different programmes and economic reforms to diversify the revenue base through the exchange rate, and monetary and fiscal policies (Obadiaru, et al., 2018; Oladipo et al, 2019). The exchange rate, export promotion, and import substitution, on the other hand, is an important macroeconomic indicator

used in determining the level of performance of an economy because the overall movement in its policies tends to have multiplier effects on macroeconomic variables (Asaleye, Okodua, Oloni & Ogunjobi, 2017).

The poor state of employment, infrastructural development, high inflation, and mass poverty in Nigeria can be attributed to trade policy in the country. According to Ozurumba and Chigbu (2016), Nigeria needs to export for her economic survival and through trade, she can sell what she can produce and earn foreign exchange to finance the purchases of what she requires for her country's human development. She has to export because no country is self-sufficient which means that they have to buy from other countries those things they cannot produce and also acquire for her special skills that do not exist in her country but exist in some other country.

The Nigerian export sector has been a priority concern of the authorities since the late 1970s. However, in practice the appropriate policy measures to ensure long, sustained growth of the export sector were never applied. Important issues such as enhancing competitiveness and human resource development were never properly addressed. Exchange rates and financial policies did not stimulate higher investment in foreign trade. The general picture that remains today is characterized as follows:

The country's import expenditures are not covered by export earnings: while exports represent on average of 13% of GDP in the early 1990s, imports total 25% of the GDP (Monogbe and Achugbu, 2016),

The foreign market remains dominant both as the final consumer and as the first supplier of needed inputs for production; this makes Nigeria's export sector very vulnerable to foreign commercial policy and its economic situation (Monogbe and Okah, 2017).

However, the government of Nigeria has developed numerous policy measures to promote trade in the country and thereby trying to create the needed employment and sustained human growth in the country (Banjoko, Iwuji, and Bagshaw, 2012; Aminu, Raifu, and Oloyede, 2019). In the 1970s, the government established the export promotion board council to promote trade in the country and also gives tax relief to some indigenous companies operating in Nigeria. Following, the adoption of the Structural Adjustment Programme (SAP) in the 1980s, to increase the manufacturing sector export base in terms of value-added creation that could boost human development in Nigeria (Ekpo, 2014). It is disheartening that despite trade policy in Nigeria's economic growth and human development scheme, her trade performance over the years has been relatively poor and below expectation. The attempt at finding out the extent to which Nigerian trade policy has been effective in sustainable human development in Nigeria led Onayemi and Ishola (2009) into revealing that non-oil export has performed below expectations under the export promotion policy. This outcome supports the argument by Ivanov and Peleah (2010) that trade policy does not have any significant impact on the economic growth of low-income countries. This same result, however, contradicts Usman (2016) who discovered that an insignificant non-oil export and exchange rate would slow down human development given that non-oil export for the previous year positively affects human development. Monogbe (2016) examines the behavioural effect of the multinational operation and its performance on the Nigerian economy between the periods 1986 to 2014. Findings reveal that the operation of the foreigner informs of FDI has significantly stimulated economic growth in the long run in Nigeria.

Therefore, this study assesses the impacts of trade policy and sustainable human development using the Dynamic Autoregressive Distributive Lag (ARDL) Model, broad data set with, wider scope covering all the dimensions of trade policy and human development and accounting for some econometric issues ignored previously by prior studies. Over the past decade, Nigeria's trade policy has experienced several policy reforms expected to accelerate human development and economic growth through increased trade openness, exchange rate, and export and import rate which necessitates this study. Thus, the findings from this study would be of interest to policymakers and researchers seeking to comprehend the effect of trade policy and sustainable human development in Nigeria.

2. REVIEW OF RELATED LITERATURE

2.1 Theoretical Review

In this research, various theories explain the relationship between trade policy and sustainable human development. But we shall discuss a few of them, including Harrod-Domar's growth model theory, Solow-Swan neoclassical growth theory, the big push model theory, and Arthur Lewis growth theory. However, we shall anchor this research work on Solow-Swan neoclassical growth theory because it recognizes all items in the trade policy and human development.

Harrod–Domar's Growth Model

The Harrod-Domar models of economic growth are based on the experiences of advanced economic growth. They are primarily addressed to an advanced capitalist economy and attempt to analyze the requirements of steady growth in the economy (Volpe-Martincus, and Carballo, 2008). Harrod and Domar are interested in discovering the rate of income growth necessary for the smooth uninterrupted working of the economy. Though their models differ in detail, they arrive at similar conclusions.

Harrod and Domar assign a key role to investment in the process of economic growth, but they emphasize the dual character of investment. Firstly, it creates income and secondly, it augments the productive capacity of the economy by increasing its capital stock. The former may be regarded as the demand effect and the latter as the supply effect of investment. So long as the net investment is taking place, real income and output should expand at the same rate at which the productive capacity of the capital stock is expanding Otherwise any divergence between the two will lead to excess or idle capacity, thus for entrepreneurs to curtail their investment expenditures.

If full employment is to be maintained in the long run, net investment should expand continuously. This further requires continuous growth in real income at a rate sufficient enough to ensure full capacity use of the growing stock of capital. This required rate of income growth may be called the warranted rate of growth or the full capacity growth rate.

The model, therefore, assumes that:

There is an initial full employment level of income.

Government interference is absent.

These models operate in a closed economy that has no foreign trade.

There are no lags in adjustments between investment and the creation of productive capacity.

Solow-Swan Neoclassical Growth Theory

This is an economic theory that outlines how a steady economic growth rate results from a combination of three driving forces—labour, capital, and technology. The National Bureau of Economic Research names Robert Solow and Trevor Swan as having the credit for developing and introducing the model of long-run economic growth in 1956. The model first considered exogenous population increases to set the growth rate but, in 1957, Solow incorporated technology change into the model. The theory states that short-term equilibrium results from varying amounts of labour and capital in the production function. The theory also argues that technological change has a major influence on an economy, and economic growth cannot continue without technological advances.

Neoclassical growth theory outlines the three factors necessary for a growing economy. These are labour, capital, and technology. However, neoclassical growth theory clarifies that

temporary equilibrium is different from long-term equilibrium, which does not require any of these three factors.

Special Consideration

This growth theory posits that the accumulation of capital within an economy, and how people use that capital, is important for economic growth. Further, the relationship between the capital and labour of an economy determines its output. Finally, technology is thought to augment labour productivity and increase the output capabilities of labour.

Therefore, the production function of neoclassical growth theory is used to measure the growth and equilibrium of an economy. That function is Y = AF(K, L).

Y denotes an economy's gross domestic product (GDP)

K represents its share of capital

L describes the amount of unskilled labour in an economy

A represents a determinant level of technology

However, because of the relationship between labour and technology, an economy's production function is often rewritten as Y = F(K, AL).

Increasing any one of the inputs shows the effect on GDP and, therefore, the equilibrium of an economy. However, if the three factors of neoclassical growth theory are not all equal, the returns of both unskilled labour and capital on an economy diminish. These diminished returns imply that increases in these two inputs have exponentially decreasing returns while technology is boundless in its contribution to the growth and the resulting output it can produce (Todaro & Smith, 2011; Romer, 2012)

The Big Push Model

The big push model is a concept that emphasizes that a country's decision whether to embark on trade policy (export promotion) or not depends on its expectation of what other countries will do. It assumes economies of scale and an oligopolistic market structure and explains when the export promotion would happen. As Kpou (2014) puts it, the "Big push" theory was the originator of Paul Rosenstein-Rodan in 1943. The theory of the model emphasizes that underdeveloped countries require large amounts of investments to embark on the path of economic development from their present state of backwardness and proposed that a bit-by-bit investment programme will not impact the process of growth as much as is required for developing countries. Injections of small quantities of investments will merely lead to the wastage of resources. Paul Rosenstein-Rodan appropriately quotes Massachusett's institute of technology study in this regard, "There is a minimum level of resources" that must be devoted to a development programme if it is to have any chance of success.

According to Rosenstein-Rodan, there exist three indivisibilities in underdeveloped countries and this justifies the need for a big push. The indivisibilities are indivisibility in the production function, indivisibility in demand, and indivisibility in the supply of savings.

Arthur Lewis Growth

The Lewis two-sector model became the general theory of the development process in surpluslabour developing nations during most of the 1960s and early 1970s. The underdeveloped economy consists of two sectors in Lewis' model. They are the traditional overpopulated rural subsistence sector which is characterized by zero marginal labour productivity and a high productivity modern urban production sector into which labour from the subsistence sector is transferred.

The primary focus of the Lewis model is the process of labour transfer and the growth of output and employment in modern sectors. The labour transfer and the modern sector employment growth are brought about by output expansion and the rate at which this expansion occurs is determined by the human investment and capital accumulation in the modern sector. (Ayob & Freixanet, 2014).

2.2 Review of Empirical Literature

A good number of works have been done in the area of trade policy and sustainable human development in Nigeria. Probably due to the critical nature of trade policy and human development in Nigeria which includes that of Monogbe and Nduka (2016) empirically test run the contribution of the liberalized economic system through the inflow of foreign investment against the operation of the internal financial institution. The study intended to identify whether liberalization promotes economic development or whether the internal financial administration of the nation is capable of enhancing economic development in Nigeria. Time series data from the statistical bulletin was considered where foreign direct investment and trade openness was proxies for liberalization and aggregate bank loans and the interest rate was used as a proxy for financial development in Nigeria. The study reveals the existence of long-run association among employed variables after the time series employed became stationary after the first difference in the order of 1(1) integration. The report of the causality test established that liberalization could catalyze economic development in the long run while the operation of the internal financial institution is parasitic to economic advancement. Hence the study recommends that the Economic, political, and institutional environment should be well-stabilized to encourage more inflows of foreign capital.

Ozurumba and Chigbu (2016) econometrically examined the connection between export and industrialization development in Nigeria between the periods 1986 to 2015 using the autoregressive distributive lag mechanism. The study was extended to the area of liberalization as variables like trade openness; average tariff, exchange rate, and manufacturing export were considered. Findings reveal that all variables under investigation respond in a significant manner to net export except for openness and manufacturing capacity utilization which appear to be insignificant in stimulating manufacturing export. Within the context of the study, it was proof that countries practicing export promotion patterns of trade stand a chance of becoming more competitive and productive compared to countries strictly focusing on import substitution strategy. The study thereby recommends that Trade policies in the country must be reappraised, reviewed, and reinvigorated to maximize the gain from foreign trade. This could help boost our level of productivity and make the economy more competitive.

Monogbe (2016) examined the behavioural effect of the multinational operation and its performance on the Nigerian economy between the periods 1986 to 2014. The study employs the granger causality test, multiple regressions, and unit root test to ascertain the level of stationarity. Findings reveal that the operation of the foreigner informs of FDI has significantly stimulated economic growth in the long run in Nigeria. Hence, the study recommends that the political and economic environment should be normalized to encourage more foreign capital inflows.

Monogbe and Achugbu (2016) examine the dynamic effect of foreign capital inflow on the development of the Nigerian economy using time series data between the periods 1891 to 2014. The study employs an error correction model, Co-integration test, and granger causality test among others. Finding reveals that foreign capital inflow has statistically and significantly promoted economic development in the Nigerian context although the practical effect of its contribution is not been felt to a great extent. The study then concludes that financial discipline and moral tolerance such be embraced to achieve the motive of foreign inflows and hence promote economic development in Nigeria in the long run.

IIARD – International Institute of Academic Research and Development

Monogbe and Okah (2017) empirically integrated the interplay between import substitution and export promotion in the Nigerian economy in conjunction with the theoretical position of the protectionist and the free trade activist and how this has helped in promoting the Nigerian economy over the years. A disaggregate analysis of importation and exportation is conducted using a time series of data between the periods 1981 to 2016. A Series of econometric estimation tools were adopted in this study. Findings reveal that Non-oil export and Non-oil import seem to significantly promote economic integration in Nigeria. This report further gave in support to trade protectionist and trade liberalizes advocates. The result of the causality test shows that before any nation could attract foreign inflows, the economy must be in good form as a foreign investor only invests in an economy whose receiving capacity can sustain their investment. The study, therefore, concludes that before any nation could embrace liberalization, there must have been a level of threshold of industrial development in such a nation.

Innocent, Job, Okeke, and Aondo (2017) studied the relationship between human capital development and government expenditure with the ARDL model and found that a long-run relationship exists between HDI and GEXP; hence, the authors recommended that government spending should largely be focused on human development through specialized high technology – driven schools and efficient and effective facilities.

Aregbeshola (2017) using the generalized movement of analysis (GMM) tests the position of trade activists on the BRICS economy (four major emerging national economies: Brazil, Russia, India, and China). The protectionists advocated that local production should be developed and massive exportation of the local commodity should be embraced while the free trade activist opines that tolerating the multinational firm and importation will help in developing the less developed countries and also enhance inflows of capital and materials for development purposes. The study tends to test which of these strategies has helped these BRICS nations, the study employed a panel regression analysis and a generalized movement of analysis. The study first identified that before any nation could embrace liberalization, there must have been a level of threshold of industrial development in such a nation. Secondly, the study concludes that developing countries should follow the opinion of the protectionist by encouraging local production and exportation of local products in the long run while in the short run, liberalization should be encouraged as a percentage of this is needed for economic development before the nation could pick from their stage of development.

Eneje and Ikpo (2016) using multiple regression of the ordinary least square empirically examined 17 African countries focusing on the major determinant of diversification in Africa since it is seen as a catalyst to promote economic development in the long. Par capital income, human capital, investment, geographical location, and good governments were considered crux indicators of diversification. Finding reveals that all variables under investigation are significant drivers of export diversification while the term of trade and population react inversely to export diversification.

Sheng (2015) examined the phases of development in the china economy in the face of development strategy and trade reform. The study structured the stages of trade development in china into four different phases. The first phase started from the WTO agreement between the periods of 1980 to 1983 which was tagged import substitution and marginal export promotion. The second phase started around 1984 to 1990 which an export promotion was kicking out import substitution. The third stage is a combination of export promotion and liberalization strategy which gives room for the china economy to enjoy an inflow of technology and massive production of the commodity which was later exported to developing counties. The last phases of development took place from 1994 to 2001 which massively embrace radical liberalization which opened doors for the international inflow and outflow of

resources and materials. At present, the trading strategy driving the Chinese economy is targeted toward addressing and recovering from the global financial crises. The trading strategy adopted by the Chinese economy has helped in bailing her out and experiencing gradual recovery which has further promoted external demand in 2010 to date.

Kankesu (2000) opines that the mono-trade criterion approach is inefficient in driving an economy to a development gland. Their study reported that this is made impossible via four reasons which include all countries operative and leverage on her comparative cost advantage to envelope development, trade policies differ per country. Hence specializing in a single trading approach might not help in achieving the development plan of the state. Kankesu, in his study of import substitution verse export promotion, concluded that a single criterion strategy of import substitution is likely to reduce potential export and limited the domestic market where the industry is unlikely to reap the benefits of economies-of-scale.

Musibau (2006) empirically investigate the influence of trade policy integration on the export performance of selected ECOWAS states between the period 1980 and 2004 using the gravity model. The study reveals that if all ECOWAS member will comply with the trade agreement and adopt a reduced trade barrier strategy, export performance in the African region will be stimulated and consistent.

Jawaid and Abdul (2017) examined the contribution of international trade and human development in Pakistan using annual time series data from 1980 to 2013. The study contains five models in which human development with (a) total trade, (b) aggregate exports, (c) aggregate imports, (d) exports of primary commodities, semi-manufactured goods, and manufactured goods, and (e) imports of consumer goods, imports of capital goods, the industrial raw material of consumer goods and industrial raw material for capital goods is considered. The co-integration test was applied to check the long-run relationship between human development and trade. Sensitivity analysis confirms that initial results are robust. Causality analysis has also been done for the causal relationship between international trade and human development. It concludes that the unidirectional causality exists between HDI with TT and EXP. On the other hand, bidirectional causality exists between HDI and IMP.

Jawaid and Waheed (2017) examine the relationship between international trade and human development in Pakistan. The study examines for the first time the effect of aggregate and disaggregates trade on human development in Pakistan by using annual time series data from 1980 to 2013. This study contains five models in which human development with (a) total trade, (b) aggregate exports, (c) aggregate imports, (d) exports of primary commodities, semimanufactured goods, and manufactured goods, and (e) imports of consumer goods, imports of capital goods, the industrial raw material of consumer goods and industrial raw material for capital goods is considered. Co-integration test has been applied to check the long-run relationship between human development and trade. Sensitivity analysis confirms that initial results are robust. Causality analysis has also been done for the causal relationship between international trade and human development.

Davies and Quinlivan (2006) in a panel data analysis of the impact of trade on human development in the USA examined the impact of trade on countries' social developments as measured by the Human Development Index (HDI) – a composite measure of education, literacy, and income published by the United Nations Development Programme. Utilizing a generalized method of moments (GMM) procedure in a panel data framework, we find that increases in trade are positively associated with future increases in social welfare.

Mohammad and Fatema (2017) examine the effect of trade liberalization on human development in China which is the core focus of sustainable development goals (SDGs). It uses trade openness as a proxy to trade liberalization and the human development index (HDI) as well as its three sub-indexes namely education, health, and income as indicators of human development. The study focuses on emerging economies as the research sample considering

their significance in world trade and deals with a panel data set of 43 emerging countries from 1995 to 2014. Due to cross-sectional dependence in the data set Driscoll-Kraay estimator has been applied to the regression models. The effect of trade openness on HDI and its three sub-indexes is identified for all the emerging economies and their three subgroups such as EAGLE, NEST, and other emerging countries separately for the robustness of the analysis. The results of the study suggest that higher trade openness significantly progresses human development status in emerging economies in all aspects. Both human capital accumulation and per capita GDP has a positive impact on human development whereas the effect of GDP growth is negative. Religious and cultural factors show a mixed effect on human development in emerging economies.

Finally, based on the empirical review of the related literature above, it can be deduced that though much work has been done in the area of trade policy and sustainable human development in Nigeria virtually all the works arrive at similar results. Despite all the measures taken by the government to promote export and develop human capital, Nigeria is still depending on imported goods with deep undeveloped human capital. Whereas government believes that it has done much to bring human development through trade policy (export promotion).

This study intends to contribute to knowledge by providing a more detailed and all-inclusive study for a longer period and utilizing a modern analytical framework while taking care of some of the statistical issues past studies ignored which may have improved the reliability of their research findings. This study intends to cover and assist in reflecting on how government policies on trade and human development have impacted economic development. Thus this study will assist in reducing the existing knowledge gap, broaden knowledge transfer, and serves as a benchmark for further studies.

3. METHODOLOGY

3.1 Theoretical Framework

The endogenous growth model of Rebelo (1991) adapted by Pagano (1993), Saibu (2014), and Orji (2014) will serve as the starting point of the framework for this study. The AK model is one of the new development models which came into existence as a result of the unsatisfactory nature of the neoclassical growth models. The AK model, an endogenous growth model is chosen over any neo-classical model because it is closer to reality and provides the closest answer to the research question. Rebelo (1991) modelled output as a function of capital inflow and means of production. The AK model looks thus:

Where Y is the aggregate output, A is the total factor productivity and K is capital inflow. The model assumes excess labour supply, the productivity of capital constraints production, and that the rate of capital to be invested depends on intermediation, the long run economic growth rate of the AK model is:

$$g = A\left(\frac{l}{r}\right) - \delta = \emptyset s - \delta$$

Where g, is the growth rate of output

A, is the total means of productivity

 δ , is the rate of depreciation

 \emptyset , is the proportion of savings converted to investment and it is the efficiency of financial intermediation

S, is the savings rate

I, change in capital.

Note, this is a closed economy. Extending this model for an open economy, Saibu (2014) incorporated capital inflow and derived the steady state growth rate as:

- eqn 2

$$g^* = A^* \frac{I^*}{Y} - \delta = A^* \mathcal{O}^* \left(\frac{S + NCF}{Y}\right) - \delta = A^* \mathcal{O}^* (s + ncf)^* - \delta \qquad \text{eqn}(3)$$

Where NCF is net capital flow.

It is obvious here that net capital flow has a positive relationship with the growth rate of an economy, in the sense that, an increase in investment leads to an improvement in competitiveness. In addition to foreign direct investment, exchange rate policy also contributes to capital inflow, a trade policy that allows the free flow of capital goods that will affect the growth rate of the economy positively.

Orji (2014) translated equation 3 (which is the AK model in an open economy) into an empirical specification bringing in the exchange rate and other growth macroeconomic variables into the model to have:

 $\Delta Y_{t} = \alpha_{t} + \beta_{1i} \Delta Z_{it} + \beta_{2i} \Delta CF_{it} + \beta_{3i} \Delta EXR_{it} + \varepsilon_{t}$ (4)

Where $\Delta Yt = is$ the real output growth rate

Z = other growth conditioning variables which include fiscal and monetary policies which can cover the total factor productivity (A) in the AK model, CF is capital inflow variables and EXR is exchange rate dynamics.

Model Specification

Based on the above model and theoretical backing adopted from Nwodo and Asogwa (2017), we specify the model as follows:

HDI = F (EXCHR, TROP, IMP, EXP)

Econometrically equation (5) is transformed to be

$$HDI_t = \beta_0 + \beta_1 EXCHR_t + \beta_2 TROP_t + \beta_3 IMP_t + \beta_4 EXP_t + \mu_t$$
(6)
Where;

HDI = Human Development Index (Proxied with GNI per capita);

EXCHR = Exchange Rate (Proxied for Policy changes)

EXP = Export;

TROP = Trade openness (Proxied for Trade Policy formulation);

IMP = Import;

 $\beta 0 =$ intercept for the model;

 β = parameters of the explanatory variables in the model;

t = years; and

 μ = error term for the model

The Dynamic Autoregressive Distributive Lag (ARDL) Model can be specified as follow:

$$\Delta HDI_{t} = \beta_{0} + \beta_{1} HDI_{2t-1} + \beta_{2} EXCHR_{t-1} + \beta_{3} BOP_{t-1} + \beta_{4} IMP_{t-1} + \beta_{5} EXP_{t-1}$$

$$+\sum_{\substack{i=1\\q}}^{r} \alpha_{1} \Delta HDI_{2t-i}$$

$$+\sum_{\substack{j=0\\m=0}}^{q} \alpha_{2} \Delta EXCHR_{t-j} + \sum_{k=0}^{r} \alpha_{3} \Delta TROP_{t-k} + \sum_{l=0}^{s} \alpha_{4} \Delta IMP_{t-l}$$

$$+\sum_{\substack{m=0\\m=0}}^{u} \alpha_{5} \Delta EXP_{t-m} + \mu_{t}$$
(7)

By introducing the error correction mechanism, we then have a new model called the ECM model with ϕ representing the ECM coefficient. The ECM model is stated as follows:

(5)

$$\Delta HDI_{t} = \beta_{0} + \beta_{1}HDI_{2t-1} + \beta_{2}EXCHR_{t-1} + \beta_{3}TROP_{t-1} + \beta_{4}IMP_{t-1} + \beta_{5}EXP_{t-1} + \sum_{i=1}^{\rho} \alpha_{1}\Delta HDI_{2t-i} + \sum_{i=0}^{q} \alpha_{2}\Delta EXCHR_{t-j} + \sum_{k=0}^{r} \alpha_{3}\Delta TROP_{t-k} + \sum_{l=0}^{s} \alpha_{4}\Delta IMP_{t-l} + \sum_{m=0}^{u} \alpha_{5}\Delta EXP_{t-m} + \varphi ECM_{t-1} + \mu_{t}$$
(7)

The dynamic ARDL is employed in this study to measure the effect of Trade policy dynamics on the Human development index (HDI) in Nigeria. The dynamic ARDL model allows the estimation of the co-integration relationship between the dependent and the explanatory variables. It is also potent where there is mixed stationary among the variables of the study. The ARDL modelling approach has been recognized for its ability to address spurious regression as it makes up for missing variables using its lags (Maduka, et al., 2022).

Dynamic ARDL Simulation Graph

Using equation (7) above the dynamic ARDL simulation will also be derived. The Dynamic ARDL simulation approach was introduced by Jordan and Philip (2018) to estimate long-run and short-run coefficients. These simulated dynamic ARDL techniques are equally able to generate graphs to predict counterfactual changes among the respective predictive variables and their effect on the response variable while holding the rest of the predictive variables constant. As proposed by Jordan and Philip (2018), the dataset for the above method of necessity should be integrated of order one i.e. I (1), and with significant co-integration. This dynamic ARDL simulation is of interest in this study, and the method is feasible in this study since the dataset met the proposed conditions.

Diagnostic Tests

Pre- estimation Test

Stationarity/ Unit Root Test

A test of stationarity is very necessary for time series analysis. Therefore, to do this, the Phillip-Peron (Phillip and Peron, 1988) unit root test was employed and a confirmatory test was conducted using the Augment Dickey-Fuller (ADF).

Co-integration Test

To verify if a long-run relationship exists in the model, the study applied the use of the ARDL co-integration method. The test is otherwise known as the bound test. The bound test approach of the ARDL estimation technique makes use of Wald- statistics. The null hypothesis of no co-integration ($\lambda = 0$) will be tested against the alternative hypothesis of co-integration ($\lambda \neq 0$). The decision condition is that if the calculated F is greater than the critical value (upper bound), we will reject the null hypothesis. Alternatively, if the upper critical bound value is greater than the F statistics, then we would not reject the null hypothesis. If there is an establishment of co-integration, that means there is a long-run relationship in the model.

Post Estimation Tests

Specification Error Test

To find out if the chosen models can represent the main characteristics of interest of the data it is necessary to ensure that the model is free from specification error. Thus, this study employs the Ramsey RESET test.

Heteroscedasticity Test

The auto-regressive conditional heteroscedasticity test will be used to check for unequal variance problems, this is necessary to validate the uniformity in the data movement. The study will employ the ARCH and Breusch-Pangan-Geoffrey Heterescedasticity test.

Serial Correlation Test

One of the major challenges encountered in time series econometrics is the problem of serial independent of the errors of the model. To check for the problem of serial correlation in the model, the Breusch-Pagan LM test was conducted. The Breusch-Pagan LM for serial correlation tests the null hypothesis that the errors are serially independent against the alternative hypothesis that the errors are not serially independent.

Stability Test

Here we check if all the "inverse roots of the characteristic equation of the model are strictly inside the unit circle".

Justification of the Model

The Dynamic Autoregressive Distributed Lag Model (ARDL) is adopted for this study because of its wide usage by modern researchers now and partly because it yields valid results notwithstanding the order of integration of the underlying variables. Similarly, the ARDL model is an effective solution for spurious regression caused by missing or omitted variables (Maduka, et al., 2022; Engle and Granger, 1987; Yule, 1926; Simon, 1954). The method is also asymptotically efficient in small sample studies and when the regressors are endogenous (Saibu, 2014). Also, the long and short-run parameters of the ARDL model are estimated simultaneously and you do not need to be burdened with establishing the order of integration amongst the variables. Again, the ARDL bound testing approach to co-integration techniques is derived (Orji, 2014).

Sources of Data

All the data for the variables used in the study were sourced from the World Bank Development Indicator (WDI) and spans between 1981 and 2020.

Econometric Software

The E-view 9 and STATA 16 Econometric software were used for the analysis of this study. The E-views 9 is chosen because of its advanced nature and its specialized inbuilt ARDL estimator. Similarly, the STATA 16 software has proven effective in the estimation of the Dynamic ARDL Simulation, which is currently unavailable in E-views. Microsoft Excel 2013 was also used for data processing.

	GNI	EXCHR	EXP	IMP	TROP
Mean	2964.750	104.1426	18.89389	19.82086	32.13934
Median	2215.000	106.4643	20.16017	18.68938	33.87182
Maximum	5320.000	382.6110	36.02327	36.48173	53.27796
Minimum	760.0000	0.617708	5.249090	7.903450	9.135846
Std. Dev.	1463.268	108.6278	8.153449	8.064803	12.28639
Skewness	0.381985	1.091179	-0.033017	0.573250	-0.333323
Kurtosis	1.643312	3.515004	2.086702	2.394771	2.259988
Jarque-Bera Probability	4.040422 0.132628	8.379852 0.015147	1.397456 0.497217	2.801275 0.246440	1.653392 0.437492
Sum Sum Sq. Dev.	118590.0 83504998	4165.703 460200.1	755.7555 2592.670	792.8344 2536.601	1285.574 5887.261
Observations	40	40	40	40	40

3. ANALYSIS OF DATA, PRESENTATION AND DISCUSSION OF RESULTS 4.1 Descriptive Statistics

Source: Author's Computation (2022).

Table 4.1 above shows that Human Development Index (HDI) per capita in Nigeria witness reasonable improvement over the sample period. This is well understood when a comparison is made for the mean (2964.750), median (2215.000), maximum (5320.000), and minimum (760.0000) HDI. More precisely, the minimum HDI indicates that there was a period when the country's gross national income was 760 dollars and periods when it grew to 5320 dollars as revealed by the maximum HDI value. A look at the mean and median values in comparison to the maximum and minimum values shows reasonable growth but the growth did not follow a steady trend rather there was a period of negative growth as well as a period of positive growth. The descriptive statistics further reveal how the exchange rate of Nigeria grew from 0.617708 naira to 382.6110 against the dollar within the sample periods, as indicated by the minimum and maximum EXCHR. Similarly, comparing the mean EXCHR with the minimum and maximum EXCHR in Nigeria unravels the nature of changes in the EXCHR of the countries which do not follow a particular pattern but rather assume a volatile nomenclature. Furthermore, the trade variables which are export (EXP), import (IMP), and trade openness (TROP) also exhibited some level of changes which in reality and line with Nigeria's peculiarity. Thus, export growth is reasonable for the sample period but when viewed based on sectoral contributions to EXP in Nigeria, the true picture is unveiled with the growth tilting from agricultural and non-oil commodities to oil commodities in recent times. More so, the country's imports have been on the increase until recently when trade policies that lay more emphasis on consumption of locally made goods were introduced alongside the unfavourable EXCHR which have kept the prices of foreign-made goods increasingly on the high side. Trade openness is not left out either as the countries witnessed greater international trade relations with the rest of the countries of the world. Overall, the dataset is normal with export and trade openness showing negative skew whereas the rest of the variables are positively skewed.

4.2 Unit root Test							
Variable	ADF (constant only)		PP (constant only)				
	Level	First Difference	Level	First			
				Difference			
LHDI	0.1002	-8.2120***	-2.4822	-8.6258***			
LIMP	-2.2784	-7.3658***	-2.3725	-7.9081***			
LEXP	-2.2133	-8.1449***	-2.0920	-8.2133***			
LEXCHR	-2.0428	-5.3042***	-1.1702	-5.3042***			
LTROP	-1.9448	-7.3871***	-1.8562	-7.3730***			

NB: ***implies significant at both 1%.

Source: Author's Computation (2022).

The unit root test results which are used to ascertain the stationary status of the interest variables in this study are reported in table 4.2. The augmented dickey fuller (ADF) and Philip Peron (PP) unit root tests were adopted for the study at the 0.05 significant benchmark using constant only. The results show that for the ADF and PP tests that none of the variables is stationary at a level however; at the first difference all the variables are stationary even at the 0.01 level of significance. Thus, prompting the rejection of the null hypothesis that the variables have significant unit roots while the alternative hypothesis is accepted. By this result, the research is confident that the resulting regression estimates from the dataset will be robust and fit policy prescription and forecast since it satisfied the unit root condition.

Bound Test

Test Statistic	5% critica	al value	1% critical value		
F – Statistic	Lower Bound 1(0)	Upper Bound 1(1)	Lower Bound 1(0)	Upper Bound 1(1)	
7.045975***	2.86	4.01	3.74	5.06	

NB: ***implies significant at both 1%. **Source**: Author's Computation (2022).

The Bound test F test is presented in table 4.3 above. The bound F- test is used to check if a significant long-run relationship exists between the dependent and the explanatory variables. As indicated by the F-statistic value of 7.045975 which is greater than the upper and lower bounds at 0.05, there is significant co-integration in the model of this study. Although, more attention is given to the upper bound and not the lower bound. Thus, the study concludes that the long-run relationship is presently requiring the estimation ECM model that will correct for any disequilibrium which occurs in the short period, in the long-run relationship between the predicted and predictive variables is singular (Maduka, et al., 2022; Orji, et al., 2021; Pesaran, Shin and Smith, 2001). The Bound F-test has two distinguishing characteristics. For starters, when testing for the joint significance of the ARDL, it converts all of the model's variables into dependent variables, and it is heavily influenced by the number of lags it is subjected to (Maduka, et al., 2021 & Orji, et al., 2021). As a result, this study used a lag of two, with the optimum lag determined by the Akaike Information Criterion (AIC).

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Long Run and Short Run ECM results												
PANEL A: SHORT RUN				PANEL B: LONG RUN								
Variable	coefficient	Std Error	t-value	p-	variable	coet	fficient	Std E	Error	t-va	lue	p-
				value								value
Δ LHDI(-1)	-0.493012	0.142549	-3.458540	0.0038	LIMP	0.10	0.105120		0.242674		33174	0.6715
ΔLIMP	-0.487763	0.155348	-3.139815	0.0072	LEXP	1.78	1.789169 (0.469332 3		12161	0.0019
					LEXCH							
ΔLEXP	-0.850712	0.272233	-3.124947	0.0075	R	0.37	0.372627 (0.049853		74496	0.0000
ΔLEXCHR	0.215369	0.058342	3.691508	0.0024	LTROP	-2.3	-2.380953		0.674917		27769	0.0033
ΔLTROP	1.245581	0.381060	3.268724	0.0056	LIMP	0.105120		0.242674		0.433174		0.6715
ECM(-1)	-0.570803	0.142074	-4.017655	0.0013	С	9.240753		0.421894		21.903021		0.0000
Regression Statistics Diagnostic Test												
R ²	0.99	DW	2.18		B-G LM		0.5320		ARCH		0.2699	
S. E of	0.070432	F-stat	68.51***		B-P-G		0.2125		Ramsey		0.0135	
Regression												
-		-	-		Normality		0.8070				-	

Source: Author's Computation (2022).

The result of the ECM co-integrating equation in table 4.4 will be reported in this section and will be used to test the proposed hypothesis for the study. Here, the dependent variable is Human Development Index (LHDI) while export (LEXP), import (LIMP) and trade openness (TROP) are the measures of trade policies in Nigeria. In the first instance, the result reveals that the first lag of LHDI (-1) has a negative and significant impact on the current LGNI in Nigeria as suggested by the coefficient and probability values of -0.493012 and 0.0038. This is statistically significant at the 0.05 significant levels indicating that past LGNI deteriorates the current LHDI by -0.493012%.

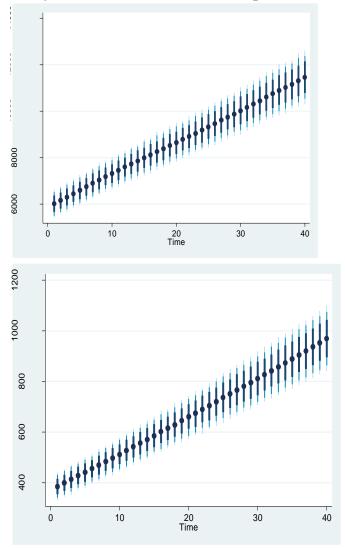
The short-run import (LIMP) according to the regression outcome has a negative impact on LHDI in Nigeria and this impact is statistically significant at the conventional significance level of 0.05. which implies that using the existing trade policy ceteris paribus every unit increase in import will deteriorate LHDI to the ton of -0.487763% as indicated by the coefficient value (-0.487763). But in the long run, the impact of LIMP on LHDI is positive and statistically insignificant. Thus, the null hypothesis may be accepted in the short run but rejected in the case of the long run. This outcome for both the short and long run is not surprising looking at the level of Nigeria's dependent on imports. The high reliance on imported goods has had negative impact on local or domestic output since the impact will normally cause a falling demand for domestic goods and further lead to income decline for domestic industries and ultimately result in unemployment. The long-run scenario though positive is insignificant and has much to say about the current trade policies which are killing the country's local output and reducing income per capita from the perspective of the firm's revenue due to falling demand and income of workers due to unemployment. Importation equally mounts pressure on foreign currency as importers will be on the lookout for the available foreign exchange to buy their products from abroad. Thus, any change in trade policy targeted at making imports favourable will not yield an instant positive result and that could be the possible reason for the long-run outcome. And in reality, there are trade policies currently introduced to curb the negative import of LIMP or on the economy, such as a ban on certain commodities which can be produced locally. Furthermore, the incidence of smuggling is also frustrating to a reasonable extent some of the policies so that quicker results are not realized (Okolo, et al., 2022).

Furthermore, export (LEXP) significantly deteriorates LHDI in Nigeria in the short run whereas, in the long run, it improves HDI. Thus, the null hypothesis is rejected in both the short and long run. As the short-run coefficient revealed a unit increase in LEXP will cause a decline in HDI in Nigeria by -0.850712% but in the long run, a unit change in LEXP will bring about a commensurate change in HDI in Nigeria by 0.372627%. This short-run and the long-run counterpart perfectly capture the happenings in Nigeria's trade policies as regard LEXP. In the first instance, the short-run result seems to expose the over-dominance of oil in the country's export sector while the nonoil commodities are given less priority over a long period. Not until recently did the country begin rolling out policies that encouraged the gradual revitalization of the nonoil sectors which have started to increase and improve on their commodities. This policy is obvious in the numerous agricultural incentives that have gradually impacted the sector and encouraged the increased production of export commodities. Thus, the possibility of increasing LHDI in the country with such a policy is recommendable and a significant outcome is expected in the long run according to the finding of the current study.

The short-run outcome for the LIMP and LEXP agreed with the findings of Adegboyo, et al. (2021) who reported that trade policies deteriorate economic growth. However, their report is in disagreement with the finding of the current study.

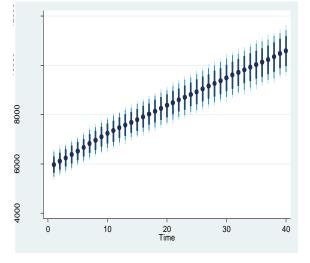
The short-run and long-run trade openness (LTROP) has a significant impact on HDI in Nigeria for the study period. However, while the case of the short run promotes HDI while the long run deteriorates it. By this outcome, we can reject the null hypothesis in the short and long run. Over the period, Nigeria no doubt has continued to gain global acceptance and exposure in terms of trade. However, the result of the study reveals that is growing openness to trade with the rest of the world benefited the economy in the short run but the long run scenario is harming the country's Human development index (HDI). Many factors such as FDI and exchange rate volatility as pointed to be the reason for this long-run scenario. Again, the openness of the economy to the rest of the world initially gave room to foreign expatriates which on the other hand harmed the domestic experts and further escalated the incidence of unemployment. Furthermore, the advance in LTROP created room for brain-drain in the face of rising urbanization and unemployment alongside the deteriorating educational system and this has continued to hold sway. Thus, the long-run outcome can be associated with the above situation in the country. The long-run outcome supports Fatima, et al. (2020) who found that an indirect relationship exists between LTROP and Human capita in developed and developing countries. Finally, the exchange rate (EXCHR) was found to promote HDI in Nigeria both in the short run and long run. Although this outcome surpass expectations as regards the Nigerian case where the LEXCHR is synonymous with volatility. Notwithstanding, the result is perfectly in line with a priori expectations in a normal economic condition.

The ECM result which is statistically significant and negative as expected suggests that any disequilibrium in the short run will be corrected in the long run. Furthermore, the coefficient ECM value of -0.570803 implies that 0.57% of the disequilibrium will be corrected in the next period. Similarly, -0.570803 indicate the speed of adjustment from short-run disequilibrium to long-run equilibrium and because this value is above average it connotes that the speed of convergence is reasonable and hence, suggests the absence of market failure in the economy as it relates to the sector. More so, the goodness of fit of the regression model (R2) is 0.99 which implies that 99% of the changes in the dependent variable are predicted by the model. The F-statistics (68.51) is significant and reveals that the explanatory variables have a joint significant impact on the dependent variable. The Durbin Watson statistic alongside the ARCH and Breusch-Geofrey LM statistics all have values within the range at which the null hypothesis that serial correlation exists in the model is rejected. Thus, there are no issues of serial correlation in the model of this study. Furthermore, the Breusch-Pagan-Geofrey (B-P-G) statistics show that the model has no issues of Heteroscedasticity, and finally, the model is normal as the JB test result suggests. The Ramsey test statistics are significant at the 0.05 level and imply that there are omitted variables however; the nature of the ARDL is such that issues like that are taken care of. This implies that the ARDL model is an effective solution for spurious regression caused by missing or omitted variables (Maduka, et al., 2022; Engle and Granger, 1987; Yule, 1926; Simon, 1954).



4.5 Dynamic ARDL Simulation Graphs

Figure 1 HDI and IMP



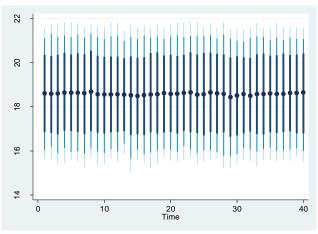


Figure 2 HDI and EXP

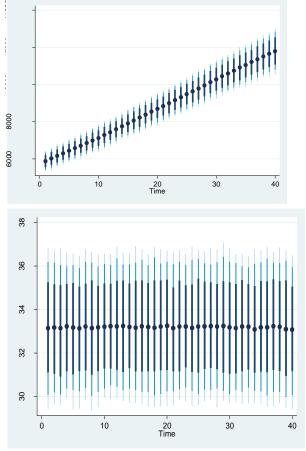


Figure 3 HDI and TROP

Note: that the dots represent the forecast value whereas the deep blue line extending to the light blue lines indicates the confidence intervals of 95%, 90%, and 75% respectively. The X-axis depicts the period in years and the Y-axis depicts the counterfactual changes in the respective explanatory variables based on ceteris paribus.

Figures 1, 2, and 3 are used to depict the effect of 10% positive and negative changes in export, import and trade openness respectively on the human development Index (GNI)per capita) in Nigeria. From the simulation, a 10% positive change in import (IMP) will cause a significant improvement in HDI while a 10% negative change in IMP will result in a similar change in

HDI in Nigeria both in the long run and short run all things being equal and with the exhibition of moderate shocks. However, the long-run scenario is more significant. Similarly, a 10% positive change in export (EXP) will have a significant impact on HDI in Nigeria with a moderate shock in the short and long runs whereas; a 10% negative change in EXP will have an insignificant impact on HDI both in the long run and short run. Furthermore, the impact of a 10% positive and negative change in trade openness (TROP) is similar to those of EXP in that the impact of a 10% positive change in TROP in the short run is not much significant as in the case of EXP. But the impact of a 10% negative change in TROP on HDI is statistically insignificant as shown by the simulation graph both in the short and long runs.

HYPOTHESES TESTING AND POLICY RELEVANCE

H1: Trade policy has no significant impact on sustainable human development in Nigeria.

The result reveals that trade policy has a negative and significant impact on the current LGNI in Nigeria as suggested by the coefficient and probability values of -0.493012 and 0.0038. This is statistically significant at the 0.05 significant levels indicating that past LGNI deteriorates the current LHDI by -0.493012%.

The short-run import (LIMP) according to the regression outcome has a negative impact on LHDI in Nigeria and this impact is statistically significant at the conventional significance level of 0.05. which implies that using the existing trade policy ceteris paribus every one unit increase in import will deteriorate LHDI to the ton of -0.487763% as indicated by the coefficient value (-0.487763). But in the long run, the impact of LIMP on LHDI is positive and statistically insignificant. Thus, the null hypothesis may be accepted in the short run but rejected in the case of the long run. This outcome for both the short and long run is not surprising looking at the level of Nigeria's dependent on imports. The high reliance on imported goods has had a negative impact on local or domestic output since the impact will normally cause a falling demand for domestic goods and further lead to income decline for domestic industries and ultimately result in unemployment. The long-run scenario though positive is insignificant and has much to say about the current trade policies which are killing the country's local output and reducing income per capita from the perspective of the firm's revenue due to falling demand and income of workers due to unemployment. Importation equally mounts pressure on foreign currency as importers will be on the lookout for the available foreign exchange to buy their products from abroad.

H2: Changes in trade policy have no significant effect on sustainable human development in Nigeria.

The result further revealed that changes in trade policy targeted at making LIMP favourable will not yield instance positive results and that could be the possible reason for the long-run outcome. And in reality, there are trade policies currently introduced to curb the negative import of LIMP on the economy such as our ban on certain commodities which can be produced locally. Furthermore, export (LEXP) significantly deteriorates LHDI in Nigeria in the short run whereas, in the long run, it improves HDI. Thus, the null hypothesis is rejected in both the short and long run. As the short-run coefficient revealed a unit increase in LEXP will cause a decline in HDI in Nigeria by -0.850712% but in the long run, a unit change in LEXP will bring about a commensurate change in HDI in Nigeria by 0.372627%. This short-run and the long-run counterpart perfectly capture the happenings in Nigeria's trade policies as regard LEXP. In the first instance, the short-run result seems to expose the over-dominance of oil in the country's export sector while the non-oil commodities are given less priority over a long period. Not until recently did the country begin rolling out policies that encouraged the gradual revitalization of the non-oil sectors which have started to increase and improve on their commodities. This

policy is obvious in the numerous agricultural incentives that have gradually impacted the sector and encouraged the increased production of export commodities. Thus, the possibility of increasing LHDI in the country with such a policy is recommendable, and a significant outcome is expected in the long run according to the finding of the current study.

H3: Trade policy formulation has no significant effect on sustainable human development in Nigeria.

The result of the study reveals the effect of 10% positive and negative changes in trade policy formulation (export, import, and trade openness respectively on the human development Index (GNI) per capita) in Nigeria. From the simulation, in figure 1 a 10% positive change in import (IMP) will cause a significant improvement in HDI while a 10% negative change in IMP will result in a similar change in HDI in Nigeria both in the long run and short run all things being equal and with the exhibition of moderate shocks. However, the long-run scenario is more significant. Similarly, a 10% positive change in export (EXP) will have a significant impact on HDI in Nigeria with a moderate shock in the short and long runs whereas; a 10% negative change in EXP will have an insignificant impact on HDI both in the long run and short run. Furthermore, the impact of a 10% positive and negative change in TROP in the short run is not much significant as in the case of EXP. But the impact of a 10% negative change in TROP on HDI is statistically insignificant as shown by the simulation graph both in the short and long runs.

4. CONCLUSION, AND RECOMMENDATIONS

This work examined the phases of trade policy and sustainable human development in Nigeria in the face of development strategy and trade reform. The dependent variable is Human Development Index (LHDI) while export (LEXP), import (LIMP) and trade openness (TROP) are the measures of trade policies in Nigeria. Furthermore, export (LEXP) significantly deteriorates LHDI in Nigeria in the short run whereas, in the long run, it improves HDI. This short-run and the long-run counterpart perfectly capture the happenings in Nigeria's trade policies as regard LEXP. The short-run and long-run trade openness (LTROP) has a significant impact on HDI in Nigeria for the study period. Finally, the exchange rate (EXCHR) was found to promote HDI in Nigeria both in the short run and long run. The co-integration test was applied to check the long-run relationship between human development and trade policy. Co-integration test has been applied to check the long-run relationship between human development and trade. Causality analysis has also been done for the causal relationship between international trade and human development.

It uses trade openness as a proxy to trade liberalization and GNI to human development index (HDI) as well as its three sub-indexes namely education, health, and income as indicators of human development. The results of the study suggest that higher trade openness significantly progresses human development status in emerging economies in all aspects. Whereas government believes that it has done much to bring human development through trade policy (export promotion).

In addition to foreign direct investment, exchange rate policy also contributes to capital inflow, a trade policy that allows the free flow of capital goods that will affect the growth rate of the economy positively.

Recommendations

Based on the findings of this study, it was recommended that:

1. Nigeria's trade policy must be designed within the general context of sustainable human development objectives and goals.

- 2. An effective trade policy directed at promoting industrial development would necessarily be situated within a strong and well-articulated industrial policy. Without first determining the overall goal of an economy and the specific role that trade policy would play in the overall scheme, trade policy would be reduced to mere stabilization measures, rather than playing its best suited role of promoting a country's sustainable human development in the medium to long run.
- 3. Nigerian government should focus more on long-term supply- side policies that will help to sustainable human development. Similarly, the use of quantitative restriction instruments appears misguided in that, apart from being against the multilateral trade agreements, its administrative cost is usually exorbitant. Trade policy is not a panacea for all economic ills and, even where its potency is high, different trade policy instruments and the ways they are structured should be objectively evaluated and carefully applied.
- 4. Finally, multilateral trade negotiations implicitly assume the existence of a coherent economic growth and development plan and or strategy at the national level; the role of the WTO and its members is, essentially, to ensure that multilateral trade rules and commitments help to promote the achievement of national economic goals. Consequently, only products which give Nigeria a global comparative advantage should be considered for liberalization at the multilateral level. Regional integration at ECOWAS and AU levels should be developed as a stepping stone to opening up the economy to global competition. In this way, the regional trade arrangement would serve as a voice to be reckoned with at the multilateral level, in addition to maintaining security and promoting good governance in the region. The Federal Government should consider the establishments of a council on trade consistency of agreements, but also ensure that national goals are not compromised in the process of trade negotiations. Coherent policies and particularly trade policy and different negotiations cannot be over emphasized.

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