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Government Expenditures, Economic Growth and Poverty Levels in Nigeria: A Disaggregated Approach

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Abstract

Purpose - This study uses the disaggregation approach to investigate how government spending affects economic growth and poverty levels in Nigeria. The study was anchored on the human capacity theory and two specific objectives were formulated to guide the study. Recent estimates indicate that 67.12% of the Nigerian population is living below one dollar per day. Nationally, 40.7 percent of Nigerians (89 million people) live below the poverty line, while another 25 percent (53 million) are vulnerable (World Bank,2024).

Design/methodology/approach - This study using secondary data, this study looks at how different sectors of government expenditures affected poverty and economic growth in Nigeria between 1991 and 2023. Short- and long-run relationships are evaluated using the Autoregressive Distributed Lag (ARDL) model, and nonlinear effects are examined using the Threshold Regression Approach. To determine the direction of causality, the study also employs the Granger Causality Test and the Error Correction Model.

Originality - The authors here by declare that no generative AI tools, including text-to-image generators and large language models (ChatGPT, COPILOT, etc.), were used in the creation or editing of manuscripts.

Findings and Discussion - reveal that while economic growth insignificantly reduces poverty in both the short and long run, government spending does not have a statistically significant impact on poverty in Nigeria. In the short run, recurrent expenditures on agriculture, health, and education negatively but insignificantly affect economic growth, while expenditures on debt servicing and road construction show a negligible positive effect. Poverty will decrease by 0.45 points in the short term and 0.96 points in the long term for every point increase in government spending at the 1% level of significance. The findings did not support the Keynesian theory or Wagner's Law in Nigeria, which found that government spending increases economic growth and it has ability in reducing poverty in an economy. The study concludes that the current economic trajectory in Nigeria cannot be sustained and recommends increased government allocations to priority sectors such as health, education, agriculture, and infrastructure.

Conclusion - Based on this finding, we can conclude that the type of government expenditure in Nigeria sectors on (Education, Agriculture and Health) have either been insufficient or have not

been effectively and efficiently allocated as its ability to reduce poverty is very low and insignificant. It concludes that the current economic trajectory cannot be sustained and recommends increased government allocations to priority sectors such as health, education, agriculture, and infrastructure.
Keywords - Economic Growth, Government Expenditure, Poverty level

Introduction

The period from the 1970s to the late 1990s is considered a dark period in Nigeria. This is because; it was marked by severe governance failures, macroeconomic imbalances, structural trade deficits, and infrastructure decay, all of which hindered Nigeria's growth prospects. Although, Nigeria, despite been one of the fastest-growing economies in Africa, poverty remains a persistent challenge. One of the main purposes of government spending is to provide infrastructural facilities and the maintenance of these facilities requires a substantial amount of spending. The relationship between government spending on public infrastructure and economic growth tends to be an important analysis in Nigeria, which have experienced increasing levels of public expenditure overtime.

Government spending is key to reducing poverty, especially when invested on projects that are pro-poor like education, health and agriculture. The government spending and its effects on poverty reduction and vice versa has been an issue of sustained interest for economists and policy makers. The relationship between government spending and poverty reduction has continued to generate series of debate among scholars, particularly, Nigeria one of the largest economy in Africa has been tagged the world capital of poverty, despite the huge government spending and high oil revenue. Generally, government performs two main functions-protection (security) and provisions of certain public goods, (Yusoff, Law, Norc, & Ismail, 2022).

Some scholars argued that increase in government spending on socio-economic and physical infrastructures encourages economic growth. For example, government spending on health and education raises the productivity of labour and increase the growth and of national output. Similarly, expenditure on infrastructure such as roads, communications, power etc. reduces production cost, increase private sector investment and profitability of firms, thus fostering economic growth. Supporting this view, scholars such as Abdullah (2010), and Ranjan Sharma (2010) concluded that expansion of government spending contributed positively to economic growth.

Statement of the Problem

Economic growth has not been directly contributing to poverty reduction in Nigeria. Ghosh & Gragorous, 2018; found that economic growth witnessed in the Asian countries drastically reduce poverty level in the continent. Few studies that relate to the government expenditure with poverty where either carried out outside Nigeria or were too narrow in scope (Akpan and Orok, 2019). Consequently, wide gap is created in literature as regards how the specific components of sound budgeting, discipline, transparency, accountability and reforms relate to and impact on the poverty reduction goal of government. Hence, this study attempts to examine the interaction among government expenditure, economic growth and poverty level in Nigeria by disaggregating total government

expenditure into its Agriculture, education health and technology components. A disaggregated approach matters in this study because it helped us to identify the component of government expenditure (education, healthcare, agriculture and infrastructure) have significant impact on poverty reduction and economic growth. This is essential for policymakers aiming to implement targeted and effective policies.

Objectives of the Study

The main objective of the study is to examine the relationship between government spending and economic growth and poverty level in Nigeria. The following specific objectives are: To establish the relationship between government agricultural spending on economic growth and poverty level. To investigates the relationship between government educational spending on economic growth and poverty level.

Literature Review

Concept of Government Expenditure

The very central driver for the economy of most developing economy especially, in sub-Saharan Africa is the expenditure by the various arms and levels of government sector. This is fundamental to any developing economy, even to most developed economies considering the proportion of government to gross spending in the economy. As such, it plays a crucial role in the Public sector spending is borne out of the imperativeness to generate revenue and expediency of expenditure spending in order for fiscal capacity, distribution and redistribution of scarce resources between the various levels of government. Also, the disposition of responsibilities between various tiers of government further indicates need for efficient and effectual spending culture. Broadly speaking, public financing affects aggregate resources use together with monetary and exchange rate. Specifically public financing refers to the value of goods and services provided through the public sector. Government spending can broadly be categorized into revenue and expenditure. The size of public expenditure and its components with respect its effect on economic growth, and vice versa, has been an issue of sustained interest for over decades now. The relationship between public expenditure and economic growth has continued to generate series of debate among scholars. Government performs two major functions - protection of lives and property (and security) and provisions of requisite public goods (Abdullah, 2020).

The position of Oyejide (2023) point of view is that public expenditure, whether recurrent or capital on social and economic infrastructure can be growth-enhancing. The provision of infrastructure services to meet the demands of business, households, and other users is one of the major challenges of economic development in developing countries like Nigeria. Developing countries invest about $200billion a year in new infrastructure representing four percent of their national output and a fifth of their total investment. The result has been a dramatic increase in infrastructure services - for transport, power, water, sanitation, telecommunications, and irrigation (World Bank, 2010). Government spending in Nigeria has continued to rise due to the huge receipts from production and sales of crude oil, and the increased demand for public (utilities) goods like

roads, communication, power, education and health. There is increasing need to provide both internal and external security for the people and the nation. Available statistics show that total public expenditure (capital and recurrent) and its components have continued to rise in the last three decades.

Concept of Economic Growth

Todaro (2017) defined the term economic growth as a process by which the productive capacity of the economy is increased over time to bring about raising level of national output and income. According to Guru and Yadav (2016), economic growth can be defined in two ways. In one way, economic growth is defined as sustained annual increases in an economy's real national income over a long period of time. In other words, economic growth means rising trend of net national product at constant prices. This definition has been criticized by some economists as inadequate and unsatisfactory. They argue that total national income may be increasing and yet the standard of living of the people may be falling. This can happen when the population is increasing at a faster rate than total national income.

Hence, the second and better way of defining economic growth is to do so in terms of per capita income. According to the second view of Guru and Yadav (2016) economic growth means the annual increase in real per capita income of a country over the long period. To Kessier (2012), economic growth occurs when a society becomes more productive and is able to produce more goods and services. The offering of new goods and services makes economic growth positive but when economic growth is negative for two quarters, we say we are in a recession. International Monetary Fund (2012) defined economic growth as the increase in the inflation adjusted market value of goods and services produced by an economy over time. Uwakaeme (2015) defined economic growth precisely and concisely to mean the positive and sustained increase in aggregate goods and services produced in an economy within a specified time period. In a wider sense, it involves the increase in the GDP, GNP and National income, therefore of the national wealth, including the production capacity expressed in both absolute and relative size, per capita, encompassing also the structural modification of the economy.

From the above definitions it is essential to understand that economic growth basically entails a long run process by which a nation's wealth increases. Economic growth is concerned with increase in the level and volume of production linked with large increase in the productive ability of the economy, which result in the reduction of poverty and unemployment in a country. For the purpose of this study, economic growth can therefore be seen as the annual increase or improvement in the real per capita income (real GDP per capita or output per person) of a country over a long period of time. This is measured using annual real GDP which is the monetary value of all final goods and services at market prices with year 2010 as the base year.

Concept of Poverty

Poverty is a multidimensional concept that seeks to measure levels of deprivation encountered by a person, household or community. Although most of the literature focuses on indicators of deprivation such as income, food, access to

housing and so on, the choice of indicators to measure levels of deprivation can often be arbitrary and hence may not reflect a full-scale measure of unmet basic needs in different social contexts, (Haller, 2022). This discrepancy leads to concepts such as poverty, social exclusion and vulnerability being used interchangeably in development discourse. While allowing for variations in indicators of unmet basic needs, poverty is generally considered to be a measure of deprivation of the basic needs that a person, household or community requires having a basic standard of living.

Income poverty measurements generally use the physiological deprivation model1 to assess lack of access to economic resources (income) to satisfy basic material needs. A person (or household) is considered poor if the person's (or household's) income cannot acquire the basket of goods and services used to define a threshold for poverty. The monetary value of the basket is the poverty line and the population of people and households whose incomes are below this line, is then derived through a head count. While this approach is the most currently used in household and poverty surveys, it is important to understand that its focus is exclusively on income and expenditure as surrogates for measuring access to goods and services.

Concerns about its limitations as a tool for assessing people's level of deprivation has led to definitions that consider other nonmonetary aspects such as human rights values enshrined in the UN Human Rights Charter, The UN Development Programme's Human Development Index has integrated more dimensions to the income/expenditure measures, notably life expectancy, educational attainment and a measure of income (GNI Index). Human development is defined as the process of enlarging people's freedoms and opportunities and improving their well-being

Relationship between government agricultural spending on economic growth and poverty level

The relationship between agriculture and economic growth is deeply interwoven, especially in developing countries where agriculture often constitutes a substantial portion of the economy. Agricultural productivity directly influences economic growth by generating employment, increasing incomes, and enhancing food security. Growth in agriculture boosts rural economies, stimulates demand for goods and services, and fosters linkages with other sectors such as manufacturing and services. Furthermore, improvements in agricultural efficiency and output can lead to surplus production, which supports export revenues and contributes to overall economic stability. By providing a foundation for sustained economic development, agriculture plays a crucial role in poverty alleviation, economic diversification, and the achievement of broader development goals (Wijerathna-Yapa & Pathirana, 2022).

Agricultural growth has a profound impact on poverty reduction, particularly in developing countries where a significant portion of the population relies on agriculture for their livelihoods. Increased agricultural productivity leads to higher farm incomes, improved food security, and lower food prices, which directly benefit poor households. As agricultural output expands, it creates employment opportunities both on and off the farm, stimulating rural economies

and reducing poverty. Moreover, agricultural growth can lead to better access to education and healthcare, as higher incomes enable families to invest in these essential services. By driving economic development from the ground up, agricultural growth serves as a powerful tool for alleviating poverty and fostering sustainable development (Irz, et al., 2001).

Relationship between government educational spending on economic growth and poverty level

According to Organisation for Economic Co-operation and Development, government expenditure on education covers expenditure on schools, universities and other public and private educational institutions (OECD, 2023). It includes instruction and ancillary services for students and families provided through educational institutions. UNESCO (2020) defines expenditure on education as expenditure on core educational goods and services, such as teaching staff, school buildings, or school books and teaching materials, and peripheral educational goods and services such as ancillary services, general administration and other activities. Expenditure on education can come from public source (i.e. all government ministries and agencies financing or supporting education programmes in the country), international source, and private source (e.g. households). Under UNESCO's National Education Accounts (NEA) framework, a country's education expenditure comes from three main sources: government or public sector, private sector (households and firms), and the] rest of the world (through grants and aid) (UNESCO 2016).

These funds may be used for different levels of education including pre-primary, primary, secondary, technical-vocational, tertiary, and non-formal. Educational expenditure includes current expenditures (such as teaching and nonteaching staff compensation, textbooks and other teaching materials, and other goods and services) and capital expenditures, (De Guzman, 2020). According to the World Bank (2019), expenditure on education includes all expenditures made, on the national territory, by all economic agents, central and local government, companies and households, for educational activities.

It comprises of recurrent and capital expenditure on education. Recurrent expenditure on education is the expenses borne to fulfil day to day services like salary to teachers and staff. Similarly capital expenditure on education is the expenditure incurred to do development work and it comprises of returns after the year of investment too. For the purpose of this study, education expenditure is defined as both the recurrent and capital expenditures incurred by the Federal Government of Nigeria in providing educational services to Nigerians measured in Naira.

Theoretical Framework

The study is anchored on the human capital theory and the endogenous growth theory. Human capital theory posits that, the source of divergence in economic performance and the rate of growth between countries is human capital. According to the human capital idea, acquiring more education and training in specific abilities can boost a person's capacity for production. Therefore, investments in education and training contribute to the accumulation of human

capital, which in turn enhances productivity and economic growth. In the context of Nigeria, increased government spending on education can lead to improvements in the quality and quantity of human capital, thus driving economic growth.

Endogenous growth theory on the other hand, emphasizes the role of factors such as human capital, innovation, and technology in driving economic growth. In the case of Nigeria, increased government expenditure on education can lead to the development of human capital, which in turn stimulates innovation and technological progress, ultimately fostering economic growth. Studies on the relationship between educational expenditure and economic growth consistently demonstrate that investing in education plays a crucial role in enhancing economic development. This is achieved by increasing individual efficiency, raising awareness of opportunities, imparting knowledge and skills, fostering research and development, improving living standards, and boosting participation rates in economic, social, and political activities.

Empirical Review

Owusu-Nantwi (2015) analyzed the relationship between education expenditures and economic growth in Ghana from 1970 to 2012, using vector error correction and cointegration analysis. The findings indicated a long-run positive and significant relationship between education spending and real GDP, gross capital formation, and labor force participation, suggesting that education significantly contributes to Ghana's long-term economic growth.

In Nigeria, Obi and Obi (2014) used time series data from 1981 to 2012 and found a positive relationship between education expenditure and economic growth, although a long-run relationship was absent due to labour market distortions and other issues such as brain drain. In Uganda growth generated in the informal sector was estimated at two third in 1980, Ghana it was 32.4% in 1982, in Nigeria at 20% in 1989. In developed countries like Australia, income generated in the informal sector was estimated at 10% of official GNP in 1978-1979; in Canada at 14%, USA at 14.3%, in the U.K at 7.5% in 1979. In Nigeria, the ratio stood at 49.7% in 1970, 32% in 1975, 8.6% in 2021 moved to 46% in 1985 dropped to 14.8% in 1990, it was 3.4% and 5.3% and 7.8% in 2005 and 2010 respectively, and settled to 4.2 in 2012 (ILO, 2020).

Methods, Data, and Analysis

This study employs Fosu's (2008) model as stated in Fosu (2010). According to the model, the rate at which poverty will reduce depends on the government spending and growth rate. This is because the reduction in poverty can be achieved from a given rate of growth if government spending;

$$Povt = \alpha 1 + \alpha 2Gro + \alpha 3\mathrm{GS}t + \alpha 4\mathrm{V} + \mu t \ldots\ldots\ldots\ldots\ldots (1)$$

where the endogenous variable is the poverty level, denoted by $Povt$. Relative poverty is the metric used to measure it. Economic growth in period t is represented by $Grot$. The Gini coefficient is used to measure government spending, or GSt. V is described as a vector of control factors that influence the growth-poverty nexus in Nigeria, while μt is error term. The only control variable taken into account in this study is human capital development, which is included due to its significance as stated in the literature. "Secondary school enrollment" was the

metric we used to gauge human capital. Based on this argument, V is defined as human capital development. Incorporating human capital into model 1, it becomes:

$$Povt = \beta + \beta 2Grot + \beta 3\mathrm{GS}t + \beta\ Humt + \mu t \ldots\ldots\ldots\ldots (2)$$

To determine the interactive effect of growth and government spending on poverty, we interact economic growth and government spending as a variable and incorporate it into equation (2). The equation then becomes:

$$Povt = \beta + \beta 2(Gro * \mathrm{GS})t + \beta 3Humt + \beta\ Gro + \beta 5\mathrm{GS}t + \mu t \ldots\ldots\ldots\ldots (3)$$

Equation (3) will be estimated using ARDL approach. The condition for using this technique is that there must not be a case of any variable that is stationary after second difference.

The ARDL model of equation (3) is expressed as follows:

$$\Delta Povt = \beta + \sum_{i=1}^{l} \beta 2\Delta Povt{-}i + \sum_{i=1}^{p} \beta 3\Delta(Gro * \mathrm{GS})t{-}i + \sum_{i=0}^{q} \Delta\beta\ Humt{-}i + \sum_{i=0}^{j} \beta 5\Delta Gro{-}i + \sum_{i=0}^{k} \beta 6\Delta \mathrm{GS}t{-}i + \varphi 1\ Povt{-}1 + \varphi 2(Gro * \mathrm{GS})t{-}1 + \varphi 3Humt + \varphi 4Gro + \varphi 5\mathrm{GS}t + \mu t \ldots\ldots\ldots (4)$$

With the exception of the Gini coefficient, all variables are given in logarithmic form. Equation (2) indicates that the coefficients of interest are $\beta 3$, β, and $\beta 5$. Apriori expectations state that $\beta 2$ should be negative, $\beta 3$ should be positive, and β should also be negative. The interaction term $\beta 3$ from equation (3) should have a negative apriori expectation. This is because it is anticipated that the detrimental effects of poverty will lessen as economic prosperity increases. The operator for the initial difference is Δ. The World Development Indicator (online version) is the source of data for every variable. Equation (4)'s long-run model will be calculated as follows:

$$Povt = \beta + \beta + \sum_{i=1}^{l} \beta 2\Delta Povt{-}i + \sum_{i=1}^{p} \beta 3\Delta(Gro * \mathrm{GS})t{-}i \quad i{=}1\ i{=}1\ q\ j + \sum_{i=0}^{q} \Delta\beta\ Humt{-}i + \sum_{i=0}^{j} \beta 5\Delta Gro{-}i \quad i{=}0\ i{=}0\ k + \sum_{i=0}^{k} \beta 6\Delta \mathrm{GS}t{-}i + \varphi 1 \ldots\ldots\ldots\ldots (5)$$

The second aim of the research is to determine the threshold amount of government spending that will lower the ability of economic growth to alleviate poverty and the threshold amount below which this ability will be effective. The study uses threshold regression, as suggested by Bai and Perron (1998, 2003), to accomplish this goal. This method's main benefit over all others is that it uses this approach objective to determine the threshold value. This suggests that the threshold value is determined by the data, not the researcher. The following is the threshold regression model: Equation (4)'s long-run model will be calculated as follows:

$$Povt = \beta + \vartheta 1Gro + \varepsilon t\ for\ \tau \leq \mathrm{GS}t < \tau$$

Where $Povertyt$ is the dependent variable, $Growtht$ is the independent variable, τ is the threshold value, government spending is the threshold variable, t is time and εt is the error term.

Results and Discussion

Recurrent government spending on health, education, and agriculture has negligible negative effects on Nigeria's GDP growth rate, according to the system equation that depicts the short-term effects. Economic expectations are not met by these results. But it has to do with Nigeria's low agricultural performance and poor human capital development. According to the short-run model, the only factor that had a substantial impact on the growth rate of the Nigerian economy was government capital expenditure on social services. The substantial impact shows that even a small improvement in this area can have a big influence on the economy, regardless of the reported negative effect.

An improvement in the levels of education and health positively affects the labor's productivity which can be relied upon to boost the economy. Government spending on other areas showed a negligible effect. Among other aspects, the data imply that government spending in these areas has either been insufficient or has not been distributed effectively. Nigeria continues to be a major importer of almost all food items, its educational system is constantly in poor condition, its health sector has received very little investment, its social infrastructure is inadequate and the ones that are available are not properly maintained, and its debt stock profile is still rising.

The study found out that, Nigeria's economic development is not significantly correlated with ongoing government spending on roads, building, public debt servicing, health, education, or agriculture. By implication, these expenditures have not impacted the Nigerian economy irrespective of the annual increase in budgetary allocation to these sectors. These study point to the inefficiency in government spending in Nigeria. The governments have also not paid enough attention to human capital development in Nigeria. This is revealed by the insignificant and negative effect of government expenditures on education and health. This is one of the reasons Nigeria has continually ranked poorly in the human development index over the years.

Table 1: Descriptive Statistics

Statistics	Pov	Growth	Govtspending	Hum
Mean	1.7371	0.4739	0.4419	1.4603
Median	1.7425	0.6009	0.4345	1.4451
Maximum	1.8254	1.5281	0.5600	1.6418
Minimum	1.6042	-0.3628	0.0531	0.1335
Std Dev.	0.0565	0.4476	0.0531	0.1151
Observations	38	38	38	38

Sources: Authors' computation (2025)

In achieving the objective of this study, we first estimate the descriptive statistics and the correlation matrix of all the considered variables. While the correlation matrix (see Table 2) illustrates the strength of the relationships between the variables, the descriptive statistics (see Table 1), which include the mean, median, minimum value, maximum value, and standard deviation, provide an overview of the data series. Since the mean and median values of the series fall between the minimum and maximum values, estimates imply that the series showed a high degree of consistency. Additionally, the mean value of 0.47%

indicates that the GDP growth rate was quite low during the study period. The average poverty growth rate is low, as seen by the mean poverty value of 1.73%. The standard deviation (SD), which measures how far a variable deviates from its mean, is very low for all the series; showing that the deviations of actual data from their mean values are very little.

Table 2: Correlation Matrix

Variable	Pov	Gro	GE	Hum
Pov	1.0000			
Gro	0.0708	1.0000		
GE	0.9070	-0.0948	1.0000	
Humcap	0.3722	0.3348	0.1825	1.0000

Source: Authors' Computation (2025)

The correlation matrix's outcome is displayed in Table 2. The purpose of the test is to discover the nature of the link between the variables as well as the extent of causality between them. This is crucial to prevent multicollinearity, which can occur when there is a high correlation between the explanatory factors. Table 2's findings demonstrate a direct correlation between poverty, the dependent variable, and all of the explanatory factors. Additionally, there is an indirect link between growth and government spending. There isn't a substantial correlation between the explanatory factors in terms of the degree of causality. However, the findings show that government expenditure and poverty are strongly correlated. Results of the degree of causation imply, my finding is free from the problem of multicollinearity as a weak correlation exists among the explanatory variables.

Table 3: Unit Root Test Result

	ADF Test			PP Test		
Variable	Levels	First difference	Remarks	levels	First difference	Remarks
Pov	-2.0380	-6.1807	I(1)	-2.0345	-6.1807	I(0)
Gro	-3.8744	-	I(0)	-3.8678	-	I(0)
Ineq	-2.4141	-3.0625	I(1)	-1.8184	-2.8038	I(1)
Hum	-2.9950	-critical	I(0)	-2.7704	-	I(0)
	1%	-3.6210	5%	-2.9434	10%	-2.6102
Values						

Source: Authors' Computation (2025)

Examining the variable of interest's stationarity property comes next. The data's variance and mean are not consistent throughout the study period, according to the non-stationarity. Estimates derived from such data will be spurious and be useless for making decisions. In an econometric analysis, the unit root test is employed to address the issue of non-stationarity. To check for the unit root in this study, we use the Philip Peron (PP) and Augmented Dickey-Fuller (ADF) approaches. Table 3 displays the findings. The table indicates that while

enrollment and growth are stagnant at levels, poverty and government spending are stationary at I(1). The results are presented in Table 3. From the table, it can be deduced that government expenditure and poverty are stationary at I(1), while enrolment and growth are stationary at levels. This result is consistent under the two techniques used. It further implies the mean and variance of all the variables are constant. Therefore, the estimates will not be spurious. As such, we conclude that there is a long-run relationship among the variables.

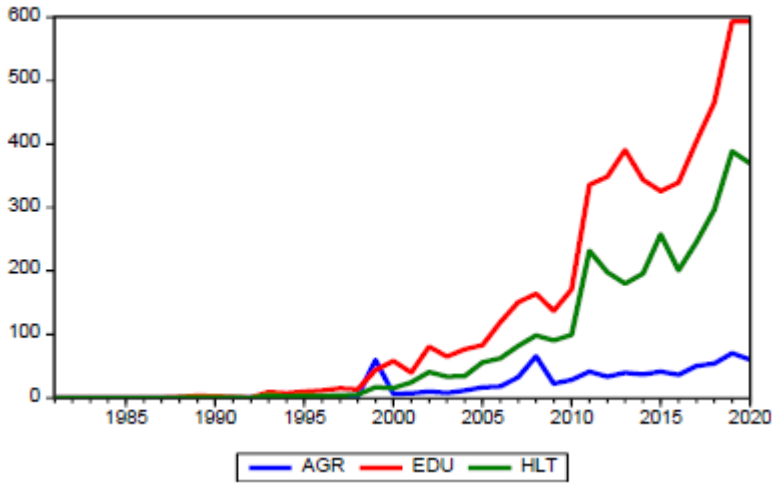
Table 4: ARDL Bound Test Result

Test Statistics	Value	K
F-statistics	6.3185	3
Critical value Bounds		
Significance	I(0)Bound	I(1) Bound
10%	2.72	3.77
5%	3.23	4.35
2.5%	3.69	4.89
1%	4.29	5.61

Source: Authors' computation (2025)

To determine the long-run relationship among the variables, the ARDL bound test approach is used. The result is presented in table 4. Results show that our F-statistic is greater than the lower and the upper bounds. This implies the null hypothesis of no co-integration is rejected at all levels of significance and the alternative hypothesis of the existence of a long-run relationship is accepted.

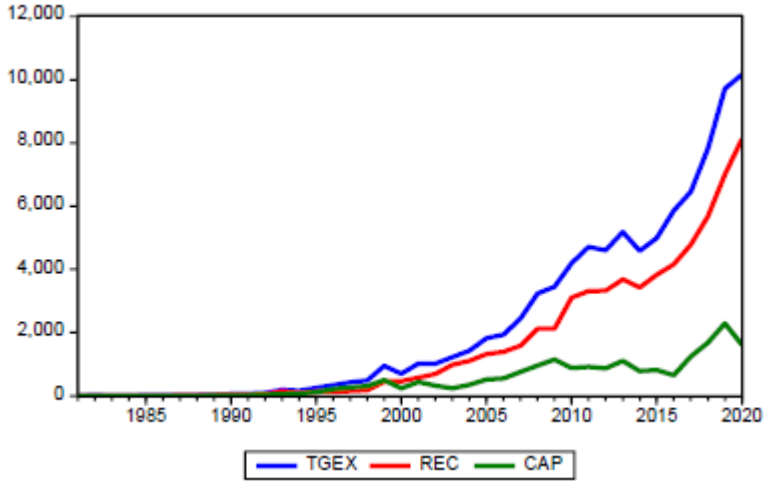
Figure 1: Cumulative Sum stability test on Agriculture, Education and Health



The Government Expenditure on Selected Sectors. The trend lines above show that, of the three sectors disaggregated on, the agricultural sector has received the least amount of financing, while the educational sector has received the most. In the 1960s and 1970s, more than 60% of Nigerians were employed in the agricultural sector, which also made a significant contribution to GDP and export earnings. But the finding of crude oil has made the agriculture industry

less important. Nigeria has been a major importer of almost all food goods because of the agriculture sector's poor performance. Government recurrent expenditures to health and education increased since 2000. . These, however, have fallen far short of the benchmarks for health and education, which are 15% and 26%, respectively. Starting in 2016–2017, allocations to the health and education sectors increased significantly, while spending on the agricultural sector only slightly rose. 2019 and 2020 see declines in these patterns as a result of lower government revenue.

Figure 2: Cumulative Sum of Squares stability test on Total Government Expenditure, Capital and Recurrent Expenditures



The figure above shows how poorly capital expenditures have been. Although politicians may assert that government capital expenditures have increased, there hasn't been any discernible improvement when comparing the pace of increase to recurring expenses or as a percentage of total spending. For instance, capital expenditures as a proportion of GDP fell progressively from 20.48 percent in 1980 to 6.27% in 1995, according to author [12]. It dropped from 5.23 percent in 2000 to a low of 0.30 percent between 1999 and 2010. it had fallen to a low of 0.30 %, from 5.23 % in 2000.

Additionally, to verify the validity or otherwise of the second hypothesis - that economic growth affects the poverty-reducing effect, we interact government expenditure and growth and examine the effect of this variable on poverty, both in the long-run and short-run periods. The result is presented under Model 2 of Table 5.

We found that the relationship term has a negative impact on poverty and this does not align with the theory, both in the short-run and long-run periods. In the short-run, the coefficient is small (0.02) and relatively big in the long-run (0.29). However, both are statistically insignificant. We can then conclude that for Nigeria, recurrent government expenditures on agriculture, education and health have insignificant adverse effects on the GDP growth rate.

Our final goal is to determine the value at which government spending in Nigeria will no longer be beneficial to the country's poverty-growth relationship. We use the threshold regression technique to accomplish this. Table 6 displays the

outcome. The threshold value is 0.46, according to the results. Growth will lessen poverty when government spending is below the threshold amount, and growth's capacity to reduce poverty will increase when government spending is more than and equal to the threshold amount.

Table 5: Threshold Regression Result

Variable	Coefficient	Probability
GE < 0.4607 - - 22 obs		
Growth	-0.0079	0.6847
0.4607 < = GE - - 16 obs		
Growth	0.0890	0.0063
Non-Threshold Variables		
C	1.7156	0.0000
R-squared	0.2399	
Adjusted R – squared	0.1964	
F – Statistic	5.5218	
Durbin-watson stat	0.3415	

Source Authors' Computation

Conclusion

The ARDL technique is used to confirm the type of government spending in Nigeria and determine whether it can lower poverty. This is due to the fact that the unit roots results display a combination of order one and levels. Table 5 displays the ARDL result under model 1. The findings show that government spending has a negative impact on poverty over the long and short periods As government spending on capital expenditures increases, economic growth increases, poverty is expected to reduce. This follows economic theory. However, the government spending (growth) coefficients for the short- and long-term periods are statistically insignificant and extremely low, at 0.2% and 0.5%, respectively. Both in the short and long run, government spending has negative effects on poverty. Poverty will decrease by 0.45 points in the short term and 0.96 points in the long term for every point increase in government spending at the 1% level of significance. The findings did not support the Keynesian theory or Wagner's Law in Nigeria, which found that government spending increases economic growth and it has an impact in reducing poverty in any economy. Based on this finding, we can conclude that the type of government expenditure in Nigeria sectors on (Education, Agriculture and Health) have either been insufficient or have not been effectively and efficiently allocated as its ability to reduce poverty is very low and insignificant. It concludes that the current economic trajectory cannot be sustained and recommends increased government allocations to priority sectors such as health, education, agriculture, and infrastructure.

Limitation

The government should allocate more resources to rural infrastructure, including roads, irrigation, and storage facilities, to enhance market access and reduce post-harvest losses. Additionally, expanding subsidies, credit access, and training programs for smallholder farmers can further boost agricultural productivity and rural incomes. To maximize the impact of education on economic growth and poverty reduction, the government should increase funding for educational facilities, teacher training, and technology-driven learning. Special attention should be given to ensuring equal access to education for marginalized groups, including low-income families and rural communities. The government should implement policies that bridge the gap between education and the labour market, ensuring that graduates acquire practical and in-demand skills. Collaboration between educational institutions and industries can enhance job opportunities, reduce unemployment, and drive sustainable economic growth.

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