NATIONAL DEBT AND ECONOMIC GROWTH: EVIDENCE FROM DEVELOPING COUNTRIES; NIGERIA

Ojomolade, Dele PhD[1], FCIB, Dr Isibor Oreghan[2] & Akinlabi, Jide PhD, ACA[3]

1, 2 & 3. Department of Accounting and Finance, Caleb University, Imota. Nigeria
dele.ojomolade@calebuniversity.edu.ng

Abstract

The study examines public debt and economic growth: evidence from developing countries; Nigeria for the period of 1985-2024, data were collected from Central Bank of Nigeria, World development indication and Nigeria bureau of statistic, 2025. The secondary data were analysed by descriptive statistics, autoregressive distributed lag, granger causality test and the results reveled adjusted R2 at 99.3% and R^2 is 99.8% with P-value of 0.000044, the bound test showed a long relationship between the variables and economic growth, there is bi-directional results from the granger causality test. It recommended that government forgo using external debt but concentrate on domestic debt to avoid huge impact of debt servicing.

Keywords: Developing countries, Domestic debt, Economic growth, External debt, Public debt

1. Introduction

Sustainable economic growth globally reflects government expenditures on infrastructures provision for the citizen standard of living. Understandably, the infrastructural developments were financed by internally generated fund or borrowed funds rather than imposing taxes to fill the financial gaps leading to public debt, [Owusu- et al and Erickson,2016; Hilton,2021].

Borrowing has protracted history of influence on macroeconomic key indicators, Domar,1944, Barro, 1980 cited in Osobase,2023. Inadequate tax collection and fiscal policies management affect the sustenance of macro-economic stability of the emerging economics. Supplementing government internal funds for upsurge in investment and dwindling in tax revenue for her capital formation externally is desirable as catalyst not beyond the threshold level, when circumvent tax increase in financing expenditures, [Eze,2019, constance,2022 and Uzuchukwu, 2022].

Empirically, no developing nations run surplus budget [Hilton,2021] so public debt is not a crime, but over accumulation cripple economic growth, [Ojomolade, et al 2022, Osobase, 2023]. Domestic finance inadequacy characterized developing nations, including Nigeria to finance investment and infrastructural developments, (Efuntade,2020). Debt repayment and high debt service subject developing nations to international macroeconomic risks, market shock and non -competitiveness (Eze, 2019).

The developing countries inclusive of Nigeria have been a subject of debate by experts and economic planners on the consequences of debt profile increase arising from budget deficit; macroeconomic challenges and human deprivation from inadequate tax collections (Alejandro & Ileana, 2017).

The debt level exposes the economy to external shock and debt overhang hypothesis (Peter & Ferdinand, 2016), which is blamed on low exports, high imports, exchange rate volatility, poor tax collection and capital flight [Ojomolade & Adejuwon, 2021].

Public debt is classified into domestic and external; productive or unproductive, if the borrowed fund is effectively utilised for productive investments, it will result in macroeconomic stability, growth increase and timely debt repayments.

Over the years; the colossal public debt increases did seem not yielding significant improvements in Nigerians socio-economic life; poverty and unemployment is ravaging the economy with galloping exchange and inflation rate on abated, (Matthew & Adetayo,2022, NBS,2022). This is calling for examination by researchers and economists on causal relationship between the public debt and its impact on Nigeria economic growth. [Sunday,2016] Empirical studies revealed their concern on the desirability of debt financing: Huang,et al (2018); Hilton, (2021); and Eze, (2019) and Efuntade et al (2020) support debt financing for economic growth while Hadji, (2022), Hilton,2021, Eze, (2019),Amaefule,(2018) and Ajayi and Adewusi,2020 says debt deterred economic development, and Anna and Koilo,(2018) Essien et al (2016) view insignificant or neutral position as to the effect of debt financing.

Attapattu [2018) gave reasons for developing countries borrowing either to finance higher investment or higher consumption in order to reduce the hardship of financial constraints. Accumulated public debt increases economic growth and decreases nominal interest rate and prices that could alter the economy structure, debt financing fast track economic development, reduce unemployment and poverty; supplement inadequate domestic capital stock requires for economic development, [Eze, 2019).

It is argued that inadequate capital formation, poor tax collection, crash in international crude oil prices, illicit financial flows with over consumption and dependent on exported goods are bane for financial gap despite the abundant natural and human resources at Nigeria disposal, (Obi, 2014; Ojomolade and Adejuwon,2019; and Hilton, 2022).

There are lot of empirical on public debt and economic growth, in that mood this study hypothesis begins to establish if public debt enhanced economic growth of the developing nations? As to whether the level of public debt is governed by GDP of the country, [Hilton,2021; Saungweme & Odhiambo,2019]. Is excessive public debt detrimental to economic growth forming sluggishness? Has it empirically revealed that high level of public debt crowd out private investment through high cost of capital formation. [Kobayashi & Shirai,2017)] there is relationship between public debt and economic growth in the developing nations. The causal relationship between pubic debt financing and economic growth GDP is basic to a country [Donayre & Taivan, 2017; Hilton,2021]

The concern of economists and political observers are to known whether public debt leads to economic growth or otherwise, therefore, this study is to examine public debt on Nigeria economic growth.

The first most notable Nigeria public debt occurred in 1988, at ₦ 180.99 billion, which astronomically jumped into ₦ 6,260.63 billion in 2004, and reduced from ₦2, 695.07 billion to ₦451.5 billion with 83 % increase between 2005 and 2006, however, the domestic moved to ₦11,058.2b and N18,378.96b in 2016 and 2019 respectively, while the total debt at 2022 stood at ₦ 462,503.72 exceeding the 2019 level of ₦274,013.8 billion by 68.79% ,(CBN,2020, DMO, 2022). Nigeria external debt stood at ₦328.5 billion in 1991. It increases to ₦ 648.81 billion and ₦4890.3billion between 1994 and 2004 respectively; dipping to ₦ 438.89 in 2007. It subsequently moved to ₦1026.90 in 2012 and further to ₦ 9022.42 billion in 2019, a ratio of 16.2% of the gross domestic product (GDP) ratio of the country.

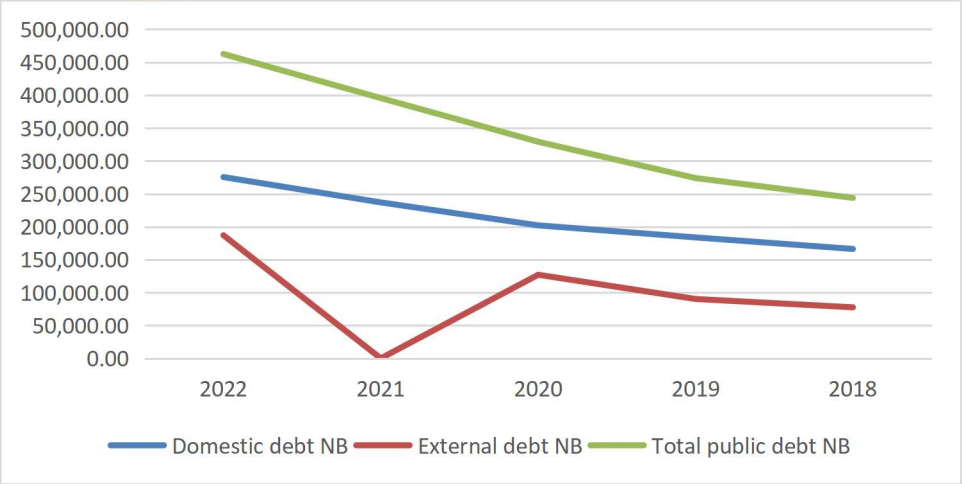


Fig. 1 **Nigeria public debt trends, 2018-2022 (domestic, external and total debt)** in Nigeria currency

Trends of debt servicing in naira currency

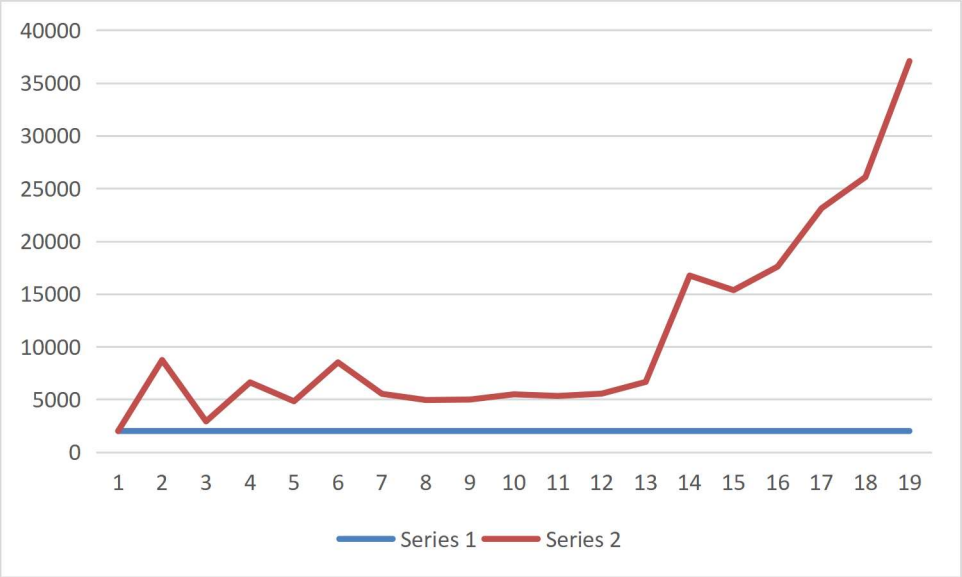


Fig 2

The Fig 2 depicts the debt servicing in Nigeria. At 2005 the debt servicing was zero due to debt forgiveness. The debt servicing reached it pick in 2013 at N 35,035.1b. it is noticed that between 2011 and 2016 the debt servicing are relatively in the rage of N2965-N3530.9B. Thereafter, it increases, thereby affecting national budget. Implications; it reduces government spending; leading to budget deficit and crowding-out private investments.

The main reason for debt borrowing is to promote economic growth as it relates to infrastructure, investment and social welfare development which are priorities of a nation.

Historically, Ghana has no public debt profile until 1957 compared with Nigeria due global economic recessions and debt crises. In 1954, Ghana has budget surplus of nearly 14.5% of GDP; nevertheless, in 1965 a deficit budget of 6.4% of GDP. In 1957

her public expenditure was 9,5% rising to 25.8% in 1965 leading to 25.16% public debt of her GDP

The National Liberation Council of Ghana after defeating the Convention People's Party in 1966 required from the International Monetary Fund (IMF) (CPP) stabilization support, the public debt stock declined to 16.47% of GDP by 1975. In 1994 the public debt stood at 103% of GDP from the position of 27.5% in 1984, subsequent settled at 182% of GDP in 2000 with 3.7% resultant growth rate. Ghana was branded in 2001 as poorly indebted country in process of written off her debts by IMF and World bank due to high public debt stock in 2000 (World bank 2004). Ghana public debt stock reduced to 32% in 2008 from 182% in 2000 thereby, moved lower-middle-income economy. The Ghana public debt again climbed up to 57.2 % of GDP in 2016 from the level of 26.2 % of GDP in 2006 reaching the position of 63% of GDP in 2019 in order to finance public expenditures. The increase in debt can be ascribed to poor monetary police, cedi depreciation and financial sector cleaning. (BOG 2020, Amponsah,2015). Ghana public debt 2019-2021

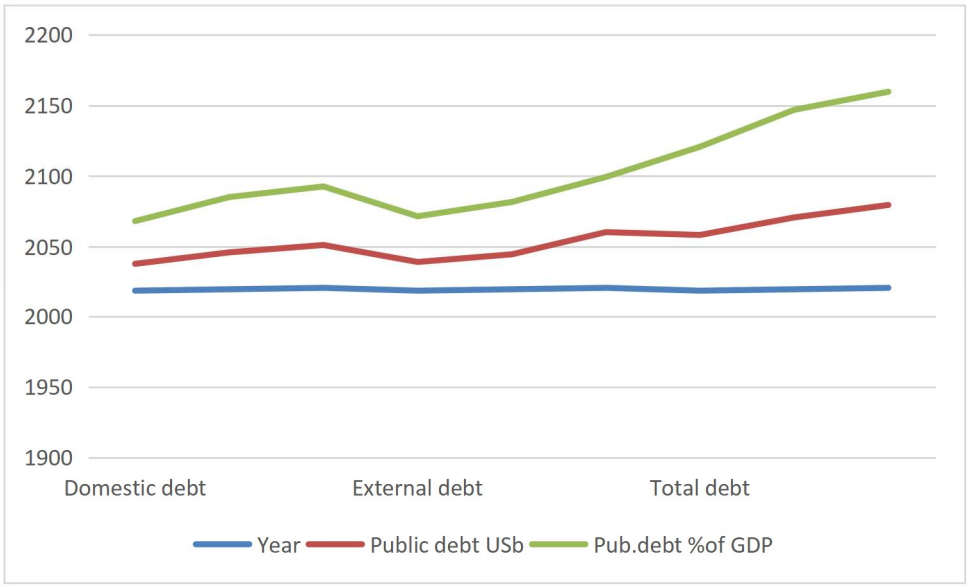
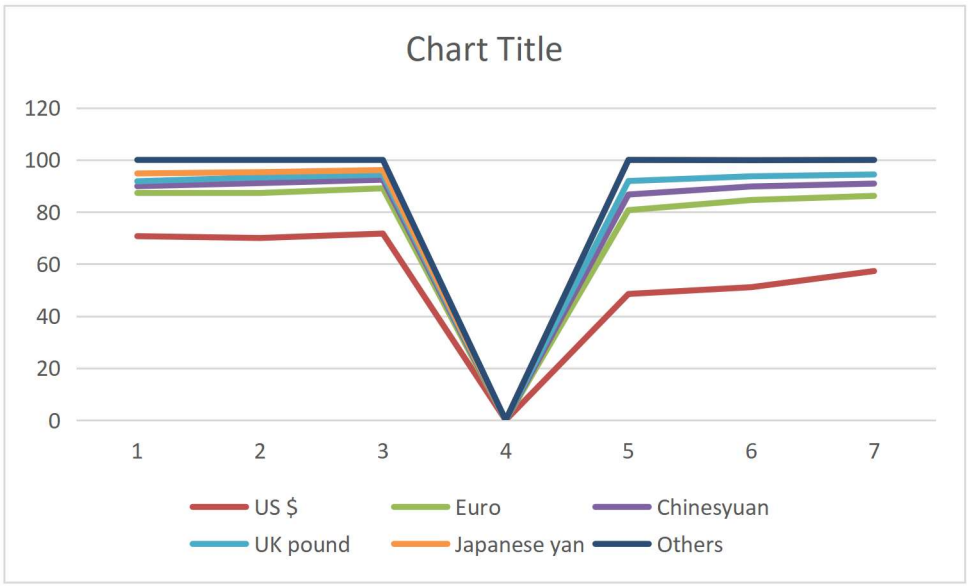


Fig 3 Trends of domestic, external and total debt of Ghana in US$ currency

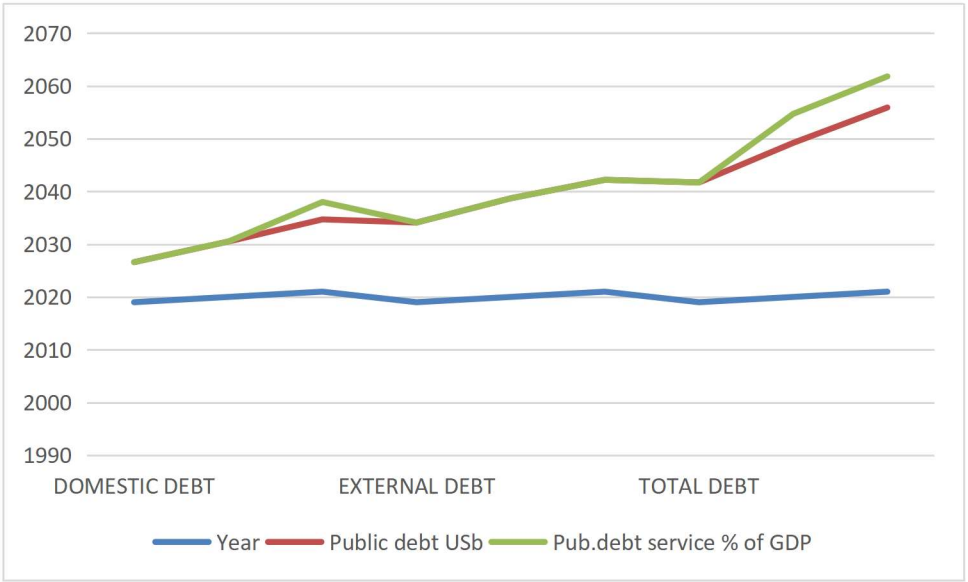
Ghana external debt is predominantly USA dollar dominated The public debt is shared among commercial creditors [57] as of 2022, and about 80% of it belong to Eurobonds [MOF, 2022b]

Ghana: Composition of external debt Ivorian public debt.



The Ivorian government experienced public debt in financing her expenditure. The pandemic (COVID-19) in 2019 drove Ivorian public expenditure from 17.3 % of GDP in 2019 to 20.6 % in 2020 of the GDP in the absence any increase in the government incomes. The fiscal deficit moved to 5.6% of the GDP in 2020 compare to 2.3% of GDP in 2019 due to the pandemic The government increases her borrowing by 9 PR to 47.6% of the GDP in 2020 to meet the financial gap, and surpassed 50 % of GDP by 2021. Ivorian total public debt has been dominated by external financing since 2017, though, by projection a rising importance of domestic borrowing and gradual declining trend in external debt. The domestic debt increase is largely driven by issuance of public securities in the WAEMU market [MBPE,2022].

Ivorian public debt profile



Source: ODI emerging analysis,2024

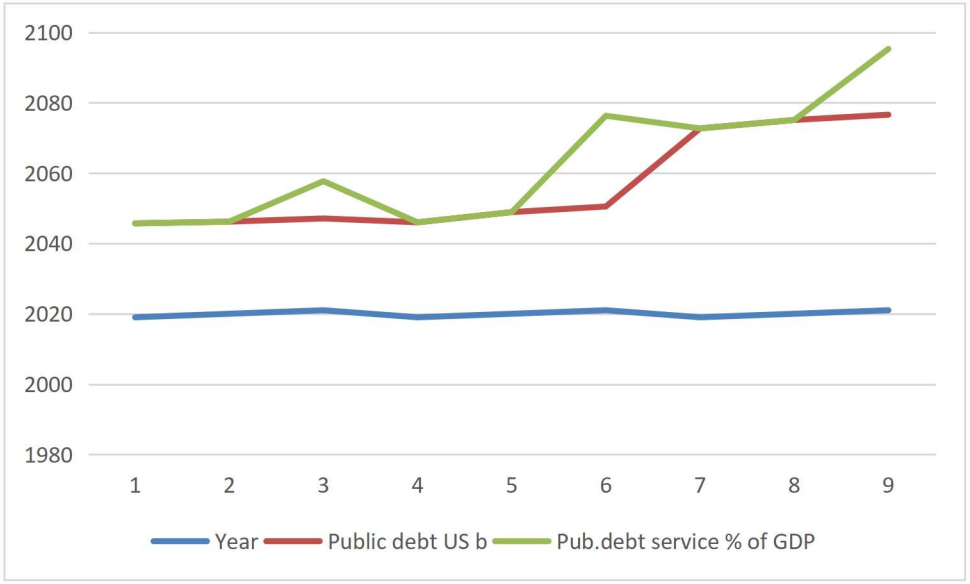
Trends of domestic, external and total debt in currency of EURO

Ivorian external debt is predominantly subjected into euro, supported by government strategy to reduce the exposure of public debt to exchange risk given that the CFA franc is pegged to the euro. The domestic debt is government securities [bills and bonds] and with one to ten years' medium term maturity period.

Ethiopia public debt

In the last two decades the substantial public infrastructure and investment was built up the Ethiopia domestic and external debt. The external borrowing boosted from $7.3b in 2010 to over $29.5b in 2021 [MOF,2022a]. Ethiopia total debt stock in 2022 stood at $56.5b [53% of GDP]. The debt is divided almost equal between domestic and external. There is evidence that external debt declined nearly by $1b in 2021/22 while local borrowing increased by $1.4b.

The government of Ethiopia is threatening by high debt distress risk presently, showing high levels of debt relative to exports, while negotiating for debt relief under the "G2O Common Framework"



Trends of domestic, external and total debt in currency of US$

2 Literature and Conceptual Review

Public debt is the total amount owed by the tiers of government in Nigeria to finance public deficits arising from larger level of expenditures. It may be owed to individuals, corporations or institutions. It is a liability to the government but an asset to the lenders. Public debt comprises of external and domestic, the total debt of Nigeria stood at N121.67 trillion (us$91.46 billion) in Q1 2024 from N97.34 trillion (us$ 108.23 billion) in q4 2023 representing 24.99% growth rate on quarter on quarter basis, (CBN 2024). Public debt is one of the fundamental indicators of the macroeconomic variables imaging country's in the international markets, (Eze 2019). Christabell (2013) postulate that judicious used of borrowed fund enhances economic growth, development and stability if attracts low cost with limited financial risk exposure. Public debt is classified as to federal and states which

described total debts for financing public expenditures instead of taxation, an alternative option for creating money (Eze,2019, Nassir and Wani 2016) and provoke economic development, [Udeh,2016].

External debt

External debt can be designated as loans owing to external bodies, (such as Paris club, London club, IMF and unclassified borrowings) to finance domestic expenditures by a government (CBN, 2022). According to Ikwuo et al, (2024), foreign debt arose from different ways: private investment, owing to contractors, suppliers and others.

According to Eze [2019], the principal reasons for the mounting public debt in developing countries are to support capital formation to finance investment and supplement private investment (Isaac and Rosa, 2016), which may subsequently result in high interest payment and debt default.

Domestic borrowing. These are debts sourced locally through treasure certificate or treasure bills which form part of the public debt to finance government expenditures. Public debt impacted positively on economic growth (Krugman,1988; Ebarhardt and Presbitero,2015; Ewaida,2017; Huang et al,2018] also reported that public debt has an opposite causal relationship with the economic growth ,Ahlborn & Schweickert,2016].

Economic growth.

[Mladen 2015] postulate, economic growth signifies more output in production and services whereas, development denotes both additional output and changes in technical and institutional management by which the output and services are produced and distributed. Growth denotes increase in the national output or gross domestic product (GDP) of a country. Growth is achieved whenever a unit of production is added into the economic successfully, (Ajayi & Adewusi,2020)

Debt servicing: debt servicing is the total interest payment a country mad on borrowed fund, (Akwuo et al 2024 and Ufoma,2017). Whenever a country employs all her revenue to settle interest payment after raising fund by introducing new tax or other form of levies, it signifies the economic agents are not generating enough revenue to put the country in a positive economic position. The servicing payments impact negatively on the citizen welfare by affecting the government budget estimate.

2.2. Theoretical Review:

The paper is anchor on Harrod-Domar theory of growth model (two- edge theory) of capital accumulation and investment of 1944. Harrod-domar model is an extension of Keynesian full employment and income theory. Dual model of economic growth is known as Harrow –Domar model. Capital accumulation is considered fundamental to economic growth. It has been debated that capital accumulation double economic growth. Shortage of resources for evolving nations contribute fundamentally to inadequate level of domestic savings to facilitate sustainable investments. Foreign aids or borrowing was made in the context of dual model for lack of domestic saving. Lack of sustainability between foreign and domestic savings for growth is fundamental assumption for dual gap model. Nations borrow to finance expenditures for lack of sustainability that create shortfalls.

Debt overhang theory. theory of debt overhang (Krugman, 1980), and other empirical literatures that examine debt and economic development reported that external debt adversely economic growth. Debt overhang occurs when the present value of the expected income of a country is less than the accumulated debt, Udeh et al, 2016. In conjunction with debt over-hang model, debt crowding-out hypothesis, higher debt

service payments increased country's budget deficit, thereby reducing public savings. Deficit financing (domestic and external) increases interest rates, lower disposable income and higher wages, reducing private investments. It has been argued that developing countries with less debt burden achieve economic growth than countries with higher debt burden; primary stage of development suffers from inadequate funds compared with their counterparts in the developed economies (Eze, 2019). Public expenditures financed by debt do not pay off fully the negative effect of the crowding out of the private investment, resulting to decline in economy (Dorman, 1944 in Hilton, 2021).

Modern monetary theory

The Modern Monetary Theory (MMT) hypothesizes that public debt is basically money the government supply into the economy and did not tax back, Mosler, 1992. MMT supporters agreed that inflation is hypothetically resulted from expenditure outcome that cannot be boxed with policy discussion in the future if required. It is inaccurate to compare government budgets to that of an average household by MMT, Wray, 1998). MMT is a macroeconomic proposition which says national government can produce money as oppose to taxes or borrowing to fund public expenditure, built on the premise that government has the unlimited power to create money, Wray, 2015. The argument is that national government bank can continually fixed interest rates to support deficit financing at near or zero lower economic growth rates, [Driessen & Gravelle, 2019] The believe of monetarists is to fighting inflation through the adjustment of money in circulation.

2.3 Empirical Review

The impact of public debts on economic growth in Nigeria for the period 1981-2017 was investigated by Eze, et al [2019] .Ex-post facto research design used, dataset obtained from the Central Bank of Nigeria (CBN) statistical bulletin, 2017 and data were analysed using multiple regression, ARDL model and Chow Breakpoint test. The results from the data analysed show that external debt impact negatively and significantly on GDP whereas domestic debt effect GDP negatively and insignificantly, government expenditure, positively and significantly impacted on GDP. National savings and consumer price index have a positive and insignificant effect on GDP. It also showed that public investment is impacted negatively and significantly by external debt. It is recommended that financing budget deficit in the economy by external debt and domestic debt should be suspend while internally generated revenue intensified through efficient investments and economic diversification. or reduce current expenditures to effectively finance capital investment projects in Nigeria.

Impact of foreign debt on Nigeria economic growth was estimated by Efuntade et al (2020) using ARDL-ECM to evaluate for the period of 38 years. The findings reveal positive association between foreign direct investment and external loan with Nigeria economic growth. Country with capacity to access external debt should be careful to avoid accumulating unnecessary heights of debt.

Ajayi and Edewusi (2020) investigate government debt consequence on economic growth of Nigeria. Time series dataset covering 1982-2018, a period of 39 years collected, the data was analysed and results revealed that external debt impacted negative influence on long and short run on the economic growth of Nigeria while

domestic debt exert positive long and short run on Nigeria economic growth. From the result, the government should adopt a policy towards a stable and viable debt management to grow the economy via domestic debt.

Hilton [2021] Dynamic multivariate autoregressive-distributed lag (ARDL)-based Granger-causality model was used to test the causal relationships between public debt and economic growth [GDP] of Ghana over time. Annual time-series spanning 1978–2018 were sourced from the World Bank Development Indicator database and IMF fiscal Affairs Department Database and WEO, 2021. Public debt has no causal relationship with GDP in the short-run but there is in the long run. unidirectional Granger causality running from public debt to GDP, again investment spending has a negative bi-directional causal relationship with GDP in the short-run but they have a positive bi-directional causal relationship in the long run. Equally, no short-run causal relationship exists between government consumption expenditure and GDP but long-run Granger causality runs from government consumption expenditure to GDP as public debt has a positive impact on the inflation rate in the short run.

The impact of government debt on economic growth of Nigeria was examined by Izuchukwu et al (2022) and ex-post facto research used, data was analysed using Ordinary Least Square. The outcome revealed that external debt impact positively on economic growth with significant relation on the gross domestic product. It is suggested that government should manage the debt skillfully to escape from debt deception in future and encourage using domestic debt and influence local production.

Examination was conducted on the relationship between foreign debt of Sierra- Leone and her economic growth by Hadji (2022) spanning over the years 1973-2021. Ordinary least square was used on the data collected from secondary source, the result reveals a negative association between economic development of Sierra-Leone and external debt. The line to economic growth is impacted negatively by expansion of debt. The nation should reconsider her debt management style to achieve sustainable public debt with robust method in the long run.

Methodology: This study used ex-post facto research design and dataset from secondary sourced, CBN statistical bulletin of 2024. The dataset was analysed using autoregressive distributed lag (ARDL) and causal relationship between public debt and Nigeria economic growth was tested by Ganger causality model and ECM. The co-integration among the regression variables was determined by ARDL Bound test. The Error Correction Model was used to determine the long run of Ganger causality. Study with small sample size should use ARDL and ECM as compare to Johansen co-integration model for large sample size. These models removed spurious correlation and enhance of general validity of the causality.

Model Specification: ΔY f (pds)

The relationship between public debts and Nigeria economic growth using linear econometrics model goes thus:

$\Delta Y = A_0 + A_1GDP + A_2EXDS + A_3DSERV + A_4INF + A_6DDS + Ur$

$LGDP = A_0 + A_1EXDS + A_2DSERV + A_{3l}NF + A_4DDS + Ur$

ΔY = Economic growth, GDP is proxy for ΔY = Gross domestic product,

EXDS = External debt. DDS = Domestic debt, INFR = Inflation rate, DDS = Debt services

UR= Error term

Priori Expectation

Theoretically, the study expects external debt, domestic debt to have a positive relationship with the economic growth while inflation rate and debt services to have a negative relationship with the economic growth in Nigeria.

4. **Results and Discussion of Findings**

Table 1 Descriptive Statistics

	LOGECDV_$B	INF_RATE	LOGDSER_NB	LOGDDS_NB	LOGEXDS_NB
Mean	2.228137	19.41132	3.389913	3.102590	3.083441
Median	2.286111	12.71500	3.357501	3.130286	2.904080
Maximum	2.759048	72.84000	4.544503	4.726385	4.582289
Minimum	1.643453	5.380000	0.000000	1.446382	1.238046
Std. Dev.	0.383430	17.20005	0.688237	0.873160	0.672910
Skewness	-0.150215	1.751906	-2.931200	-0.222844	-0.081058
Kurtosis	1.426237	4.863142	16.88013	2.121882	3.348021
Jarque-Bera	4.064398	24.93432	359.4572	1.535404	0.233384
Probability	0.131047	0.000004	0.000000	0.464078	0.889859
Sum	84.66921	737.6300	128.8167	117.8984	117.1708
Sum Sq. Dev.	5.439676	10946.14	17.52581	28.20908	16.75387
Observations	38	38	38	38	38

Source: Researcher's computation 2025

The average economic development stood at 2.228 which is lesser than the medium value of the economic development in Nigeria. The average mean of the inflation rate, domestic debt stock, debt services, and external debt stock stood at 19.411, 3.1025, 3.3899, and 3.0834 respectively while they are greater than the median values. The minimum values of the variables are less than that of the maximum values. The probability values for the variables are significance except economic development, except domestic and external debt. The Jarque-bera statistics indicates that none of the variables show a departure from normality, the variables are considered to have a normal distribution.

The result from table 2 is inferred, there is low correlation among the variables regressed. GDP correlation coefficient of 1.000 and other variables are -.365 (INF RATE), .332 (DSER), and .505(EXDS) are relatively below average except .88(DDS) which above .5, the absent of multi-collinearity may be presumed as correlation coefficient between slightly two of the variables are relatively small. We may say it good for estimate.

Table 2 CORRELATION

	LOGECDV_$B	INF_RATE	LOGDSER_NB	LOGDDS_NB	LOGEXDS_NB
LOGECDV_$B	1.000000	-0.365454	0.332362	0.887072	0.505400
INF_RATE	-0.365454	1.000000	-0.053500	-0.311526	-0.146223
LOGDSER_NB	0.332362	-0.053500	1.000000	0.390313	0.296047
LOGDDS_NB	0.887072	-0.311526	0.390313	1.000000	0.811219
LOGEXDS_NB	0.505400	-0.146223	0.296047	0.811219	1.000000

Source: Researcher's computation 2025

TABLE 3 ARDL Long Run Form and Bounds Test

Variable	Coefficient	Std. Error	t-Statistic	Prob.

* p-value incompatible with t-Bounds distribution.

Levels Equation
Case 5: Unrestricted Constant and Unrestricted Trend

Variable	Coefficient	Std. Error	t-Statistic	Prob.
INF_RATE	0.004680	0.000761	6.146928	0.0005
LOGDSER_NB	0.231285	0.148034	1.562380	0.1622
LOGDDS_NB	0.567888	0.106787	5.317968	0.0011
LOGEXDS_NB	-0.351142	0.030914	-11.35881	0.0000

EC = LOGECDV_$B - (0.0047*INF_RATE + 0.2313*LOGDSER_NB +
0.5679*LOGDDS_NB -0.3511*LOGEXDS_NB)

F-Bounds Test — Null Hypothesis: No levels relationship

Test Statistic	Value	Signif.	I(0)	I(1)
			Asymptotic: n=1000	
F-statistic	16.64471	10%	3.03	4.06
K	4	5%	3.47	4.57

From table 3, the results revealed a long run relationship among the variables as the value of the f-statistics, 16.6447 of the bound test is greater than the upper and lower bound at 5% level of significance. This shows that there is co-integration among the variables. Thus, the null hypothesis of long run relationship is accepted and alternative of no long run relationship was rejected.

The p-value for the prob. (f-statistic) is 0.000044 which is less than .05 at 0.05% significance level, we reject the null hypothesis and conclude that the estimated model is statistically significance. The coefficient of determination which is the adjusted R-squared is 99.3 % and R-squared 99.8 % which indicates the independent variables considered and the remaining variation captured by error term, therefore, we conclude that our estimated model is a good fit and reliable for policy making.

The Durbin-Watson is 2.65 which is greater than 0.05 and falls within the acceptable value.

ARDL Stability Test

Ramsey RESET Test

	Value	Df	Probability
t-statistic	0.443591	7	0.6707
F-statistic	0.196773	(1, 7)	0.6707

FIG.1

In order to test for serial correlation, the Breusch- Godfrey LM test was employed and it thus suggests that there is no serial correlation in the residual of the model. Since the null hypothesis of serial correlation is not rejected because the probability value 0.000 of the F statistics is less than 5% level of significance. Heteroskedasticity problem was absent since the null hypothesis of no heteroscedasticity was rejected because the probability value was 0.4 .

The results from table 4 asserted that economic growth is significant at .05 and granger inflation rate while inflation rate is not significant .it did not granger economic development. Debt servicing and economic development are not significant and did not granger each other. Domestic debts and economic development are not significant and granger. external debt and economic development are not significant and not granger.

Table 4 Granger Causality test

Null Hypothesis:	Obs	F-Statistic	Prob.
INF_RATE does not Granger Cause LOGECDV_$B	34	1.31618	0.2837
LOGECDV_$B does not Granger Cause INF_RATE		2.98225	0.0664
LOGDSER_NB does not Granger Cause LOGECDV_$B	34	0.11140	0.8950
LOGECDV_$B does not Granger Cause LOGDSER_NB		1.30893	0.2856
LOGDDS_NB does not Granger Cause LOGECDV_$B	34	2.63344	0.0889
LOGECDV_$B does not Granger Cause LOGDDS_NB		0.17546	0.8400
LOGEXDS_NB does not Granger Cause LOGECDV_$B	34	0.61110	0.5496
LOGECDV_$B does not Granger Cause LOGEXDS_NB		1.77076	0.1881

Source: Researcher computation,2025

5. Conclusion

This study examines the impact of Nigeria public debt on Nigeria economic growth, secondary data collected from Central Bank of Nigeria statistical bulletin of 2025 analysed by ARDL (Auto-regressive Distributed Lag), descriptive statistics and granger causality test also used. The non-stationarity test among the variables was carried using Unit Roots.

External Debt and inflation have negative coefficient with the economic growth of Nigeria which support Hadji 2020, Ajayi and Adewusi, 2020 and Eze,2019 while domestic debt has positive coefficient with Nigeria economic growth supporting Ajay

and Adewusi, 2020.

Debt servicing. Domestic debt and inflation rate are significance except debt servicing at long run on Nigeria economic growth.

Domestic debts, debt servicing, and inflation have positive long run relationship with economic growth except external debt.

5. Recommendations: To achieve better economic growth domestic debts policy should be pursued and do away with external debt due to challenges of debt services payments.

Moderate inflation rate should be maintained by monetary authorities to stabilize prices and encourage exports production.

REFERENCES

Alejandro, D. J., & Ileana, R. J. (2017). *The impact of government debt and economic growth: An overview for Latin America*. Department of Economics, University of Perugia Working Paper, Munich.

Ahborn, M., & Schweicket, R. (2016). *Public debt and economic growth: Economic system matter*. Center for European Governance and Economic Development Research Discussion Paper No. 281, University of Gottingen.

Ajayi, I. E., & Adewale, D. G. (2020). Effect of public debt and economic growth of Nigeria: Empirical investigation. *International Journal of Business and Management Review, 8*(1).

Amaefule, L. (2018). Public debt and performance of Nigeria economy: An empirical evaluation 1991–2016. *International Journal of Social and Management Sciences, 1*(1), 14–27.

Ampousah, K. T. (2015). Ghana public debt and financial development. *Financial Development Journal, 16*, 25–54.

Anna, S., & Koilo, V. (2018). The relationship between external debt and economic growth: Empirical evidence from Ukraine and other emerging economies. *Investment Management and Financial Innovations*.

Attaputta, A. M. C., & Padmasiri, H. M. N. (2018). Long-run effect of public debt on economic growth in Sri Lanka. *IOSR Journal of Business and Management*.

Bank of Ghana. (2020). *Bank of Ghana's summary of financial and economic data: Monetary policy committee report*. Author.

Central Bank of Nigeria. (2020). *CBN statistical bulletin 2020*. Author.

Constance, D., Reinna, K., & Mengxue, W. (2020). *Public debt and real GDP*. IMF Working Paper. Retrieved from impactwp/22/76

Donayre, L., & Taivan, A. (2017). Causality between public debt and real growth in the OECD: A country-to-country analysis. *Economic Papers: A Journal of Applied Economics and Policy, 36*(2), 156–170.

Dorman, E. D. (1944). The burden of debt and national income. *The American Economic Review, 34*(4), 798–827.

Driessen, G. A., & Gravelle, J. G. (2019). *Deficit financing, the debt, and modern monetary theory*. Congressional Research Service, 1–23.

Eberhardt, M., & Presbitero, A. F. (2015). Public debt and growth: Heterogeneity and non-linearity. *Journal of International Economics, 97*(1), 45–58.

Efuntade, A. O., Adegboyo, S. O., & Afuntade, O. O. (2020). The impact of external debt on economic growth in Nigeria. *International Journal of Scientific and Research Publications, 10*(4), 716–823.

Essien, S. N., Ngozi, T. I., Agoegbulem, M. K., & Onumonu, O. G. (2016). An empirical analysis of macroeconomic impact of public debt in Nigeria. *CBN Journal of Applied Statistics, 7*(19), 124–145.

Eze, O. M., Nweke, A. M., & Atuma, E. (2019). Public debt and Nigeria's economic growth. *IOSR Journal of Economics and Finance, 10*(3).

Hadji, S. B. (2022). External debt-economic growth nexus: The Sierra Leonean case (1973–2021). *International Journal of Economics, Finance and Management Sciences, 10*(2), 54–66.

Hilton, S. K. (2021). Public debt and economic growth: Contemporary evidence from developing economy. *Asian Journal of Economics and Banking, 5*(2), 173–193.

Huang, Y., Panizza, U., & Varghese, R. (2018). Does public debt crowd out corporate investment? International evidence. *IHEID Working Papers, 08-2018*, Economic Section, The Graduate Institute of International Studies.

Ikwuo, A., Joseph, F. O., & Abagha, J. B. (2024). Public debt and economic growth in Nigeria. *IOSR Journal of Humanities and Social Sciences, 29*(4), 50–57.

Issac, S., & Rosa, G. (2016). Public debt, public investment and economic growth in Mexico. *International Journal of Financial Studies, 4*(6).

Lucky, E. U., & Godday, O. O. (2017). The Nigeria debt structure and its effects on economic performance. *International Journal of Business and Management Review, 5*.

Mathew, A. O., & Adetayo, A. O. (2022). Debt sustainability and economic growth in Nigeria. *IOP Conference Series: Earth and Environmental Science, 1054*.

Mladen, M. I. (2015). Economic growth and development. *Journal of Process Management and New Technologies International, 3*(1).

Mosler, W. (1993). *Soft currency economics II: The origin of modern monetary theory*.

Nassir, U. S., & Wani, H. K. (2016). An evaluation of the relationship between public debt and economic growth: A study of Afghanistan. *Munich Personal RePEc Archive Paper No. 75538*.

Obi, E. K. (2014). An estimation of critical levels of external debt accumulation: The Nigerian experience. *International Journal of Sustainable Development, 4*(11).

Ojomolade, D. J., Adejuwon, J. A., & Akinjide, A. (2021). Determinants of foreign exchange rate volatility and non-oil exports in Nigeria. *International Journal of Scientific and Research Publications, 11*(3).

Osobase, A. T., Ojo, T. J., & Ojo, S. I. (2023). Does Nigeria's external debt contribute to economic growth? A revised empirical analysis. *Lafia Journal of Economics and Management Sciences, 8*(2).

Owusu-Nantwi, V., & Erickson, C. (2016). Public debt and economic growth in Ghana. *African Development Review, 28*(1), 116–126.

Saungweme, T., & Odhiambo, N. M. (2019). Government debt service and economic growth nexus in Zambia: A multivariate analysis. *Cogent Economics and Finance, 7*(1), 1–17.

Sunday, N. E., Ngozi, T. I. A., Michael, K. M., & Ogochukwu, G. O. (2016). An empirical analysis of the macroeconomic impact of public debt in Nigeria. *Journal of Applied Statistics, 7*(1A).

Udeh, S. N., Ugwu, J. I., & Onwuka, I. O. (2016). External debt and economic growth: The Nigerian experience. *European Journal of Accounting, Auditing and Finance Research, 4*(2).

Uzuchukwu, O., Okafor, P. S. O., & Obinna, V. N. (2022). Does public debt determine economic growth? Evidence from Nigeria. *Asian Journal of Economics, Business and Accounting, 22*(23), 175–183.

World Bank. (2004). *Ghana – Enhanced heavily indebted poor country (HIPC) debt initiative*. World Bank. Washington, DC.