# **International Journal of Social Science And Human Research**

ISSN(print): 2644-0679, ISSN(online): 2644-0695

Volume 04 Issue 04 April 2021

DOI: 10.47191/ijsshr/v4-i4-17, Impact factor-5.586

Page No: 689-697

# **Impact of Money Market Instruments on Economic Growth in Nigeria**



Ishola, Oluwatosin Pelumi. M.Sc.<sup>1</sup>, Oni, Ayodele Samuel. M.Sc.<sup>2</sup>, Kolapo, Mariam Biodun M.Sc.<sup>3</sup>

<sup>1</sup>Lumex Consultancy Firm, Ilorin, Kwara State

<sup>2</sup>Department of Accountancy, School of Business and Management Studies, Federal Polytechnic Offa, Offa, Nigeria.

<sup>3</sup>Department of Banking and Finance, School of Business and Management Studies, Federal Polytechnic Offa, Offa, Nigeria.

ABSTRACT: Money market instruments play a crucial role in the growth and development of the Nigerian economy. Still, it is not yet vibrant and constrained by the absence of sub-markets and availability of adequate credit instruments required for the smooth operations of the market. The study examine the impact of money market instruments (Treasury bill, Treasury certificates, Certificate of Deposits, Banker's Acceptances, Development Stock and Commercial Papers) on Economic growth based on secondary data sourced from the Central Bank of Nigeria (CBN) Statistical Bulletin and National Bureau of Statistics (NBS) publications for 30 years. The study employed statistical techniques such as ADF, Unit Root Test, OLS, multiple-regression and Granger Causality Test to analysis data collected for the study covering the period 1990-2020. The study observed that Bank acceptance and Commercial paper granger cause Gross Domestic Product (GDP). Treasury bill, Treasury certificate and commercial papers have a positive relationship with GDP, but its effect is insignificant in the long run. But banker's acceptance and certificate of deposits has a positive and significant effect on GDP in the long run. In contrast, development stock has no significant effect on GDP in the short and the long run with no granger causal relationship with GDP. The study therefore recommends that Nigerian money market should be reformed in line with the current globalization trend and internationalization of the money market to allow a flow of foreign investment into the economy and also increase the number of tradable instruments in the market.

KEYWORDS: Money Market, Economic growth, financial institutions, Money market instruments.

# INTRODUCTION

The level of growth and development recorded in an economy cannot be separated from the level of growth and development recorded in its financial sector, as this sector helps in mobilization of funds from Surplus Spending Units (SSU) and channel same to Deficit Spending Units (DSU) based on sound pricing and efficient allocation principles. Besides this function, the financial sector also helps in providing the mechanism for firms and other economic agents to appraise the value of firms' assets thereby allowing investors to make informed decision as to the allocation of their funds as lenders on the one hand, and the best alternative form of liability instruments to issue, as borrowers, on the other hand (Lawal, 2014). The financial system comprises of financial markets, financial institutions and financial instruments that interact with one another and the rest of the economy as well as the external

Sector so as to achieve macroeconomic goals and objectives in a given economy (Ojo, 2010). Though financial markets all play important roles in achieving economic growth and development, analysts tend to focus on the contributions of the capital market to the economy, neglecting the role of the money market. Hence, while there is a plethora of empirical research on the relationship between capital markets and economic development, the money market has not received ample attention in this respect.

According to Mohammed (2014), money market engenders trading in short-term instruments to meet the little needs of large users of funds such as the government, banks and large corporate organizations. The money market is effectuated though money market instruments principally for short term investments. These money market instruments include treasury bills, certificate of deposits, commercial papers, banker's acceptances, among others. The money market also allows the refinancing of short and medium-term to facilitate and mitigate business liquidity and risk (Iwedi & Igbanibo, 2015). The banking system and the money market represent the exclusive setting in which monetary policy operates. A developed, active and efficient money market enhances the efficiency of central bank's monetary policy and the transmission of its impulses into the economy (Ehigiamusoe, 2013). Thus, the development of the money market smoothen the progress of financial intermediation and boosts lending to the economy and improves the country's economic and social welfare. In developing economies like Nigeria money markets are still underdeveloped as such the absence of a well-developed money market in these countries poses a challenge in pooling funds large enough to fund private

enterprises. Despite that in recent times the Nigeria money market has witnessed robust reforms and expansion, there are still some problems and challenges which the market is confronted with. The Nigeria money market is still superficial when compared to her contemporaries in some advanced and emerging economies; it is also characterized by immature secondary market, undiversified instruments, lack of proper coordination in the issuance of debt instruments, inadequate and deficient information flow among others. Thus, the money market has been neglected in the finance research. The use of money market development data (such as the issued value of treasury bills, commercial papers and banker acceptances) as part of the indicators of money market development could provide new insights on the finance – growth nexus in Nigeria. These findings show that there is a renewed interest in money market development in the reviewed literature. However, the results of the prior studies carried out to date are mixed and scanty. Also, fewer studies have utilized the granger causality test in their analysis. It is in the light of these that this study analyzes the impact of money market instruments on Nigerian economic growth. The main objectives of this study are to examine the impact of money market instruments on Nigerian economic growth. The specific objectives of the study are to:

- 1. Ascertain the impact of money market instruments (Treasury bill, Certificate of Deposit, Development stock, Commercial papers, Treasury Certificate and Banker acceptances) on Economic growth?
- 2. Determine the direction of causality between money market instruments (Treasury bill, Certificate of Deposit, Development stock, Commercial papers, Treasury Certificate and Banker acceptances) on economic growth?

## LITERATURE REVIEW

#### **Concept of Money Market**

The money market is the market where securities of short term nature of not more than one year are bought and sold. It has no central location; businesses are usually transacted on telephone, fax, telex, and so on (Ikpefan & Osabuohien, 2012). Prices of securities dealt with are usually determined by the influence of the Federal Government of Nigeria's monetary policies being issued annually and monitored by the Central Bank. They are of high quality, unsecured but relatively low risks financial assets such as: savings of various forms, negotiable and nonnegotiable certificate of deposits, bankers' acceptances, commercial papers, call money, treasury bills and treasury Certificate. The market is of great help in financing industry and commerce. In developed economies, it helps industries in providing their working capital requirements through the system of finance bills, commercial paper, among others. Conditions in the money market and the short-term rates of interest influence the long-term capital market as well as the long-term rates of interest. In advanced economies, the money market constitutes the most institution for creating liquidity for government, companies and individuals (Ikpefan & Osabuohien, 2012). They are highly organised commercial banking system, presence of central bank, availability of proper credit instruments; existence of a number of submarkets, availability of ample resources, stable political condition and large volume of international trade. The presence of these factors would enhance the volume of transactions of money market instruments in the discount market and the general economy in general. The Nigerian money market existing is also inadequate and constrained by the absence of submarkets and availability of adequate credit instruments required for the smooth operations of the market. Uruakpa (2019) ascertain that money provides commercial banks with a ready market where they can invest their excess reserves and earn interest while maintaining liquidity. The short –term investments such as bills of exchange can easily be converted to cash to support customer withdrawals. Also, when faced with liquidity problems, they can borrow from the money market on a short-term basis as an alternative to borrowing from the central bank. The advantage of this is that the money market may charge lower interest rates on short-term loans than the central bank typically does. The major players in the money markets include individuals, companies, banks, discount houses and governments.

## **Roles of Money Market in the Economy**

Money markets play a key role in banks' liquidity management and the transmission of monetary policy. In normal times, money markets are among the most liquid in the financial sector. By providing the appropriate instruments and partners for liquidity trading, the money market allows the refinancing of short and medium-term positions and facilitates the mitigation of your business' liquidity risk (Pavtar, 2016). The following are the roles of the Money Market:

- i. **Risk Sharing**: One of the most important functions of a financial system is to achieve an optimal allocation of risk. There are many studies directly analyzing the interaction of the risk sharing role of financial systems and economic growth. These theoretical analyses clarify the conditions under which financial development that facilitates risk sharing promotes economic growth and welfare. Quite often in these studies, however, authors focus on either markets or intermediaries, or a comparison of the two extreme cases where every financing is conducted by either markets or intermediaries.
- ii. **Liquidity**: Money market funds provide valuable liquidity by investing in commercial paper, municipal securities and repurchase agreements: Money market funds are significant participants in the commercial paper, municipal securities and repurchase agreement (or repo) markets. Money market funds hold almost 40% of all outstanding commercial paper, which is now the primary source for short-term funding for corporations, who issue commercial paper as a lower cost alternative to short-term bank loans. The repo market is an important means by which the Federal Reserve

conducts monetary policy and provides daily liquidity to global financial institutions. Quantum of liquidity in the banking system is of paramount importance, as it is an important determinant of the inflation rate as well as the creation of credit by the banks in the economy.

- iii. **Encouragements to saving and Investment**: Money market has encouraged investors to save which results in encouragement to investment in the economy. The savings and investment equilibrium of demand and supply of loanable funds helps in the allocation of resources.
- iv. Controls the Price Line in Economy: Inflation is one of the severe economic problems that all the developing economies have to face every now and then. Cyclical fluctuations do influence the price level differently depending upon the demand and supply situation at the given point of time. Money market rates play a main role in controlling the price line. Higher rates in the money markets decrease the liquidity in the economy and have the effect of reducing the economic activity in the system. Reduced rates on the other hand increase the liquidity in the market and bring down the cost of capital considerably, thereby raising the investment. This function also assists the CBN to control the general money supply in the economy.
- v. **Helps in Correcting the Imbalances in Economy**: Financial policy on the other hand, has longer term perspective and aims at correcting the imbalances in the economy. Credit policy and the financial policy both balance each other to achieve the long term goals strong-minded by the government. It not only maintains total control over the credit creation by the banks, but also keeps a close watch over it. The instruments of financial policy counting the reportate cash reserve ratio and bank rate are used by the Central Bank of the country to give the necessary direction to the monetary policy.

Characteristics of Money Market Instruments Money market instruments channel money from investors to borrowers who need money, for an investment to quality as a money market instrument, lenders must be able to get their money back in a year or less, choosing among short terms securities issued by banks, companies or governments (Raja & Mahalakshmi, 2015). The following are the characteristics of money market instruments:

- i. **Liquidity**: Liquidity of an investment refers to how quickly, and easily investors can access their money. Money market instruments are relatively liquid by definition because the money is available in a year or less. Fixed terms range from one day to one year. Money market deposit accounts and money market mutual funds have high liquidity, as depositors may access money by check when they need it. Some money market instruments also permit resale to secondary buyers if the investor needs the principal before maturity. Treasury bills and some special CDs fall into this category.
- ii. **Return**: Money market instruments pay interest to the lender. Bank money market accounts, for example, add interest on each monthly statement. Other instruments, including Treasury bills, pay interest only at maturity. A few types of money market investments pay interest exempt from federal income tax. Short-term exempt bills issued by municipal and state governments fail into this category.
- iii. **Safety**: Money market investments are safer than most due to their liquidity. Their liquidity minimizes long term uncertainties about companies and governments and helps protect against interest rate increases. Instruments such as Treasury bills gain additional safety from their federal government backing. Government insured money market deposit accounts also have protection against bank failure if their balances fall within insurance guidelines.

# **Economic Growth**

Economic growth is the increase in the market value of the goods and services produced by an economy over time. It is an increase in the capacity of an economy to produce goods and services, compared from one period of time to another. It can be measured in nominal or real terms. It is measured as the percentage of increase in real gross domestic product. Abma (2003) examined the empirical relationship between financial development and economic growth in South-East Asia using data for twenty-five years. It was discovered that financial development matters for economic growth and that there exists a uni-causality from financial structure to economic development. The results suggested that in developing countries, a policy of financial reforms could improve economic growth. Theoretically, the linkage between finance and economic growth may take different forms. On the other hand, the financial sector may affect growth through the accumulation channel and the allocation channel. The accumulation channel emphasizes the finance-induced growth effects of physical and human capital accumulation (Faith, Hakeem and Samuel, 2020). The allocation channel focuses on finance-induced efficiency gains in resources allocation that enhances growth.

## **EMPIRICAL**

Ikpefan and Osabuohien (2012) investigate the interactions between discount houses, money market instruments and economic growth in Nigeria for the period 1992 to 2007. The study captures their performance indicators and employed time series data obtained from Central Bank of Nigeria. Employing cointegration and vector error correction techniques, it establishes, among others,

that a long-run relationship exists between discount houses operations and economic growth on one hand and money market instruments, on the other hand. However, none of the relationship is statistically significant.

Ehigiamusoe (2013) examines the impact of money market on economic growth in Nigeria using data for the period 1980-2012. Econometrics techniques such as Ordinary Least Squares Method, Johanson's Co-integration Test and Vector Error Correction Model were used to examine both the long-run and short-run relationships. Results from the study reveal that though a long-run relationship exists between money market and economic growth, but the present state of the Nigerian money market is significantly and negatively related to economic growth. The researcher concludes that the link between the money market and the real sector of the economy remains very weak.

Oluwole (2014) investigates the effect of money and capital markets on Financial Development and Economic Growth in Nigeria. It employs an Ordinary Least Square (OLS) method of analyzing the secondary data covering the period of 1981 to 2010. The Findings show that Banking system Credit to the Domestic Economy (CDMB) and Money Supply (M2) (which he uses as the money market variable) have significant effects on the GDP (Economic Growth) while Value of Deals (VOD) and Market Capitalization (MCAP) which are the Capital Market variables were not statistically significant.

Agbada and Odejimi (2015) explore the impact of developments in money market operations and economic viability in Nigeria for the period 1981 to 2011. Economic viability was proxied by Gross Domestic Product (GDP) while core Money market instruments commonly used in Nigeria such as Treasury bills (TB), Treasury Certificate (TC), Certificate of Deposit (CD), Commercial Papers (CP) and Banker Acceptances (BA) served as the explanatory variables. Ordinary Least Squares Method was used for empirical analysis of the secondary data. The result reveals that some of the independent variables exhibited strong linear relationships with GDP. In particular, Treasury Bills and Banker Acceptances have statistically significant relationships with GDP while other independent variables such as treasury certificate, certificate of deposit and commercial paper exhibit weak relationship with GDP. Igbinosa and Aigbovo (2016) assess the impact of money market development on Nigerian economic development between 1986 -2013. The study uses money market indicators (values of treasury bills, commercial papers and bankers acceptances) as measures of money market development and real GDP per capita for economic development, while monetary policy rate was the only control variable. It adopts a multivariate OLS analysis for the estimation process, co-integration analysis for long-run equilibrium relationship and the associated error correction model to determine the short-run impact of the variables. The Granger causality test is used to determine the direction of causality among the variables. The findings of the study are that banker acceptances (LVBA) significantly influences economic development in both the short run and long-run respectively, while value of treasury bills and commercial papers as well as the monetary policy rate have significant impact on economic development only in the long run. Also, a unidirectional causality is found running from value of bankers' acceptances and monetary policy rate to economic development. Peter (2017) examined the impact of money market reforms on economic growth of Nigeria. The objectives was to find out how reform of the market since 1990 has impacted on Nigeria's GDP through money market transactions, treasury bill rate and treasury bill outstanding. Quasi experimental design was adopted. Data was collected through CBN Statistical Bulletin covering the period 1990-2017. Statistical tools adopted include unit root test, OLS, cointegration and variance decomposition. He found out that money market value has positive and significant effect on GDP while Treasury bill outstanding has positive but insignificant effect on GDP. However, Treasury bill rate has negative and significant effect on GDP. The F-statistics suggests that all the money market proxies jointly impacted of GDP, an implication that money market is a viable financial market in Nigeria. Moreover, the variance decomposition showed that GDP has a decreasing variance with money market value and Treasury bill rate but an increasing variance with Treasury bill outstanding.

Akarara and Eniekezimene (2018) investigated the effect of selected money market instruments on the growth of the Nigerian economy. Using data obtained from the central bank of Nigeria statistical bulletin 2017, the study employed the Autoregressive Distributive Lag (ARDL) Bound Testing approach to co-integration. The result shows no form of convergence among the variables in the long-run while showing that money market variables are positively related to economic growth rate both in short and long run, except for Certificate of Deposit (COD) and Commercial Paper (CPR) that has an inverse relationship with economic growth in the long-run.

Pavtar (2019) the study investigated the nexus between money market and Nigerian economic growth: A time series analysis from 1985-2014. The study adopted the ex-post-facto research design. Data used in the study was sourced from CBN annual statistical bulletin for relevant years. Descriptive statistics and the ordinary least square (OLS) multiple regression techniques were the main statistical tools used in the analysis of data. Additionally, the T-test statistics was used to test the null hypotheses of the study at 5% level of significance for a two tailed test. The study found that Treasury bill, Treasury certificate, Commercial paper does not have any significant effect on the gross domestic product (GDP) of Nigeria while Certificate of deposits was found to significantly impact on the gross domestic product (GDP) of Nigeria.

Faith, Hakeem and Samuel (2020) the study examine the impact of selected Money Market Instruments (Treasury bill, Certificate of Deposit, Commercial Papers and Development Stock) on economic growth based on time series data sourced from Central Bank of Nigeria (CBN) Statistical Bulletin and National Bureau of Statistic (NBS) publications for 38 years covered by the study. The study employed multiple regression and Granger Causality Test to analyse data collected for study covering the period 1989-2019.

The study found out that Treasury bill and commercial papers have a positive relationship with GDP, but its effect is insignificant in the long run. But Bank's acceptance and Credit to the Private sector has a positive and significant effect on GDP in the long run. In contrast, development stock has no significant effect on GDP in the short run and the long run with no granger causal relationship with GDP.

#### THEORETICAL FRAMEWORK

## **Modern Growth Theory**

Modern growth theory developed by Grossmen, Gand Helpman, E. (1991), Lucas, R.E. (1988) and Romer, P.M. (1986) identifies two main channels through which the financial sector might affect long-run growth in a country. They include, catalyzing the capital accumulation (including both human and physical capital) and by increasing the rate of technological progress. The five basic functions of an efficiently working financial sector (such as mobilizing and pooling savings; producing information ex-ante about possible investment and allocating capital, monitoring investment and exerting corporate governance, facilitating the trading, diversification and management of risk and facilitating the exchange of goods and services) allow the above two channels to work for promoting growth by mobilizing savings for investment, facilitating and encouraging capital inflows and allocating the capital efficiently among competing uses.

# **Financial Intermediation Theory**

Financial intermediation theory was first formalized in the work of Goldsmith, R.W. (1969), McKinnon, R.I. (1973) and Shaw, E. (1973) who see financial market, both money and capital market playing a pivotal role in economic development, attributing the differences in economic growth across countries to the quantity and quality of services provided by financial institutions. According to Goldsmith (1969), the positive correlation between financial development and the level of real per capital GNP is attributed to the positive impact that financial development has on encouraging more efficient use of the capital stock. Also, the growth process has impact on financial market because it creates incentives for further financial development. McKinnon's thesis is based on the complimentary hypothesis, which is in contrast to the Neo classical monetary growth theory. He argued that there is a complimentarily link between money and physical capital which is reflected in money demand. This complimentary links the demand for money directly and positively with the process of physical capital accumulation because the constitutions of money supply have a first order impact on decision to save and invest furthermore, Show (1973) proposed a debt intermediation hypothesis, whereby expand financial intermediation between the savers and investors resulting from financial liberalization (higher real interest rates) and development increase the incentive to save and invest, stimulate investment due to an increase supply of credit, and raises the average efficiency of investment. This view stresses the importance of free entry into and competition within the financial markets as prerequisites for successful financial intermediation. Mackinnon and Show (1973) also posited that policies that adversely affect the financial markets would adversely affect the incentive to save because it will cause repression of the financial markets. The key elements of financial repression according to them include; high reserve requirement on deposit, legal ceilings on bank lending and deposit rates, direct credit restriction on foreign currency capital transaction; and restriction on entry into banking activities.

## **METHODOLOGY**

This study examined the impact of money market instruments on economic growth in Nigeria for the period 1990-2020 based on time series sourced from the Central Bank of Nigeria Statistical Bulletin of various issues. The study employed the Treasury bills, Treasury certificates, Certificate of deposits, Banker's acceptances, Development stock, Commercial papers and Gross Domestic Product (GDP) in Nigeria. Gross Domestic Product (GDP) was used as a proxy for economic growth (dependent variables), while Treasury bills, Treasury certificates, Certificate of deposits, Banker's acceptances, Development stock and Commercial papers were used as a proxy for money market (independent variables). The ADF, Unit Root Test, OLS, multiple regression and Granger Causality Test are used to analyse the data.

# **Model Specification**

The model employed in this study is built based on the model specification of Faith, Hakeem and Samuel (2020) which is hence modified by inserting treasury certificate and certificate of deposit.

The model is specified as follows:

GDP=  $\alpha + \beta_1$  TBILLS +  $\beta_2$  COMPA +  $\beta_3$  CPS+  $\beta_4$  DSTOCK +e .....(1)

Where

GDP= Gross Domestic Product

TBILLS = treasury bills

COMPA = commercial papers

CPS= credit to the private sector.

DSTOCK = development stock

 $\mu = Error Term$ 

 $\beta 1 - \beta 5 =$  coefficients of each of the independent variables and each, as expected  $\neq 0$ 

Hence the modified model specification is as follows:

GDP=  $\alpha$ +  $\beta_1$ TBS +  $\beta_2$  TCS +  $\beta_3$  CDS+  $\beta_4$ BANKAC+  $\beta_5$  DSTOCK +  $\beta_6$  COMPA +  $\mu$  ......(2)

Where:

GDP= Gross Domestic Product

TBS = treasury bills

TCS = treasury certificates

CDS= certificate of deposits

BANKAC= banker's acceptances

DSTOCK = development stock

COMPA = commercial papers

 $\mu = Error Term$ 

 $\beta 1 - \beta 6$  = coefficients of each of the independent variables and each, as expected  $\neq 0$ 

#### **Presentation of Data**

**Table 1: Descriptive Statistics** 

VARIABLES	GDP	TBS	TCS	CDS	BANKAC	DSTOCK	COMPA
Mean	37564.9	92644.4	13397.1	39088.7	23.2434	2.28764	74.4341
Median	62214.4	46873.3	2.00000	1.00000	11.8453	2.38700	7.66203
Maximum	28298.3	48763.0	62577.2	60500.00	82.8340	4.70700	823.7001
Minimum	24344.1	6.78200	1.00000	1.00000	0.00860	0.00000	0.00730
Std. Dev.	48894.5	11964.1	18136.7	13269.3	25.6498	1.67551	177.7099
Skewness	1.41710	2.81724	1.89925	4.20081	2.10584	1.04634	4.12078
Kurtosis	4.32714	5.44136	2.10611	12.7569	4.16209	2.37610	12.9451
Jarque-Bera	9.05752	12.2600	5.00356	165.096	8.88653	3.60893	308.3649
Probability	0.00714	0.00000	0.13309	0.00000	0.02038	0.26456	0.00000
Sum	126154.	322417	30156.1	91364.9	818.177	84.4937	3198.12
Sum Sq. Dev	7.26E+10	6.83E+13	7.57E+09	4.48E+1	33491.7	115.7672	1127077
OBS	30	30	30	30	30	30	30

**Source:** Authors Computation, 2020

The descriptive result shows that the averages of the money market instruments in Nigeria. The average treasury bill issued is #926'B worth with treasury certificate of #13'B. bank acceptance is #42'B with an average commercial paper issued within the period is #74'B while maintaining an average certificate of deposit of #3,906' B and development stock of N2,28'B to achieve an average GDP of N37,564'B within 30 years. The result of the standard deviation of Gross Domestic Product, treasury bills, treasury certificates, certificate of deposit, bank acceptances, development stock and commercial papers whose value exceeds the mean value indicates that the significant distance between the highest and lowest values hence values are dispersed and skewed. Also, since all the skewness of the variables is positive, this indicates that the data are positively skewed, meaning that the right tail of the distribution is longer than the left. The result further shows that GDP, TBS and BANKAC are all mesokurtic while certificate of deposits and commercial papers are leptokurtic and treasury certificate and development stock are platykurtic.

**Table 2: Unit Root Test** 

VARIABLES	TSTAT	0.01	0.05	0.10	PROB	DECISION
GDP	-5.41279	-3.54975	-2.64224	-2.64224	0.009	1(0)
TBS <sub>(-1)</sub>	-3.70840	-3.87386	-2.94584	-2.66055	0.001	1(0)
TCS <sub>(-1)</sub>	-2.67871	-3.76959	-2.95671	-2.64224	0.008	1(1)
CDS <sub>(-1)</sub>	-7.69005	-3.78803	-2.97663	-2.64619	0.001	1(1)
BANKAC <sub>(-1)</sub>	-6.97512	-3.62679	-2.94584	-2.61553	0.000	1(0)
DSTOCK <sub>(-1)</sub>	-2.87921	-3.62679	-2.94584	-2.61454	0.008	1(0)
COMPA <sub>(-1)</sub>	-5.49882	-3.62679	-2.94584	-2.62351	0.0096	1(0)

Source: Authors Computation, 2020

**Table 3: Johansen Co-integration Test** 

Hypothesized No. of	Eigenvalue	Trace Statistic	0.05 critical value	Prob.**
CE(s)				
None*	0.921172	222.6178	95.75366	0.0000
At most 1*	0.868313	131.1601	69.81889	0.0000
At most 2*	0.667803	68.48706	47.85613	0.0002
At most 3*	0.492754	30.75288	29.79707	0.0387
At most 4	0.292754	11.77611	15.49471	0.1680
At most 5	0.023171	0.843974	3.841466	0.3583

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

The result shows the long-run relationship between the money market instrument and gross domestic product. The result confirms the existence of a long –run relationship between money market and economic growth with at four cointegrating equations at the 0.05 level 0f significance.

**Table 4: Causal Relationship Test** 

Null Hypothesis:	Obs	F-Statistic	Prob.
GDP does not Granger Cause TBS	28	1.05946	0.3589
TBS does not Granger Cause GDP		8.21251	0.0014
GDP does not Granger Cause TCS	28	0.04516	0.9560
TCS does not Granger Cause GDP		0.03657	0.9642
GDP does not Granger Cause CDS	28	5.37035	0.0138
CDS does not Granger Cause GDP		0.23900	0.7900
GDP does not Granger Cause BANKAC	28	0.18596	0.8312
BANKAC does not Granger Cause GDP		6.37033	0.0048
GDP does not Granger Cause DSTOCK	28	0.08692	0.9170
DSTOCK does not Granger Cause GDP		2.11919	0.1372
GDP does not Granger Cause COMPA	28	1.16468	0.3253
COMPA does not Granger Cause GDP		4.37708	0.2212

**Source:** Authors Computation, 2020

The result of the Granger causality test shows that GDP granger causes treasury bills and not treasury bill granger causing GDP. GDP granger causes treasury certificate and not treasury certificate granger causing GDP. GDP granger causes certificate of deposits and not certificate of deposits granger causing GDP. It shows that bank acceptance exhibit a unidirectional causal relationship with GDP. It implies that bank acceptance granger causes GDP and not GDP granger causing bank acceptance. Also there exist no granger causal relationship between GDP and Development stock. Commercial Papers also exhibit a unidirectional causal relationship with GDP. This implies that commercial papers granger cause GDP and not GDP granger causing commercial paper.

Table 5: Short Run Test Vector Error Correction Model

Variables	Coefficient	Std. Error	t-Statistics	Prob
TBS <sub>(-1)</sub>	11.87209	2.26192	5.2486	0.5061
TCS <sub>(-1)</sub>	3.07588	1.80889	1.70004	0,1054
CDS <sub>(-1)</sub>	7.95956	2.88346	2.76042	0.0125
BANKAC <sub>(-1)</sub>	207.9118	39.7837	5.22606	0.0096
DSTOCK <sub>(-1)</sub>	1510.210	452.416	3.33810	0.0765
COMPA <sub>(-1)</sub>	0.90824	6.69820	0.13560	0.1054
С	220.3525	439.027	0.50191	0.0000

**Source:** Authors Computation, 2020

<sup>\*</sup>denotes rejection of the hypothesis at the 0.05 level

<sup>\*\*</sup>Mackinnon-Haug-Michelis (1999) p-values

The result shows the impact of money market instruments on GDP in the short run. The result further shows that the lag of treasury bills, treasury certificate, certificate of deposits, bank acceptances and development stock has a significant impact on the GDP in short run. In contrast, commercial paper has no significant impact on GDP in the short run.

Table 6: Long Run Coefficient Autoregressive Distributed Lag

Variables	Coefficient	Std. Error	t-statistic	Prob.
TBA	-0.026106	3.306216	-0.007896	0.9938
TCS	0.393525	0.843179	0.466776	0.6498
CDS	3.39472	1.295220	2.620847	0.0238
BANKAC	31.34966	42.530375	0.737112	0.4692
DSTOCK	-389.5183	504.9971	-0.771327	0.4491
COMPA	18.736461	9.57320	2.748255	0.0450
С	1742.930	2135.8421	0.822175	0.4202
R-squared	0.907562			
Adj. R-squared	0.820742			
Sum sq.resides	3.09E+10			
S.E of regression	53025.69			
Log likelihood	-251.4573			
F-statistic	21.39817			
Prob. (f-statistic)	0.0002			
Mean dependent	3646.70			
SD.dependent	4025.63			
Schwarz SC	19.3980			
Akaike info criteon	23.9002			
Hannan-Qunin crit	22.0084			

Source: Author's Computation, 2020

The result above shows that there exists a long run positive relationship treasury bill and the GDP in the long-run. This implies that as treasury bill is increasing so also will the GDP increase. However, this increase is not significant. The result of the ARDL also shows that bank acceptance and development stock has a positive relationship with GDP, but there effects are insignificant. But certificate of deposits and commercial papers has a positive and significant effect on GDP in the long run.

## **Policy Implication of the Study**

From the result of the descriptive statistics shows N926'Billion worth of Treasury Bills, average Treasury of Certificate of N133'Billion, certificate of deposits of N390'Billion, Bank acceptance of N42'Billion, development stock of N2.2'Billion and commercial papers of N74'Billion to achieve an average GDP of N37,564'Billion within 30 years. Treasury bills has more subscription and development stock has the least subscription in Nigeria. This can be because of Treasury bill is more preferred because of its low costs, favourable tax treatment and security.

The result also shows the long run relationship between the money market instruments and gross domestic product. This conforms to the findings of Faith, Hakeem and Samuel (2020) which opines that a significant long-run relationship exists between economic growth and money market instruments as against a non-significant long-run relationship discovered by the findings of Akarara and Eniekezimene (2018). Furthermore, Bank acceptance and commercial papers granger cause Gross Domestic Product but not another way round but Gross Domestic Product granger cause Treasury bill, treasury certificate and development stock. This implies that a boost of the GDP will ensure an increase in the amount available for the Treasury bill.

In the short run, treasury bills, treasury ceritificate, certificate of deposit, bank acceptance and development stock has a significant impact on the GDP. In contrast, commercial paper has no significant impact on GDP in the short run. This might not be unconnected with the fact that Commercial paper is not usually backed by any form of collateral, making it a form of unsecured debt. As a result, only firms with high-quality debt rating will easily find buyers without having to offer a substantial discount for debt issue.

The result of the ARDL shows that Treasury bills, treasury certificate, and commercial papers have a positive relationship with GDP, but its effect is insignificant in the long run. But Bank acceptance and certificate of deposit has a positive and significant effect on GDP in the long run. Therefore bank acceptances and certificate of deposit have a significant effect on GDP in the short run and the long run. This is conforms with the findings of Agbada and Odejimi (2015). The study find out that bank acceptances significantly influence economic growth in both the short-run and long-run respectively, while the value of treasury bills, treasury certificate, certificate of deposits and commercial papers have a significant impact on economic growth in the long-run. Further

findings revealed that development stock has no significant effect on GDP in the short-run and long-run and constitutes no granger causal relationship with GDP.

## CONCLUSION AND RECOMMEDATION

Money market instruments has a significant effect in the short run but it effect in the long-run on GDP is not strong because it only commercial paper that has a significant effect on GDP. Therefore long-run relationship exists between the money market and economic growth of Nigeria. Still, the current state of the Nigerian money market does not have a significant on economic growth; hence Nigeria money market should be reformed in line with the current globalization trend and internationalization of the money market to allow a flow of foreign investment into the economy increase the number of tradable instruments in the market.

#### REFERENCE

- 1) Abma, R.C.N. (2003). Financial Environment and economic growth in selected Asian countries. *Journal of Asian Economics*, 14(1), 11-21.
- 2) Agbada, A. O & Odejimi, D. O. (2015). Development in money market operations and economic viability in Nigeria: An Empirical Analysis, *European Journal of Business and Management*, 7(18), 42 52.
- 3) Akarara, E.A., & Edoumiekumo, G.S. (2016). Non-Bank Financial Institutions versus Economic Growth: The Appulse in Nigeria. *Wilberforce Journal of Social Sciences (WJSS)*, 1(2), 80-94.
- 4) Ehigiamusoe, U. K (2013). The link between money market and economic growth in Nigeria: Vector Error Correction Model Approach, *International Journal of Social, Education, Economics and Management Engineering*, 7 (12), 1792 1800.
- 5) Faith, I.O., Hakeem, T.S., & Samuel, O.A. (2020). Impact of selected Money Market Instruments on Nigerian Economic Growth. *Ilorin Journal of Human Resource Management (IJHRM)*, 4(1), 131-143.
- 6) Igbinos, S.O., & Aigbovo, O. (2016). The Nigerian Money Market and National Economic Development. *Journal of Business and value Creation*, 4(2), 114-135.
- 7) Ikpefan, O. A & Osabuohien, E. (2012). Discount houses, money market and economic growth in Nigeria, Economic Insights Trends and Challenges, 1(2), 19 30
- 8) Iwedi, M. & Igbanibo, D. S. (2015). The Nexus between Money Market Operations and Economic Growth in Nigeria: An Empirical Investigation. *International Journal of Banking and Finance Research*. 1(2):1-17
- 9) Lawal, A.I. (2014). Clinical analysis of the contributions of microfinance institutions in Nigeria. *Studies in Business and Economics Journal*. A Publication of Lucian Blaga University of Sibiu, Romania 9(1).
- 10) McKinnon, R.I. (1973). Money and Capital in Economic Development. Washington D.C. The Booking Institution. Pp 1-20.
- 11) Ojo, A.T. (2010). The Nigeria maladapted financial system: Reforming tasks and development dilemma. Lagos: The CIBN Press Limited.
- 12) Oluwole, F. O. (2014). Financial Development and Economic Growth Nexus in Nigeria, *Global Journal of Commerce* and Management Perspective, 3 (5), 231 241.
- 13) Pavtar, A. (2016). The Nexus between Money Market Instruments and Nigerian's Economic Growth: A Time Series Analysis. *Journal of Accounting and Financial Management*, 2(3), 22-39.
- 14) Uruakpa, P.C. (2019). Impact of Money Market Reforms on Economic Growth of Nigeria 1990-2017. *Archives of Business Research*, 7(2), 122-134.