Financial Intermediation and Economic Growth in Nigeria ,1988 - 2013: A Vector Error Correction Investigation

Tonye Ogiriki

Andabai, Priye .W

Department of Finance and Accountancy, Niger Delta University, Bayelsa State, Nigeria

Doi:10.5901/mjss.2014.v5n17p19

Abstract

The study examined the relationship between financial intermediation and economic growth in Nigeria using data spanning (1988-2013). Secondary data was collected from the CBN statistical bulletin and national bureau of Statistics. Hypotheses were formulated and tested using vector error correction model and the test for stationarity proves that the variables are integrated in the order which implies that unit roots do not exist among the variables. There is also long-run equilibrium relationship between economic growth and financial intermediation and the result also confirms about 96% short-run adjustment speed from long-run disequilibrium. The coefficient of determination indicates that about 89% of the variations in economic growth are explained by changes in financial intermediation variables in Nigeria. The study therefore recommends that the monetary authorities should properly control and regulate the activities of the intermediations in order to achieve a sound financial system in the country, and finally, efforts should be made by monetary authorities to check mate banks from possessing excess liquidity that would ensure the prevention of inflation in the economy.

Keywords: *financial, intermediation, relationship, economic, growth, Nigeria.*

1. Introduction

Nzotta (2004) asserted that, one of the achievements of sustained economy growth and development is the ultimate objective of reducing poverty and enhancing the welfare of its citizens. However, finance has been indentified as the underlying requirement for input factor in the development and also regards as an engine of growth in any economy (Onoh, 2002). Onyido (2004) stressed that, in an economy like ours which is in hurry to develop in the face of serious constraints, much attention is therefore placed on the financial system and its component for the mobilization of funds for economic growth. The economic agents that responsible for such transfers are called financial intermediaries and the process through which it is done is called financial intermediation (Umoh, 2004). Financially intermediaries become an engine of growth and development by the process of financial intermediation. Okereke (2004) stressed that; channeling of funds from surplus to deficit units of the economy will encourage productive innovation even though it is also risky. Nzotta (2004) stated that, the financial system consist of various financial institution that operate in an orderly manner to ensure the smooth flow of funds and thus accord the system it's character and uniqueness. Ezirim (2005) also described the financial system as the aggregation of financial market arrangements, institutions and agents that interact with each other and other economic units, together with the set of rules and regulation that guide their interactions.

Onoh (2002) observed that, the Nigerian financial sector comprises various segments including the regulatory and supervisory authorities for banks and non-bank financial institutions, others are the money market and its institution, the capital market ad its players. The system also consists of the development of finance institutions and funds. Usually, financial instruments are traded in the financial market by the financial

institutions. Jerome (2000) asserted that, the financial system collects savings from the surplus spending units and moves these funds to deficit spending units (Borrowers).According to Banisile (2005), volume of credit available to economic units for investment determines the rate of economic growth as measured by the Gross Domestic product. Nzotta (2004) observed that, interest rates, credit celling and sectoral allocation have been found useful to ensure efficiency in resource allocation as well as innovative ideas and development in individual institution.

Onoh (2002) posits that, the adoption of a market based mechanism, which is now in vogue in both developed and developing countries has enhanced the efficiency and responsiveness of the monetary authorities in responding to macro economic problems. Despite the progress made in ensuring a sound, stable and efficient financial system that can respond positively to the needs of the Nigeria development, there is still considerable room for improvement. More importantly, Ezirim (2005) posits that, the challenges posed by the globalization, liberalization and technological innovations are enormous, especially in terms of competition and there by increasing sophistication of consumer financial services which will put a lot of pressure on existing resources. Onyewe (2004) asserted that, despite the large number of banks, which should have provided considerable competition, there is wide spread between the deposit and lending rate. The characteristic of an oligopolistic banking system related to the challenges of developing more efficient payment system that would reduce the volume of cash transaction through the encouragement of various payment mechanisms includes the use of cheques and other near money instruments (Andabai, 2004). Onyido (2005) argued that, the challenges facing the regulatory authorities in promoting a sound, stable and efficient financial system are imperative that require the strengthening of each regulatory frame work and capacity as well as maintaining co-ordination of various regulatory units to avoid conflicts of role and duplication.

2. Theoretical Literature

Andabai (2010) stressed that, the achievement of financial sector stability is fundamental to the maintenance of macro economic stability is sine-qua-non for sustainable growth and development and they go hand in hand to promote economy growth. Onyido (2004) concluded that, regulating authorities should create favourable financial environment in order to sustain economic growth and development in the country. According to Gbosi (2005) the deposit money banks (DMBS) emerged following the adoption of the universal banking system in 2000 and the removal of the dichotomy between commercial and merchant banks. A universal bank performed the most important role of financial intermediation in the Nigerian economy. In particular, they had undertaken the following activities Andabai (2010). (i) The business of receiving deposits on current saving or other account's, (ii) paying or collecting cheques drawn or paid by customers, (iii) Provision of financial consultancy and advisory services, (iv)making or management investment on behalf of any person and (v) the provision of insurance market services as could be required by the regulating authorities. Jerome (2000) contributed that, these services are to be provided after the bank must have complied with the statutory requirement for providing such services. Deposit money banks are in the process of providing loans and advance to their customers. Aderibigbe (2007) observed that, the ability of banks to create money is however, limited by statutory reserve requirements of the central Bank. Generally, activities of the deposit money banks impact on the soundness and stability of the financial system hence the special attention accorded them by the regulatory authorities (Umoh, 2005).

Nzotta (2004) posited that, the banking sector is the dominant sector in the Nigeria financial service industry, he also described it as the most vibrant component and whatever difficulties it passes through affects the entire economy greatly. In July, 2004, the CBN launched a 13-point agenda aimed at creating bigger banks with stronger balance sheets, ensuring safe and sound banking practice and enhancing regulatory capacity to supervise the industry. According to Soludu (2004), the key element of the reform program was the increase in minimum capital base of banks from N2 billion to N25 billion by December, 2005

the reform program was driven by the following factor; (i) Nigeria banks were small, depended on government or public sector deposits and unable to meet the economy's funding needs. (ii) Banking penetration was low and retail offering were limited. For example deposits in the hands of small business and individuals was 80% of the total currency in circulation, (iii) the narrow scale and scope of services provided by Nigeria banks led to loss of business to foreign banks, (iv) the industry was fragmented and many banks operated as fringes player, (v) corporate government was poor and insider abuse and sharp practices by directors and other related parties were rampant, and (vi) there was a dividing level of confidence in the banking system. Nnanna (2004) concluded that, the banking reforms by the CBN were therefore intended to address these issues and specifically strengthen the Nigerian banking system, with vision to ultimately make Nigeria the financial hub of African and to stem the systematic distress that have played the system, practically reposition Nigerian Banks to compete favourably with foreign banks, encourage consolidation through mergers and acquisition, enhance professionalism in the conduct of banking business, and make the banking system safers and engender depositors confidence. The banking system ha been one of the channels through which government carries out its policy of stabilizing the economy and controlling inflation through the manipulation of some key variable such as interest rate and the quantum of credit, government is able to influence borrowing spending within the economy. These in turn affects employment, produce and price.

3. Methodology

Secondary data was collected from national bureau of statistics and CBN statistical bulletin and the study also considered using annual data, because quarterly data may not be accessed for some of the variables. The GDP 1990 at current market price was employed as the depended variable to measure the rate of economic growth, while aggregate short-term credit; aggregate medium-term credit and aggregate long-term credit were also employed as the independent variables to measure financial intermediation.

4. Model Specification

The study was based on the null hypotheses that, there is no long-run relationship between financial intermediation and economic growth in Nigeria and to ascertain whether unit roots exist among the variables. The study also adopted Juselius (1990) and Johnsen's (1991) multivariate co-integration procedure and the co-integration test is based on vector error correction model (VECM): $\Delta Y_t = \delta o + \Sigma \delta_i \Delta Y_{t-1} + \beta Y_{t-p} + \mu_t$ … (1)

Where, Δ is the first difference operator, Yt represents (ASC AMC, ALC), δo represents the intercept, and μ represents the vector of white noise process. The matrix β consists of r ($r \leq 1$) co-integrating vectors. Matrix contains the error parameters and the Johansen and Juselius co-integration procedure yields two statistics (i.e. maximum eigenvalue and the trace statistics). The study estimates the following VECM to determine the long and short-run dynamics between capital market development and economic growth.

$$\Delta GDP_t = \alpha + \sum_{i=1}^{a} \beta_i \Delta ASC_{t-1} + \sum \beta_i AMC_{t-1} + \sum \beta_i ALC_{t-1} + \beta R_{t-1} \ldots (2)$$

Where Δ stands for difference operator; GDP represent economic growth and financial intermediation variables represent (ASC AMC, ALC), the error correction term assesses the deviations of the variables from the long-run equilibrium association.

5. Estimation Technique

Estimating the VECM proceeds in the following manner, pre-test for stationary, lag-length, and test for co-integration and this is to ensure that the variables are stationary and that shocks are only temporary and will

dissipate and revert to their long-run mean. The tests for stationary or unit roots employed for this study were the Augmented Dickey-Fuller (ADF) test was performed on the variables in levels and first differences. Co-integration requires that all the variables be integrated of the same order and to test for unit roots, we used the ADF to test the null hypothesis of H o: y□=0 in

$$\Delta yt = \beta_o + \beta_{2t} + \delta y_{t-1} + \sum_{t=1}^{b} \alpha, \Delta y_{t-1} + \varepsilon_t \quad \ldots\ldots\ldots\ldots\ldots\ldots\ldots (3)>$$

To examine whether a unit root exist the ADF test assumes the asymptotic normality of the idiosyncratic error term, ε_t, in (3). The choice of lag-length may be decided using Sims likelihood ratio test. The appropriate lag length is important as too many lags reduce the power of the test due to the estimate of additional parameters and a loss of degrees of freedom. In contrast, too few lags may not capture the dynamics of the actual error correction process, resulting in poor estimates of growth and its standard errors.

6. Data Analysis and Results

Table 1: Unit Root Tests Analyses

The ADF Unit Roots test for Stationarity							
Variables		(with constant, no trend)		With Constant and Trend		Order of Integration	Decision
		At Level	First Difference	At Level	First Difference		
GDP		**-3.40472	**-10.75238	**-4.07040	**-10.75640	1(1)	Stationary
ASC		-1.419722	**-4.906493	-2.102723	**-4.964460	1(1)	Stationary
AMC		-1.323973	**-4.174232	-1.988240	**-4.165040	1(1)	Stationary
ALC		-2.545833	**-4.008397	-1.953294	**-4.412462	1(1)	Stationary
Critical values	**1%**	**-3.6289**	**-3.6353**	**-4.2412**	**-4.2505**		
	5%	**-2.9472**	**-2.9499**	**-3.5426**	**-3.5468**		
	10%	**-2.6118**	**-2.6133**	**-3.2032**	**-3.2056**		

Notes: (1)*1% level of significance, **5% level of significance, ***10% level of significance.
(2) The tests accepted at 5% level of significance.
(3) Decision rule -The critical value should be larger than the test statistical value for unit root to exist

Source: E-views Econometrics 7.0.

The tests for stationary of the variables were done using the Augmented Dicker Fuller (ADF) Unit Root Tests and the results in table 1 show that all the variables are integrated of order one, that means that the variable have unit roots i.e. 1(1) at the 5% or 1% level of significance. Hence, we can go ahead to test for co-integration in the equation.

7. Test of Co-integration

The basic idea behind co-integration is that if, in the long-run, two or more variable move closely together, even through the variables themselves are trended, the difference between them is constant. It is possible to regard these variables as defining a long-run equilibrium relationship, as the difference between them is stationary (Ibenta, 2012). Therefore, a lack of co-integration suggests that such variables have no long-run relationship, in principle; they can wander arbitrarily far away from each other (Dicky 1990) and Johnsen (1991) in testing.

Table 2: Co-integration Result

Hypotheses	Eigenvalue	T. Statistics	5% critical Value	Probability value
None **	1.000000	16.4698	95.75366	0.000
Atmost 1 **	0.805363	101.1171	69.81889	0.000
At most 2**	0.660859	60.20159	47.85613	0.0023
At most 3 **	0.586713	33.18286	29.79707	0.0196
At most 4**	0.227212	11.09252	15.49471	0.2059

*(**) denote rejection of the hypothesis at 5% significance level L.R test indicates 5 co integrating equation(s) at 5% level of significance.

Source: E-view Econometrics 7.0

Normalized co-integrating coefficients equation(s): GDP = 0.805ASC + 0.660AMC + 0.586ALC + 0.227.

The Johnsen co-integration test observed four co-integrated equations and the eigenvalue statistics is used to determine whether co-integrated variables exist. Co-integration is said to exist if the values of computed statistics are significant different from as (1.00000, 0.805363, 0.660859, 0.586713 and 0.227212). The likelihood Ratio of GDP, ASC, AMC and ALC are greater than the critical value at both 5% and 1% level of significance. Also, the Eigenvalues of ASC, AMC, ALC are significantly greater than zero, in other words, the null hypothesis of no co-integration among the variables is rejected. Therefore, the test result shows the existence of a long-run equilibrium relationship in four co-integrating variables at 5% significance level and the growth of Nigerian economy is positively affected by financial intermediation variables.

8. Vector Error Correction Model (VECM)

The existence of long-run co-integrating equilibrium provides for short-run fluctuations, in order to straighten out or absolve these fluctuations, an attempt was made to apply the error correction model (ECM). Therefore, ECM is meant to tie the short-run dynamics of the co-integrating equations to their long-run statics dispositions as stated in **table 3,** however the speed at which short-run fluctuations will come to normalcy within a year is the vector error correction.

Table 3: Vector Error Corrections Estimates

Variables	Coefficient	Std Error	T-Statistics	Prob.
RGDP(-1)	2.463680	0.62770	3.92495	0.0000
RGDP(-1)	0.556272	0.624346	.078965	0.0000
C	257448.5	66019.51	3.899582	0.0018
ASC	114.9555	749.8794	0.153299	0.8805
AMC	5606.709	3211.124	-1.746027	0.1044
ALC	0.203038	0.260897	0.7782330	0.4504
ECM(-1)	-0.962357	0.244068	-4.034328	0.0002
R-squared	0.899385	Mean dependent var		92840.06
Adjusted R-squared	0.858426	S.D dependent var		50503.38
S.E of regression	45497.18	Akaike info criterion		24.51882
Sum squared resid	2.69E+10	Schwarz criterion		24.76615
Log likelihood	-215.6694	F-statistic		5.986738
Durbin Watson stat	1.834816	Prob(F-statistic)		0.156018

Source: E-view Econometrics 7.0

The figures from table 3 are quite revealing that, the coefficient estimates of the constant and explanatory

variables have alternated their signs as against the long-run relationship found in the normalized co-integrating equation. This shows exactly what is needed to be done in order to absolve the short run dynamics of relationship. Again, the significance of ECM (-1) holds that a negative and statistically significant error correction model coefficient is a necessary condition for the variables to be co-integrated. In this study, the error correction coefficient is -0.962357. The negative sign of the coefficient satisfies one condition while the fact that 0.899385 is different from zero satisfies the second condition of statistical significance. The coefficient reveals that the speed of adjustment between the short-run and long-run realities of the co-integrating equations is 96% within a year. Also, the computed R^2 value of 0.899385 which is the coefficient of multiple determinations indicates that our model satisfies the requirement for goodness of fit. The value shows that 89% of the total variations in the economic growth (GDP) are adequately explained by changes in financial intermediation variables (aggregate short-term credit, aggregate medium-term credit and aggregate long-term credit). However, this implies that a good portion of economic growth trends in Nigeria is explained by changes in financial intermediation variables. This is also confirms by the F-probability which is statistically zero and finally the value of Durbin -Watson (DW) also indicates the absence of autocorrelation.

9. Conclusion and Recommendations

Obviously, banks utilize a high degree of financial leverage with borrowed funds and the treasury functions of a bank underscores all the techniques that are involved in the sourcing of deposit from the surplus units that would be channeled to the deficit sector of the economy, hence the study reveals the followings: The test for stationarity proves that the variables are integrated in the order which implies that the variables do not have unit roots. There is also long-run equilibrium relationship between economic growth and financial intermediation and the result also confirms about 96% short-run adjustment speed from long-run disequilibrium. The coefficient of determination indicates that about 89% of the variations in economic growth are explained by changes in financial intermediation variables in Nigeria. There is no causality between capital market development and economic growth but, market capitalization and new issues granger causes each other. The study recommends that the monetary authorities should properly control and regulate the activities of the intermediations in order to achieve a sound financial system in the country, and finally, efforts should be made by monetary authorities to check mate banks from possessing excess liquidity that would ensure the prevention of inflation in the economy. The monetary authorities should properly control and regulate the activities of the intermediations in order to achieve a sound financial system in the country. There should be a regulatory frame work that will enable the financial institutions to channel their resources to the most viable sector of the economy. Adequate machinery should also be put in place to ensure the level of compliance as regards to the rules and regulations of the industry, and finally, efforts should be made by the monetary authorities to check mate banks from possessing excess liquidity thus, this would ensure the prevention of inflation in the country.

References

Andabai, Priye .W. (2013). An Unpublished Lecture note on Bank Lending and Loans Administration. Department of Finance and Accountancy. Niger Delta University, Bayelsa State.

Andabai, Priye .W. (2011). Dynamics of Interest Rate Management and its Impact on Money Supply in Nigeria. Advanced University Research Journal, Issue 3, Jan- March.

Andabai, Priye W. (2010). The Role of Banking Institutions and Private Sector Development in Nigeria: An Empirical Analysis between (1993 -2009). International Journal of Economic and Development Issus. Vol. 9, (1 & 2).

Andabai, Priye W. (2010). Deposit Mobilization and Bank Lending in Nigeria: A Critical Appraisal between (1993-2009). International Journal of Investment and Finance. Vol. 3, (1 & 2).

Andabai, Priye W. (2011). Liquidity Preference Theory: A comparison of William Baumol's and James Tobins propositions. International Journal of Economic and Development issues. Vol. 10(1&2).

Andabai, Priye W. (2010). Bank Consolidation and the Performance of Nigerian Economy Between (2004-2009). International Journal of Business and Common Market Studies. Vol. 7, (1 & 2).

Andabai, Priye W. (2011). The Emergence of Banking Sector Reforms and the Nigerian Economy: An In- Depth Analysis (2004-2008). The University Advanced Research Journal. Issue 3, Jan-March.

Abeng, M.O (2006). Financial Sector Reform Outcomes in Nigeria: A Quantitative evaluation. CBN Bullion, Vol. 30(2): 53-69.

Aderibigbe, J.O. (2004). An Overview of Nigerian Financial System. Central Bank of Nigeria Bullion Vol. 25, (1).

Agba, A. V. (2004). Long term Funding Options for Manufacturing Industries in Nigeria. Being a paper Presented at the 45th Annual Conference of the Nigeria economic Society (NES), Abuja.

Agiobenebo, T. J. (1999). Introductory Microeconomics: Theory and Applications. Markowitz Centre for Research & Development, Port Harcourt.

Akpan, Imoh, (2002). Financial Repression Hypothesis: A Feasibility Argument. Journal of Accounting and Management. Vol. 1 (1).

Anyanwu J. C. (1993). Monetary Economics. Theory, Policy and Institution. Hybrid Professional Series 1.

Amadi, S. N. and Akani, W. H. (2005). Interest Rate and Private Domestic Investment in Nigeria (1993-2004). Niger Delta University Press.

Ankintoye, I. R. (2000). Investment Decision: Concepts, analysis and Management. Unique Education Publishers Lagos Nigeria.

Asika, N. (2004). Research Methodology in the behavioral sciences. Ikeja. Longman Nigeria Plc.

Bamisile, A.S. (2004). The Impact of the operations of non- Bank Financial Institution on Finicial Sector Stability CBN Bullion Vol. 28, No. 1 January/March.

Baridam, D. M. (2002). Research Methods in Administration Science. Port Harcourt University Press.

Comptroller Handbook (2000). Loan Portfolio Management and Investment: Concepts and Analysis. Vol. 34(16).

Ezirim, B. C. (2005). Finance dynamics: principles, Applications and Techniques. Markowitz centre for research and development. Port Harcourt.

Ezeuduji F. U. (2002). The Effects of Monetary Policy on the Performance of the Banking Industry in Nigeria. Economic and Finance Review, Lagos, CBN, Vol. 32(3) Sept.

Egoro, Stephen .A. (2009). An Unpublished lecture Note on Investment and Portfolio Management. Department of Finance and Accountancy. Niger Delta University, Bayelsa State.

Fischer, D. E. and Jordan, R. S. (2006). Security Analysis and Portfolio Management. Dorling Kinderley (India) PVT Ltd.

Gbosi, A. N. (2005). Money, Monetary Policy and the Economy. Abiyah Associates Ltd.

Jhingan, M. L. (2004). Microeconomics Theory. Vrinda Publications (P) Ltd., Indian.

Jhingan, M. L. (2004). Money, Banking, International Trade and Public Finance. Vrinda Publication (P) Ltd. Indian.

Koutsoyiannis, A. (2003). Modern Micro-Economics. Macmillan Press, Ltd. London.

Mbat, D. O. (2001). Financial Management. Domes Associates (Publishers) Uyo, Nigeria.

Ndiyo, N. A. & Udah, E.B (2003). A Dynamic Analysis of Monetary Policy and Poverty in a Small open Economy: the Nigerian Experience. Nigerian Journal of Economic and Development Matters, Vol. (1): 40-67.

Nnanna, O.J. (2003). Monetary Management Objectives, Tools and Roles of Central Bank of Nigeria. Central Bank of Nigeria Economic and Financial Review Vol. 33(1), 9-10.

Nzotta, S. M. (2004). Money, Banking & Finance: Theory and Practice. Husdon-Judge Publications Owerri.

Ogwuma, P. A. (2000). The Control of the Monetary and Banking System. The CBN Bulletin, Lagos CBN Vol. 20 (2) April-June.

Olorunfemi, Sola & Dotun, Faloye. (2008). Stationarity Analysis of the Impact of Monetary Policy on the Economic performance in Nigeria. Pakistan Journal of Social Sciences 5(6): 562-566.

Okereke, R. J. (2005). Money and the Nigerian Financial System. Owerri 2nd Ed Jeso International.

Onoh, J. K. (2002). Dynamics of Money, Banking and Finance in Nigeria: An Emerging Market. Astra Meridian Publishers, Aba- Nigeria.

Orsota, F. O. (1992). Interest Rate Behaviour under a programme of Financial Reform: The Nigeria case. Economic and Financial Review, CBN Lagos, Vol. 30, No. 2 June.

Onoh, J. K. (2007). Dimension of Nigeria's Monetary and Fiscal Policies: Domestic and External. Astra Meridian Publishers. Aba.

Siyan, P & Adebayo F.O (2005). An empirically Investigation is Stability and Money Demand in Nigeria (1970- 1999). Nigeria Journal of Economics and development Matters Vol. 4(1):4-19.

Parker, Lee D. (2007). Financial and External Reporting Research: The Broadening Corporate Governance challenges. Accounting and Business, Vol. 37(1).

Patrick, H. (2006). Financial Development and Economic Growth Underdeveloped Countries. Economic Development and Culture. Change. Vol. 14(2)

Rotimi, Ajibola (2005). Banking principles and Practice. B.print Publishing Ltd. Lagos.

Robinson, M. O. (2001). Research Method and Statistics on Economics. Harey Publications Ltd.

Steve, N. O. Ibenta (2012). Research Monograph: Guidelines for Seminar Papers, Theses & Project Reports. 22-28 Regina Caeli Rd, Awka, Anambra State.

Umoetuk, V. A (2006). The role of Commercial Bank Portfolio Investment to the economic growth and development of Nigeria. An unpublished undergraduate project, submitted to the Department of Banking and Finance, University of Calabar.

Uchendu, O. A. (2008). Interest Rate Policy, Savings and Investment in Nigeria. Economic and Financial Review, CBN Lagos. Vol. 31, No. 1 March.

Udoka and Offiong (2006). The Effect of Bank Lending to the Socio-Economic Transformation of Nigeria (1980-2005). *International Journal of Economic and Development Issues.* 6(1&2). 33-48.

Umoh, P. N. (2005). Assets Allocation Approach in the context of Asset/liability Management of Financial institutions. NDIC. Vol. 5(2).

Appendix 1: GDP at Current Market Price and Aggregate Financial Intermediation (1988 to 2013.)

Year	Aggregate Short-Time Credit (ASC)%	Aggregate Medium-Term Credit. (AMC)%	Aggregate Long-Term Credit. (ALC)%	GDP at Current Market Price at (1990)%
1988	1.0	7.15	31.40	0.70
1989	3.0	0.15	25.20	9.90
1990	4.6	1.15	37.10	7.20
1991	6.1	8.25	18.00	8.20
1992	2.6	1.15	10.10	4.76
1993	9.0	5.51	25.00	2.92
1994	9.0	6.14	24.90	2.20
1995	2.3	7.50	59.50	0.10
1996	6.8	5.20	46.60	2.50
1997	8.2	2.35	27.80	4.30
1998	0.9	8.45	14.60	2.70
1999	6.81	4.46	12.43	1.88
2000	7.3	7.54	25.60	1.10
2001	0.9	0.45	32.90	5.40
2002	4.8	9.20	14.80	3.10
2003	2.6	7.15	26.70	1.55
2004	9.5	6.18	12.60	3.30
2005	6.8	0.60	15.50	5.40
2006	6.1	0.90	10.90	6.20
2007	6.0	4.00	10.60	6.45
2008	7.3	4.8	16.50	6.00
2009	4.5	2.50	19.25	6.15
2010	1.7	9.8	14.20	7.80
2011	0.4	5.50	17.80	8.80
2012	2.4	0.50	19.50	7.32
2013	8.4	8.60	37.80	6.67

Sources: i. CBN Statistical Bulletin (Various issues), ii. National Bureau Statistical (Various issues)