Justification and Implication of Macroeconomic Management for Sustainable Development

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Abstract
The study seeks to determine the relationship between macroeconomic management and sustainable development, identify the macroeconomic policy objectives relevant for attaining sustainable development, assess the macroeconomic policy instruments relevant for macroeconomic management, and identify the standard tools of monetary management. The study was carried out primarily through the survey method and interview of employees in five branches of central bank of Nigeria. Secondary data were obtained through books, journals and internet. Findings indicate that there is a significant relationship between macroeconomic management and sustainable development, full employment, price stability, economic growth, and balance of payments surplus are the macroeconomic policy objectives relevant for attaining sustainable development; monetary policy and fiscal policy are the macroeconomic policy instruments relevant for macroeconomic management, open market operation, reserve requirements, interest rate regulation, and credit control are the standard tools of monetary management. The implications of the study is that monetary policy in a developing country plays an important role in increasing the growth rate of the economy by influencing the cost and availability of credit, by controlling inflation and maintaining equilibrium in the balance of payments. Also the use of variable reserve ratio as an instrument of monetary policy is more effective than open market operations and bank rate policy in developing countries.
Keywords: Macroeconomic management, implication, justification, and Sustainable Development

1. Introduction

Macroeconomic policy refers to the instruments by which a government tries to regulate or modify the economic affairs of the country in keeping with certain objectives. It attempts to assess the behaviour of the economy as a whole and to seek ways in which its aggregate performance might be improved. These are achieved through certain instruments and objectives of macroeconomic policy. Its two main instruments are monetary and fiscal policies and its four major objectives are full employment, price stability, economic growth, and balance of payments equilibrium (Jhingan, 1997).

Macroeconomics emphasizes on issues of broad economic base, such as the general price level, inflation, recession (slack), national employment, unemployment, national income, money supply, government budget and spending, balance of payments, economic growth, etc.

 The definition and measurement of macroeconomic aggregates such as Gross National Income (GNP), Consumer Price Index (CPI), the Unemployment rate, Government surplus and deficit budgets are important to macroeconomics.

 Macroeconomic issues affect the microeconomic units. Hence, the households, individuals, and business firms are worried about the effect of inflation and unemployment of factors of production on the economic life of the society. Governments worry about how to reduce inflation, poverty, and unemployment; how to increase the rate of growth, and how to achieve a satisfactory balance of payments. Business firms are concerned about the impact of inflation on their operations, how to increase their productivity and how to adjust during economic recession or slump. Individuals are worried about inflation and unemployment (Ezigbo, 2006). Nigeria's enormous potential for growth has never been in doubt. What has remained a major constraint is the conduct of macroeconomic policies. The nation is fully endowed with abundant human and material resources. But the impact of these resources on the living standard is yet to be felt. Given the dynamic nature of most economies and the associated change, macroeconomic management becomes imperative. Thus, in pursuance of economic prosperity, nations aspire to attain such goals as full employment, price stability, economic growth and development, balance of payment equilibrium, etc. For these goals to be actualized, strategic plans must be mapped out, machinery for their execution set up, and the implementation process monitored. (Ibekwe, 2004).

1.1 Objectives
The study has the following specific objectives.
▪To determine the relationship between macroeconomic management and sustainable development.
▪ To identify the macroeconomic policy objectives relevant for attaining sustainable development
▪ To assess the macroeconomic policy instruments relevant for macroeconomic management
▪ To identify the standard tools of monetary management.

1.2 Hypotheses
These hypotheses were proposed for the study.
H_1 There is a significant relationship between macroeconomic management and sustainable development
H_2 Full employment, price stability, economic growth, and balance of payments surplus are the macroeconomic policy objectives relevant for attaining sustainable development
H_3 Monetary policy and fiscal policy are the macroeconomic policy instruments relevant for macroeconomic management
H_4 Open market operation, reserve requirements, interest rate regulation, and credit control are the standard tools of monetary management.

1.3 Methodology
The study was carried out primarily through the survey method and interview of employees in five branches of central bank of Nigeria. Secondary data were obtained through books, journals and internet. Empirical works of other scholars were consulted. The target population consists of 160 senior staff from the five branches. Since the population is known, and thus represents a particular group, a non probability sample is therefore, used. Thus, the sample size is. The questionnaire was designed in likert scale format. 150 (93.75%) of the questionnaire distributed were returned while 10 (6.25%) of the questionnaire distributed were not returned. The researcher conducted a pre-test on the questionnaire to ensure the validity of the instrument. Data collected were presented in frequency tables. Chi-Square statistical tool and correlation coefficient were used to test the hypotheses.

2. Literature Review
2.1 An Overview of Macroeconomics
Macroeconomics is a branch of economics dealing with the performance, structure, behaviour, and decision making of an economy as a whole, rather than individual markets. This includes national, regional, and global economies. Macroeconomists study aggregate indicators such as GDP, unemployment rate, and price indices to understand how the whole economy functions. Macroeconomists develop models that explain the relationship between such factors as national income, output, consumption, unemployment, inflation, savings, investment, international trade and international finance, http://enwikipedia.org/wiki/macroeconomics.
Thus, Macroeconomics emphasizes on issues of broad economic base such as the general price level, inflation, national income, recession, employment, unemployment, money supply, government budgets and spending, balance of payments, economic growth, interest rate, and exchange rate. "In macroeconomics, we consider all the buyers of a nation's output and call their total desired purchases aggregate demand. We can also consider all the producers of a nation's output and call their total desired sales aggregate supply. Macroeconomics asks what determines these aggregates and how they vary in response to changing conditions, as well as what causes these aggregates to fluctuate" (Ibekwe, 2004). Macroeconomic policy deals with the control over time of the key economic aggregates, especially national income, employment, the price level, and the balance of payments. The welfare of the people in any modern nation depends critically on the state of the macro economy and on the policies of the government of the day. The more complex an economy is, the more complex the nature of the macroeconomic issues it is faced with. In order to fully understand the majority of the decisions of the government in a modern economy, knowledge of macroeconomics is imperative.
Nigeria, in the 1980s had acute economic crisis characterized by falling per capita income, rising inflation, high unemployment, chronic balance of payments disequilibria, and escalating external debt. In 1986, the government adopted the structural adjustment programme (SAP) in a desperate attempt to

combat the grave crisis which clearly threatened the survival of the Nigerian economy. A good understanding of macroeconomics is therefore a prerequisite for a full comprehension of the multifarious aspects of SAP, which has undeniably impacted on the lives of every Nigerian. The same can also be said of many other African countries which were forced to adopt IMF/World Bank inspired Structural Adjustment Programmes in the 1980s. Macroeconomic theory and policy have undergone a far reaching evolution since the Keynesian revolution of 1936. Keynes emphasized the role of aggregate demand and the efficacy of fiscal policy as a valued counter- cyclical tool. Monetarists have also shown the enduring importance of money in macroeconomic analysis. A synthesis has thus been fashioned by the post Keynesian macroeconomists which gives even-handed treatment to fiscal policy and monetary policy as tools for fine-tuning the economy and stabilizing the level of aggregate income or GNP overtime (Iyoha, 2007, cited in Ezigbo, 2010).

2.2 Macroeconomic Policy Objectives
The Macroeconomic Policy Objectives, which most governments strive to attain are full employment, Sustainable economic growth and development, Stable prices, and Balance of payments surplus.

2.2.1 Full Employment
Full employment has been ranked among the foremost objectives of economic policy.
 The wish of governments has been to provide employment to all available capital and human resources. Thus, government does this by making a policy that will provide employment.
A condition of full employment exists if the number of unfilled vacancies is equal to the number of people looking for job (Hanson, 1977). The principal aim of full employment is to eradicate mass unemployment.
According to Keynes, full employment implies the absence of involuntary unemployment. To achieve full employment, Keynes advocated increase in effective demand to bring about reduction in real wages. Keynes further defines full employment as a situation in which aggregate employment is inelastic in response to an increase in the effective demand for its output.
 American Economic Association Committee, see "full employment as a situation where all qualified persons who want jobs at current wage rate find full-time jobs". It does not mean unemployment is zero. According to the view expressed by the U.N. experts on National and International Measures for Full Employment: "full employment may be considered as a situation in which employment cannot be increased by an increase in effective demand, and unemployment does not exceed the minimum allowances that must be made for the effects of frictional and seasonal factors". This definition is in keeping with the Keynesian and Beveridgian views on full employment. It is now agreed that full employment stands for 96 to 97 percent employment, with 3 to 4 percent unemployment existing in the economy due to frictional factors. For achieving full employment, a judicious mix of monetary-fiscal policies is used (Jhingan, 1997).

2.2.2 Sustainable Economic Growth and Development
Economic growth is defined in terms of an increase in a nations output of goods and services as measured by the gross domestic product (GDP). Economic development encompasses growth, that is, structural, and institutional changes and essential elements that make for a better quality of life, such as education, health, nutrition, and a better environment. Nevertheless, economic growth is particularly the result of capital accumulation as it is generally accepted that more capital goods will be required if there is to be growth. If all gross investments are devoted to depreciation of capital thus merely keeping the existing capital stock intact, there will be no net investment and therefore no basis for economic growth. The essential ingredient for growth is therefore net investment or the excess of gross investment over depreciation. Despite the fact that capital accumulation is basic to growth, there are some other complementary factors directly or indirectly linked with capital formation for growth to take place. The factors are improved technology, manpower development, and adequacy of infrastructure, favourable economic environment, security, and political stability.
 Economic growth is measured in terms of the level of output of goods and services and the employment of available factors of production. On the long run, economic growth is the most important force for raising living standards. The gross domestic product (GDP) serves as a measure of economic growth and living standard of the people. Government strives to achieve sustainable growth

and development in order to enhance the nation's image and status as well as to attract both foreign and local investors to invest in the country and thereby enhance even economic development of the country.

Generally, economists believe in the possibility of continual growth. This belief is based on the presumption that innovation tend to increase productive technologies of both capital and labour over time. But there is likelihood that an economy might not grow despite technological innovations: production might not increase further due to the lack of demand which may retard the growth of the productive capacity of the economy. The economy may not grow further if there is no improvement in the quality of labour in keeping with the new technologies. Nevertheless, rapid growth leads to urbanization and industrialization with their adverse effects on the pattern of living and environment. Monetary and fiscal policies contribute towards growth by helping to maintain stability of prices; by moderating economic fluctuations and avoiding recession (Jhingan, 1997).

2.2.3 Stable Prices

One of the macroeconomic policy objectives is to stabilize the price level. Both economists and laymen favour this policy because fluctuations in prices bring uncertainty and instability to the economy. Rising and falling prices are both bad because they bring unnecessary loss to some and undue advantage to others: So a policy of price stability keeps the value of money stable, eliminates cyclical fluctuations, bring economic stability, helps in reducing inequalities of income and wealth, secures social justice and promotes economic welfare. Every government desires a stable economy which refers to a situation where there is market equilibrium, that is, prices are neither falling nor rising. Government seeks to achieve stable prices so as to maintain a high purchasing power for its currency which facilitates social, political, and industrial harmony. A policy of price stability keeps the value of money stable, eliminates cyclical fluctuations, brings economic stability, help in reducing inequalities of income and wealth.

According to Jhingan, 2003, the studies of Philips, Samuelson, and Solow in the 1960s established a conflict between full employment and price stability. They suggest that full employment can be attained by having more inflation and that price stability can be achieved by having unemployment to the extent of 5 to 6 percent. Economists do not find any conflict between unemployment and price stability. They hold that so long as there are unemployed resources, there will be price stability.

2.2.4 Balance of Payments Surplus

A balance of payments surplus means that the central bank of a country is adding to its foreign exchange reserve holdings. To achieve a balance of payments surplus require achieving the other macroeconomic goals of employment, price stability, and economic growth. But these variables that affect the balance of payments are in conflicts. There is an inverse relationship between employment and inflation. For example, to achieve a balance of payments surplus requires anti-inflation measures which could worsen an unemployment situation. Hence full employment may be achieved only at the expense of rapidly rising prices (inflation), or a balance of payments surplus may result in an unacceptable level of unemployment (Ezigbo, 2006). A deficit in the balance of payments implies an excess of expenditure over income. A deficit in the balance of payments of a country can be removed with restrictive monetary and fiscal policies, by reducing imports and encouraging exports, and by devaluation of the currency: To correct a deficit in the balance of payments, expenditure and income should be brought into equality. Expenditure-reducing policies aim at reducing aggregate demand through higher taxes and interest rates thereby reducing expenditure and output. The reduction in expenditure and output, in turn, reduces the domestic price level. This gives rise to switching of expenditure from foreign to domestic goods. Consequently, the country's imports are reduced. Expenditure-switching policies aim at increasing the demand for domestic goods and to change expenditure from imported goods to domestic goods. Such expenditure-switching increases domestic output. So long as the marginal propensity to spend is less than unity, it will improve the country's balance of payments (Jhingan, 1997).

2.2.5 Other Relevant Economic Goals for Developing Nations Include:

• Debt management: managing external and internal debt to avoid serious debt servicing problems.

•Equitable distribution of income: promoting a more equitable distribution of opportunity, income, and wealth.
Provision of basic needs: meeting the needs of the generality of the citizens for the essentials of life, particularly, food, clothing, and shelter.
•Environmental protection: promoting the rapid growth of a diversified and self reliant economy while safeguarding the environment (Iyoha, 2007).

2.3 Macroeconomic Management

There is no doubt that government can exert a significant influence on economic affairs. Lipsey (1989) identifies two macroeconomic tools of demand management as fiscal policy and monetary policy. Fiscal policy seeks to influence demand through government budget. The main thrust of monetary policy is to ensure price stability as a basis for promoting sustainable growth. Monetary policy and fiscal policy constitute the principal instruments of macroeconomic management not for the developing countries of Africa, Asia, and Latin America but also for the advanced industrialized nations of the world.

2.3.1 Fiscal Policy

Fiscal policy involves the adjustment of tax rates and/ or government spending so as to affect the aggregate demand and the economy as well. Fiscal policy can be expansionary or contractionary. It is expansionary or loose when taxation is reduced or public spending is increased with the aim of stimulating total spending in the economy, known as aggregate demand. Expansionary policy might occur when a government feels its economy is not growing fast enough or unemployment is too high. By increasing spending or cutting taxes, the government leaves individuals and businesses with more money to purchase goods or invest in new equipment. When individuals or firms increase their purchases, they raise demand, which requires additional production, creating jobs and generating more spending. The result is higher employment and a growing economy. On the other hand, fiscal policy is contractionary or tight when taxation is increased or public spending is reduced in order to restrict demand and slow down the economy. A tight fiscal policy is more likely when inflation is high. A contractionary fiscal policy reduces the amount of money in the economy available for purchasing goods, thus decreasing spending, demand, and ultimately, pressure on prices.

 An important decision a government must make regarding fiscal policy is whether or not to run a budget deficit; by spending more money than the government raises. Deficits can be financed in two ways: borrowing or printing more money .If the government borrows money, it will decrease the supply of money available in the economy for lending; and the cost of borrowing money, the interest rate may rise. If the government prints more money, it will increase the supply of money in the economy without a corresponding increase in available goods; prices, and inflation is likely to rise (Microsoft @ Student 2008). The tax systems in African countries are generally rather inflexible, the tax base is narrow, and tax administration is weak. Thus, emphasis in African countries tends to be placed on changes in government spending. Also because money and capital markets in African countries are underdeveloped, budget deficits tend to be financed not primarily through domestic borrowing but by printing money. This often results in inflation and invariably creates an umbilical cord between fiscal and monetary policy: monetary policy is generally subordinated to the dictates or imperatives of fiscal policy (Iyoha, 2007).

2.3.2 Monetary policy

The central bank has a primary responsibility of formulating monetary policy. A monetary policy deals with the discretionary control of money supply by the monetary authorities so as to achieve stated or desired economic objectives. The effectiveness of any central bank in executing its functions hinges crucially on its ability to promote monetary stability. Price stability is indispensable for money to perform its role of medium of exchange, store of value, standard of deferred payments and unit of account. Attainment of monetary stability rests on a central bank's ability to evolve effective monetary policy and to implement it efficiently.
In practice, implementation is often difficult because of conflicting conceptual issues and constraints. Standard tools of monetary management applied by the central bank include open market operation (OMO), reserve requirements (cash, liquid assets, and supplementary reserves) interest rate regulation,

direct, and selective credit control, variable discount rate, and moral suasion. Specifically, liquidity management by the central bank involves the routine control of the level of liquidity in the system in order to minimize fluctuations in banks' reserve balances. Periodically, the central bank determines target growth rates of money supply which are compatible with overall policy goals. The central bank of Nigeria has relied mainly on OMO since June 30, 1993 for liquidity management, primarily to control banks' reserves (OJo, 2003).

Monetary policy can be expansionary or restrictive. Expansionary monetary policy is used to overcome a recession or a depression. When there is fall in consumer demand for goods and services, a deflationary gap emerges. The central bank starts an expansionary monetary policy that eases the credit market conditions and leads to an upward shift in aggregate demand. For this purpose, the central bank purchases government securities in the open market, lowers the reserve requirements of member banks, lowers the discount rate and encourages consumer and business credit through selective credit measures. By such measures, it decreases the cost and availability of credit to the money market, and improves the economy. Restrictive monetary policy is used to overcome an inflationary gap. The economy experiences inflationary pressures due to rising consumers' demand for goods and services and there is also boom in business investment. The central bank starts a restrictive monetary policy in order to lower aggregate consumption and investment by increasing cost and availability of bank credit. It might do so by selling government securities in the open market, by raising reserve requirements of member banks, by raising the discount rate, and controlling consumers and business credit through selective measures. By such measures, the central bank increases the cost and availability of credit in the money market and thereby controls inflationary pressures (Jhingan, 1997).

Fiscal and monetary policy may be supplemented with the remaining four instruments: income policy, commercial policy, exchange rate policy, and debt management strategy- as the need arises and depending on the particular circumstances in a country. Thus, a country with a huge external debt like Nigeria, the Philippines, Mexico or Brazil, needs a coherent debt management strategy. This will involve issues such as what proportion of strange exchange revenues to earmark for debt servicing; weather or not to negotiate debt rescheduling, and weather or not to adopt debt conversion schemes like debt- equity swaps, etc.

Exchange rate policy concerns the decision as to the exchange rate system a particular country should adopt- a fixed exchange rate system, with nominal anchor or a floating (flexible) exchange rate system. If a country opts for a fixed exchange system, it still has to decide what to fix its currency to-the U.S dollar, the Special Drawing Rights (SDR), or some other basket of currencies. It also has to decide on the parity of the currency and how adjustable the peg will be. If a country opts for a flexible exchange rate, it has to decide what type of float to adopt- clean or dirty, etc.

Commercial policy refers to measures such as tariff and non tariff barriers to trade: imposition of quotas, import licensing, foreign exchange control and banning.

Commercial policy is particularly important for many developing countries which are highly dependent on international trade: the exportation of primary products and the importation of consumer goods, capital goods, and intermediate products, and technology.

Incomes policy encompasses a wide range of measures including wage and price controls or guidelines, interest, profit and dividend restraints. Incomes policy is used to combat the new kind of inflation (cost- push inflation). Since this type of inflation is not caused by excess demand, control of aggregate demand through orthodox fiscal and monetary policy will be of little or no avail in effectively combating it. The case for supplementing the two major instruments (Fiscal and Monetary policy) with the four remaining ones is especially strong in developing countries of Africa where orthodox fiscal policy and monetary policy are not as effective as they are in advanced industrialized economies or even other developing countries of Asia, and Latin America. The fact of the matter is that the economies in sub-Saharan Africa suffer from structural bottlenecks and rigidities which militate against the effectiveness and efficiency of fiscal policy and monetary policy (Iyoha, 2007 cited in Ezigbo,2010).

2.4 Barriers to Monetary Policy
These are some underlying factors militating against the effectiveness of monetary policy over time in Nigeria.

•The mandatory financing of the huge fiscal deficits of the government has made monetary control, price, exchange and interest rates stability difficult to achieve.

•The prevalence of policy inconsistency and instability has made monetary policy outcomes to diverge from targets.

•The lapses in policy co-ordination and implementation have impacted negatively on the productive sectors.

The pervasive intervention by governments in the financial sector has often sent conflicting signals to the public, especially when there was no coordinating arrangement to guide the actions of the regulatory authorities (Ogwuma, 1994).

3. Data Analysis and Interpretation

This section presents the analysis of data collected in the course of this study. Data were presented in tables for analysis. Hypotheses were tested by correlation coefficient and chi square test statistics using SPSS.

Table 1: What is the Relationship Between Macroeconomic Management and Sustainable Development

S/N		AGREEMENT	DISAGREEMENT	TOTAL
1	There is a significant relationship between macroeconomic management and sustainable development	130 (80)	20 (70)	150
2	There is no significant relationship between macroeconomic management and sustainable development	30 (80)	120 (70)	150
Total		160	140	300

Source: Field Survey, 2012.

H_1 : There is a significant relationship between macroeconomic management and sustainable development

Table (2) Descriptive Statistics

	Mean	Std. Deviation	N
Macroeconomic management	1.4667	.72043	150
Sustainable development	2.0667	.88740	150

Table (3) Correlations Matrix

		Macroeconomic	Sustainable development
Macroeconomic management	Pearson Correlation	1	.833(**)
	Sig. (2-tailed)		.000
	N	150	150
Sustainable development	Pearson Correlation	.833(**)	1
	Sig. (2-tailed)	.000	
	N	150	150

Source: SPSS WIN 15:00 version output.

Table 2 shows the descriptive statistics of macroeconomic management and Sustainable development. With a mean response of 1.4667 and std. deviation of .72043 for macroeconomic management and a mean response of 2.0667 and std. deviation of .88740 for Sustainable development and number of respondents (150); by careful observation of standard deviation values, there is not much difference in terms of the standard deviation scores. This implies that there is about the same variability of data points between the dependent and independent variables.

Result of Testing Hypothesis 1

Table 3 is the Pearson correlation coefficient for Macroeconomic management and Sustainable development. The correlation coefficient shows 0.833. This value indicates that correlation is significant at 0.05 level (2tailed) and implies that there is a relationship between Macroeconomic management and Sustainable development (r = .833). The computed correlations coefficient is greater than the table value of r = .195 with 148 degrees of freedom (df. = n-2) at alpha level for a two-tailed test (r = .833, p< .05). Thus, since the computed r = .833, is greater than the table value of .195 we reject the null hypothesis and accept the alternate hypothesis which states that there is a significant relationship between Macroeconomic management and Sustainable development (r =.833, P<.05).

Table (4) What are the Macroeconomic Policy Objectives Relevant for Attaining Sustainable Development

S/N		AGREEMENT	DISAGREEMENT	TOTAL
1	Full employment which stands for (96- 97%)	142 (116.3)	08 (33.8)	150
2	Sustainable economic development	140 (116.3)	10 (33.8)	150
3	Price stability	135 (116.3)	15 (33.8)	150
4	Balance of payments surplus	138 (116.3)	12 (33.8)	150
Total		465	135	600

Source: Field Survey, 2012

H_2: **Full employment, price stability, economic growth, and balance of payments surplus are macroeconomic policy objectives relevant for attaining sustainable development**.

Table (5) Chi-Square Tests Computed from the Frequency Cross Tabulation

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	394.134(a)	8	.000
Likelihood Ratio	347.941	8	.000
Linear-by-Linear Association	26.682	1	.000
N of Valid Cases	600		

Source: SPSS Version 15.00.

Table 5 presents the output of the computed Chi-Square values from the cross tabulation statistics of observed and expected frequencies with the response options of agree and disagree based on the responses of the research subjects from central bank of Nigeria. Pearson Chi-Square computed value (X^2_c= 394.134) is greater than the Chi –Square tabulated value (X^2_t =15.51) with 8 degrees of freedom (df) at 0.05 level of alpha (X^2_c =394.134, p, < .05)

Decision Rule

The decision rule is to accept the alternate hypothesis if the computed Chi- Square value is greater than tabulated Chi-Square value otherwise accept the null hypothesis.

Result of Testing Hypothesis 2

Since the Pearson Chi- Square computed X^2_c= 394.134 is greater than Chi- Square table value X^2_t =15.51, the null hypothesis is rejected and alternate hypothesis is accepted. Thus, we conclude that full employment, price stability, economic growth, and balance of payments surplus are macroeconomic policy objectives relevant for attaining sustainable development.

Table (6) What are the Macroeconomic Policy Instruments Relevant for Macroeconomic Management

S/N		AGREEMENT	DISAGREEMENT	TOTAL
1	Monetary policy deals with discretionary control of money supply	145 (142.5)	05 (7.5)	150
2	Fiscal policy involves the adjustment of tax rates and government spending so as to affect the aggregate demand and the economy	140 (142.)	10 (7.5)	150
Total		285	15	300

Source: Field Survey, 2012.

H_3: monetary policy and fiscal policy are the macroeconomic policy instruments relevant for macroeconomic management

Table (7) Chi-Square Tests Computed from the Frequency Cross Tabulation

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	165.432(a)	9	.000
Likelihood Ratio	175.424	9	.000
Linear-by-Linear Association	16.512	1	.000
N of Valid Cases	300		

Source: SPSS Version 15.00.

Table 7 presents the output of the computed Chi-Square values from the cross tabulation statistics of observed and expected frequencies with the response options of agree and disagree based on the responses of the research subjects from central bank of Nigeria. Pearson Chi-Square computed value (X^2_c= 165.432) is greater than the Chi –Square tabulated value (X^2_t=16.92) with 9 degrees of freedom (df) at 0.05 level of alpha (X^2_c=165.432, p,< .05)

Decision Rule

The decision rule is to accept the alternate hypothesis if the computed Chi- Square value is greater than tabulated Chi-Square value otherwise accept the null hypothesis.

Result of Testing Hypothesis 3

Since the Pearson Chi- Square computed X^2_c= 165.432 is greater than Chi- Square table value X^2_t =16.92, the null hypothesis is rejected and alternate hypothesis is accepted. Thus, we conclude that

monetary policy and fiscal policy are the macroeconomic management policy instruments relevant for macroeconomic management.

Table (8) What are the Standard Tools of Monetary Management

S/N		AGREEMENT	DISAGREEMENT	TOTAL
1	Open market operation: the buying and selling of government securities in the open market	146 (135)	04 (15)	150
2	Reserve requirements that require commercial banks to keep certain percentage of their demand deposit liability with the Central bank.	137 (135)	13 (15)	150
3	Interest rate regulation	132 (135)	18 (15)	150
4	Direct and selective credit control	125 (135)	25 (15)	150
Total		540	60	600

Source: Field Survey, 2012.

H_4: Open market operation. Reserve requirements, interest rate regulation, and credit control are the standard tools of monetary management.

Table (9) Chi-Square Tests Computed from the Frequency Cross Tabulation

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	314.308(a)	12	.000
Likelihood Ratio	309.829	12	.000
Linear-by-Linear Association	6.434	1	.011
N of Valid Cases	600		

Source: SPSS Version 15.00.

Table 9 presents the output of the computed Chi-Square values from the cross tabulation statistics of observed and expected frequencies with the response options of agree and disagree based on the responses of the research subjects from central bank of Nigeria. Pearson Chi-Square computed value (X^2_c = 314.308) is greater than the Chi –Square tabulated value (X^2_t =21.03) with 12 degrees of freedom (df) at 0.05 level of alpha (X^2_c =314.308, p,< .05)

Decision Rule
The decision rule is to accept the alternate hypothesis if the computed Chi- Square value is greater than tabulated Chi-Square value otherwise accept the null hypothesis.

Result of Testing Hypothesis 4
Since the Pearson Chi- Square computed X^2_c = 314.308 is greater than Chi- Square table value X^2_t =21.03, the null hypothesis is rejected and alternate hypothesis is accepted. Thus, we conclude that open market operation, Reserve requirements, interest rate regulation and credit control are the standard tools of monetary management.

4. Conclusions
Central bank's effectiveness in executing its functions depends on the ability to promote monetary stability. Attainment of monetary stability depends on the central bank's ability to evolve effective monetary and fiscal policies and to implement them efficiently. To achieve sustained macroeconomic stability and growth, the CBN needs greater autonomy. Monetary and fiscal policies contribute towards growth by helping to maintain stability of prices, by moderating economic fluctuations and avoiding recessions, these policies help in achieving the growth objective. Since rapid and variable

rates of inflation discourage investment and adversely affect growth, these policies help in controlling hyper- inflation.

Monetary policy in a developing country plays an important role in increasing the growth rate of the economy by influencing the cost and availability of credit, by controlling inflation and maintaining equilibrium in the balance of payments. The use of variable reserve ratio as an instrument of monetary policy is more effective than open market operations and bank rate policy in developing countries: since the market for securities is very small, open market operations are not successful. But a rise or fall in the variable reserve ratio by the central bank reduces or increases the cash available with the commercial banks without affecting adversely the prices of securities. Again, the commercial banks keep large cash reserves which cannot be reduced by an increase in bank rate or sale of securities by the central bank. The use of variable reserve ratio has certain limitations in developing countries: The non-bank financial intermediaries do not keep deposits with the central bank so they are not affected by it. Second, banks which do not maintain excess liquidity are more affected than those who maintain it.

A policy of high interest rate in a developing country also act as incentive to higher savings, develops banking habit, and speed up the monetization of the economy which is essential for capital formation and economic growth. A high interest rate policy is also anti- inflationary in nature, for it discourages borrowing and investment for speculative purposes, and in foreign currencies. Certain economists favour a low interest rate policy in developing countries because high interest rate discourages investment. But empirical evidence suggests that investment in business and industry is interest-inelastic in developing countries because interest forms a very low proportion of the total cost of investment. Despite these opposite views, it is advisable for the monetary authority to follow a policy of discriminately interest rate- charging high interest rates for non- essential and unproductive uses and low interest rates for productive uses.

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