

AN EMPIRICAL STUDY OF POVERTY IN CALABAR AND ITS ENVIRONS.

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ABSTRACT

The aim of this study is to empirically identify and analyse the determinants of poverty in Calabar and its environs. Ordinary least squares linear regression technique was used to evaluate the extent of impact of variables such as income, educational status, age, occupational status of heads of households and household size on poverty in five different zones of Calabar and its environs. The study was carried out using structured questionnaires served on 500 heads of household to generate primary data. Based on the results, lack of or inadequate income and large household size were found to be responsible for the level of poverty being witnessed in Calabar and its environs. The low values of adjusted R^2 as revealed by the results suggest that there are other macroeconomic variables that actually account for the poverty level in Calabar which were not included in the model. However, using two-thirds of per-capita consumption expenditure as a basis for measuring poverty in all the zones, 60 per cent of households living in Calabar and its environs could be said to be suffering from poverty. Policy measures to enhance increase in income, promotion of income earning opportunities and reduction of household size are among the measures advocated.

KEY WORDS: Poverty, Dependency Ratio, Occupational Status; Urbanization

INTRODUCTION

Poverty in Nigeria did not become an issue of great concern until after the oil glut of the 1980s when international oil prices crashed, with the resultant economic slump. The Nigerian economy began to experience severe recession from the early 1980s and as a result of which she moved from a middle level income and a developing industrial nation to become one of the poorest nations in the world (CBN, 2001). Specifically, these trends are manifested in a steady decline in total factor productivity and in real average family income in the rural and urban areas. The decline in GDP had its effect on the level of poverty in the country. At 1987 factor cost, it was at an average annual rate of 1.8 per cent between 1981 and 1985 with a slight increase by only 2.28 per cent in 1992. It was 2.28 per cent in 1993 and 1.3 per cent and 3.25 per cent in 1994, 1995 and 1996 respectively. Stagnation in agricultural and industrial production, increase in the rate of unemployment, decline in per capita consumption by 1 per cent, increase in the rate of inflation from 45 per cent in 1992 to about 75 per cent in 1994, with its attendant negative consequences on consumers real income, are some of the indicators of poverty in Nigeria (UNDP, 1997).

The United Nations Development Programme, using its human development index (HDI), ranked Nigeria 151 in 2002 among 177 countries listed (UNDP, 2004). The incidence of poverty by geopolitical zones

indicated that between 1985 to 1997, the incidence of poverty rose from 53.2 per cent to 68.0 per cent in the North East, 48.4 per cent to 62.0 per cent in the North West, 48.4 per cent to 53.0 per cent in the middle belt, 30.9 per cent to 79.5 per cent in the South East, 42.0 per cent to 74.1 per cent in the South West and 38.0 per cent to 78.6 per cent in the South South, of which Calabar, our study area, is a major component (Aliakpajak and Pyke, 2003).

Besides the above disheartening scenario, a report published by the National Bureau of Statistics (NBS) on the Millennium Development Goals (MDGs), presented on Table 1 reveals that national poverty in Nigeria has been steadily rising over the years. For instance in 1980 the national poverty stood at 28.1 per cent of the total population, rising to its highest level of 65.6 percent in 1996. However, by 2004 it dropped to 54.4 per cent. Regional poverty figures also showed the same trend of a steadily rising incidence of poverty. Specifically, the table shows that the region worst hit by poverty is the Northern part of the country: in 1980 the North West assumed the highest rate of 37.7; in 1985 and 1992 the North East consistently took the lead by posting a poverty rate of 54.9; in 1996 the North West, 77.2; while in 2004 the North East again, for the third time assumed notoriety of being the region with the highest incidence of poverty by posting a rate of 72.2 percent.

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TABLE 1: POVERTY PROFILE FOR NIGERIA
(PERCENTAGE OF POOR PEOPLE IN THE TOTAL POPULATION)

YEAR	1980	1985	1992	1996	2004
NATIONAL	28.1	46.3	42.7	65.6	54.4
GEOPOLITICAL ZONES					
North East	35.6	54.9	54.9	70.1	72.2
North West	37.7	52.1	36.5	77.2	71.2
North Central	32.2	50.8	46.0	64.3	67.0
South East	12.9	30.4	41.0	53.5	26.1
South West	13.4	38.6	43.1	60.9	43.0
South South	13.2	45.7	40.8	58.2	35.1
SECTOR					
Urban	17.2	37.8	37.5	58.2	43.2
Rural	28.2	51.4	46.0	69.3	63.3
GENDER OF HEAD OF HOUSEHOLD					
Male	29.2	47.3	45.1	66.4	NA
Female	26.9	38.6	39.9	58.5	NA
SIZE OF HOUSEHOLD					
1 Person	2.0	70.0	29.0	13.1	12.6
2-4 Person	8.8	19.3	19.3	59.3	39.3
5-9 People	30.0	50.5	51.5	74.8	57.9
10-20 People	51.0	71.3	66.1	88.5	73.3
More than 20 People	80.9	74.9	93.3	93.6	90.7
EDUCATION OF HEAD OF HOUSEHOLD					
None	30.2	51.3	46.4	72.6	68.7
Primary	21.3	40.6	43.3	54.4	48.7
Secondary	7.6	27.2	30.3	52.0	44.3
Post Secondary	24.3	24.3	25.8	49.2	26.3

Source: Adapted from the National MDGs Report 2005, National Bureau of Statistics 1999, 2005 and NEEDS, 2004.

The discomfort index has been on the increase from 18.7 in 1970 to 59.9 in 1993 (Federal office Statistics, 1996). Unfortunately, all these statistical facts are not economic abstractions but they are human conditions. The emphasis on poverty alleviation and eradication programme had been misplaced from the target population. Rather huge expenditure is incurred without performance. Perhaps this may have its roots in a dysfunctional conceptualization of poverty. Poverty itself is problematic and complex in terms of definition and its determinants. The incidence of poverty is somewhat becoming a daily phenomenon with the increasing rate of urbanization in Calabar. Therefore, an empirical study of poverty in Calabar and its environs with emphasis on the identification of its determinants and or causes is necessary. The rest of the paper is organized in the following order. The next section reviews relevant literature and the theoretical underpinnings of the paper, while section three outlines the methodology. Sections four and five deal with model specification and analysis of result respectively. The last section concludes the paper.

Review of related/empirical literature and theoretical framework.

There are many issues involved when looking at the causes of poverty. Some are fundamental while others are not. The Federal office of Statistics in its publication, "Socioeconomic profile of Nigeria"(1996), was definite in categorizing the causes of poverty in

Nigeria into problems of access and endowments, such as: inadequate access to employment opportunities for the poor, inadequate access to the means of fostering rural development in poor regions, inadequate access to education, health, sanitation and water services, the destruction of the natural resources endowments, inadequate access to assistance by those who are victims of transitory poverty and inadequate involvement of the poor in the design of development programmes. Aliyu (2001) submits that Nigeria has in the recent times assumed an unenviable position of the most corrupt country in the world. Corruption has not only been institutionalized but it has also assumed a national dimension. This accounts for the reason why efforts so far made for alleviating poverty has not yielded much results, as through it, the bulk of the nation's wealth have been distributed in favour of the few privileged to the detriment of the majority of Nigerians who continually wallow in abject poverty. Aku et al (1997), as quoted by Ndiyo and Udah (2003), made it clear that Nigeria is a case of two pools of desperately poor people and a few rich ones. It is pathetic that majority of its citizens are living in a state of destitution, while the remaining relatively insignificant minority are wallowing in affluence. This skewed economic relation does not reflect the geographical spread of resources in the country. Rather it is a product of classic greed, injustice, and selfishness which sometimes defy basic economic principles. Ali (1992), Shah(2001), and Obadan (2001) all attributed the deepening and widening of poverty in

Africa to the structural adjustment programme of the international monetary fund (IMF) and the World bank. This is because the adjustment policies lacked emphasis on development and also indirectly encouraged the problems of income inequality, shelter, health and other necessities.

The far reaching causes of poverty are domestically based. These include inadequate production and income, lack of access to employment opportunities, poor quality of labour force, low level of technology, inefficient use of resources, locational disadvantage, wars and natural disasters and the lack of access to credit and other productive resources. Others argue that poverty in Nigeria, specifically in urban areas, dictate living in poverty, overcrowded and substandard housing with little or no access to water supply, inadequate and poorly maintained sanitation, a universal deficiency of sewage-disposal facilities, irregular supply of electricity, poor/over-crowded road networks, chaotic and sometimes fatal systems of mass transit. Above all, deficient management of the urban infrastructure which includes poor waste management is

adding to increased levels of poverty. (Okuneye, 2001; Aliakpajak and Pyke, 2003). In a nutshell, the determinants of poverty in Nigeria are crisscrossed or intertwined as can be deduced from the literature reviewed.

Methodology

A cross-sectional survey of households in Calabar was carried out. Samples of the population under study were drawn from the entire population of study from which inferences and determination of the incidences of poverty in Calabar were obtained. In order to achieve the objective of this study, five hundred (500) structured questionnaires were personally administered in the five (5) sub-zones of Calabar and its environs. These five sub-zones are : 8 miles, Ikot Ansa, Mbukpa, Henshaw Town and Anantigha zones. The questionnaires were designed in such a way as to capture the relevant information concerning the variables under study. The questionnaire was divided into four sections, namely, a, b, c and d which is the demographic, socio-economic, occupational and government policy imperative respectively. This enhanced the use of econometric procedure (ordinary least squares) to determine the extent of impact of each independent variable on poverty (the dependent variable).

Model Specification

A poverty model that reflects the household poverty features in Calabar was formulated. Thus, the regression function/model is:

$$POV = f(Y, HS, AGE, ED, OS)$$

Where:

POV = Poverty measured in terms of expenditure on food and basic necessities. In determining those that were poor, a relative poverty line was set at two-third of per-capita consumption expenditure per household. (The World Bank uses this).

Y = Income of household heads or individuals in naira

HS = Household size (dependency level) in number.

AGE = Age of household head in years.

ED = Educational status of the household head (None=1, primary=2, secondary=3, tertiary=4).

OS = Occupational status of the household heads (Higher status = 0, lower status = 1).

The econometric model is as shown below:

$$POV = a_0 + a_1Y + a_2HS + a_3AGE + a_4ED + a_5OS + U$$

Apriori = $a_1, a_4,$ and $a_5 < 0$; a_2 and $a_3 > 0$.

Where: U = stochastic term; a_0 = constant term; a_1 to a_5 = parameter estimates.

Empirical Results

8-Miles poverty equation regression results

$$POV = 1.03386 - 0.00054Y + 0.0893HS - 0.00289AGE - 0.00289ED - 0.0247OS$$

$$(4.451)** (-5.967)** (3.621)** (-0.575)* (0.663)* (-0.256)*$$

Adjusted $R^2 = 0.330$ F-ratio (5,77) = 9.079 DW = 1.768

Anantigha poverty equation regression results

$$POV = 8104.25 - 0.09279Y + 0.08562HS + 0.30399AGE - 0.38833ED - 0.14933OS$$

$$(2.691)** (-1.052)* (1.068)* (3.149)** (-0.834)* (-1.444)*$$

Adjusted $R^2 = 0.153$ F-ratio (5,81) = 4.108 DW = 2.169

Henshaw Town poverty equation regression results

$$POV = 0.87486 - 0.00050Y + 0.07246HS - 0.03284AGE + 0.01747ED - 0.09102OS$$

$$(3.846)** (-5.738)** (3.189)** (0.662)* (0.355)* (0.843)*$$

Adjusted $R^2 = 0.28$ F-ratio (5,79) = 7.510 DW = 1.746

Ikot Ansa poverty equation regression results

$$POV = 0.83375 - 0.00051Y + 0.07334HS - 0.02397AGE + 0.02828ED - 0.09777OS$$

Adjusted R ² = 0.297	(3.6297)**	(-5.524)**	(3.238)**	(-0.484)*	(0.577)*	(-0.896)*
	F-ratio (5, 75) = 7.761					
	DW = 1.786					
Mbukpa poverty equation regression results						
POV = 0.85811	- 0.00015Y	+ 0.07127HS	+ 0.00294AGE	- 0.03863ED	+ 0.05507OS	
	(4.813)**	(-2.205)**	(0.299)*	(0.327)*	(-0.078)*	(0.658)*
Adjusted R ² = 0.0402	F-ratio (5, 77) = 1.687					
	DW = 1.821					

Note: The figures in parentheses directly below the co-efficients are the t-values.

** = Statistically significant at 5% level.

* = Statistically insignificant at 5% level.

In a nutshell, the manner of consistency of these variables with economic theory and statistical significance in the different zones demand a systematic policy formulation and implementation to effectively tackle poverty in Calabar and its environs. From the estimated regression results in the various zones, the claim that all the variables specified in the various equations are in their own various ways contributing to the existence of poverty in Calabar is still at this point not rejected. That is because the estimated coefficients are at some points in the poverty equations of the various zones consistent with economic theoretical expectations. Basically, the coefficients of income of household head and household size are the most consistent with economic theory and the most significant statistically in almost all the zones. This means that a proper poverty alleviation measures in Calabar must target these two variables. Also, the low value of the

adjusted R² in the sets of regression results in all the zones imply that there exist other very important variables that determine poverty in Calabar and its environs than the explanatory variables specified in the model. The Durbin-Watson test at 5% level indicates that it can not be established whether there is auto-correlation in 8miles and Henshaw Town zones. But for other zones, there is no auto-correlation. Thus, the results are good for econometric analysis. Lastly, in the empirical study, (presented in Table 2), using two-thirds per-capita consumption expenditure as a basis for measuring poverty in all the zones, it was discovered that the incidence of poverty was 51.85% in Ikot Ansa, 59% in 8 miles, 60.91% in Anantigha, 54.76% in Henshaw Town and 72.28% in Mbukpa. On the average, it implies that about 60% of the households living in Calabar and its environs are suffering from poverty.

TABLE 2: POVERTY PROFILE FOR CALABAR AND ITS ENVIRONS - 2009

(Percentage of poor people in the Total Population of the various Zones)

ZONES	PERCENTAGES
IKOT ANSA	51.85
8MILES	59.0
ANANTIGHA	60.91
HENSHAW TOWN	54.7
MBUKPA	72.28
AVERAGE	60.0

SOURCE: Computed by the authors (using two-third per-capita consumption expenditure as a basis for measuring poverty)

CONCLUSION

An empirical analysis of the influence of income of household head, household size, age of household head, educational status of household head and occupational status of household head on the level of poverty in Calabar was carried out using ordinary least squares (OLS) linear regression. The findings showed that income and household size are the critical determinants of poverty in Calabar. Therefore, a targeting mechanism that will identify the poor, where they live and how they can be gainfully and sustainably employed to supplement their incomes is recommended. Also, awareness through seminars on the socio-economic implications of large household sizes should be created. In summary, the adoption of people oriented and pro-poor socio-economic policies is necessary to reduce poverty in Calabar.

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