



## 5th International Conference of AAEA

23 - 26 September 2016, United Nations Conference Centre,  
Addis Ababa - Ethiopia

Transforming Smallholder Agriculture in Africa:  
The Role of Policy and Governance



# Inclusive Growth pattern in Rural Southwestern Nigeria: Opportunities and Challenges

Omotola Aderonke M, Okoruwa Victor O

*Invited paper presented at the 5th International Conference of the African Association of  
Agricultural Economists, September 23-26, 2016, Addis Ababa, Ethiopia*

*Copyright 2016 by [authors]. All rights reserved. Readers may make verbatim copies of this  
document for non-commercial purposes by any means, provided that this copyright notice  
appears on all such copies.*

## **Inclusive Growth pattern in Rural Southwestern Nigeria: Opportunities and Challenges**

Omotola Aderonke M\*, Okoruwa Victor O\*\*

\*Department of Agricultural Economics, University of Ibadan, Ibadan, Nigeria

\*\* Department of Agricultural Economics, University of Ibadan, Ibadan, Nigeria

### **ABSTRACT**

African countries both individually and collectively are still searching for ways to sustain the growth momentum and to ensure that growth translates to poverty reduction, employment opportunities and more inclusive society. To address this issue, this paper looked at the pattern of growth and also argues that there are challenges and opportunities for promoting growth in Nigeria. Inclusive growth encompasses equity, equality of opportunity and protection in market and employment transitions. Using the social concentration curve, the study assesses the pattern of growth across the dimensions of education, water and energy. The study made use of the national household survey data sets collected by the National Bureau of Statistics at two time periods, NLSS 2004 and HNLSS 2009. These data were collected through a multistage sampling technique; data extracted included socio-economic characteristics, human capital, physical capital, social and financial capital variables. The concentration curve suggests that opportunities were distributed equally in terms of access to firewood and land with a downward shift in both years indicating growth inclusive.

**Keywords- Inclusive growth, Equity, Southwest Nigeria, Concentration curves.**

## **1. Introduction**

Inclusive growth allows opportunities for everyone to participate in the growth process while making sure that benefits are shared equally. Given that the poor face challenges that impair their conditions and limit their opportunities, to be inclusive, growth should benefit everyone while reducing the disadvantages faced by the poor, both in terms of benefits enjoyed and especially in terms of access to opportunities for participation.

Over the past few years inclusive growth has become a very popular topic among development practitioners. Despite broad use of the term, there are different views on the issue of what may be called inclusive growth. Often, the concept of inclusive growth is identified with pro-poor growth, which differs from inclusive growth (Klasen 2010). The absolute definition of pro-poor growth suggests that what matters is the absolute rate at which the incomes of the poor are rising (Ravallion and Chen 2003; DFID 2004; Ianchovichina and Lundstrom 2009). Inclusive growth on the other hand, refers to the broader idea of a growth process that includes all segments of the society. It is about the extent to which economic growth creates opportunities for poor women and men through active participation in markets, communities and states.

Inclusive growth is an important component of USAID's economic strategy for addressing global poverty and hunger. It incorporates low-income households and individuals into growing economies and market systems. In agriculture, inclusive growth means developing the agricultural sector in a way that generates broad-based benefits for rural populations while improving economic productivity and food security at the local and international level.

## **Rationales for Inclusive Growth**

Despite the growing awareness of the necessity of prioritizing an inclusive growth strategy on the development agenda, many developing countries simply lack sufficient resources and capacity to accommodate this transformation. African countries including Nigeria individually and collectively through regional agencies such as the African Union are still searching for ways to sustain the growth momentum and to ensure that growth is more inclusive and transformative. Therefore, there is more that needs to be done to make economic growth more meaningful in Africa.

However, with increases in Nigerian population from an estimated 115 million to 140 million between the two periods, it shows that there was an increase in the number of people in absolute poverty from 75.4 million to 76.2 million between the two periods. Similarly, income poverty moved up from 28.1 percent in 1980 to 65.6 percent in 1996 before it returned to 54.4 percent in 2004, and increased to 69 per cent in 2010. Even at that, self-assessed poverty stood at 75.5 percent in 2004 (FOS, 2004), while inequality has been increasing. Nigeria's overall Gini coefficient rose from 0.387 in 1985 to 0.465 in 1996, by 2004, it increased to 0.515 and further increased to 0.58 in 2007. Nigeria's rural inequality coefficient of (0.581) is higher than its urban inequality which stands at 0.528 (Canagarajah *et al*; 1997; Canagarajah and Thomas, 2001; Aigbokhan, 1999; World Bank, 2003; and Oyekale *et al*, 2007). Therefore, the theoretical arguments and empirical evidence from the literature that associate faster economic growth with poverty reduction seems to be failing in Nigeria. Inclusive growth is one of the core objectives of Sustainable Development Goals (SDGs) because growth that does not go round does not lead to development.

### **. Obstacles and Challenges to Inclusive growth**

Many of Africa's 54 individual economies including Nigeria still face serious challenges, (Chigunta, 2011) especially: high poverty levels, illiteracy, disease, high child, infant and maternal mortality. This is worsened by the inequality in welfare and development indices. A major weakness is absence of inclusive growth for all groups of the population. There is inequality in terms of these income; access to education and health services; access to finance, limited job opportunities, especially for the youth; and, weak institutional, regulatory and business frameworks.

A similar pattern can be observed in Nigeria in terms of benefit of growth. Despite government spending huge amount on various programmes, including poverty eradication, the benefits of growth have not reached the poor. These programmes have been sparingly unsuccessful due to widespread corruption in public offices. Also, Nigeria still faces an ongoing challenge of making its decade-long sustained growth more inclusive, even though the country is rich in land, human and natural resources. The people are still considered to be poor as the National Bureau of Statistics figures indicate that national poverty incidence reduced from approximately 65.6 percent to about 54.4 percent between 1996 and 2004.

For example, in Nigeria, national unemployment rate in 2003 was 14.8% before declining to 13.4% and 11.9% in 2004 and 2005 respectively. In 2006, 2007 and 2011 national unemployment rate was 13.7%, 14.6% and 23.9% respectively, (NBS, 2010). This shows that economic growth is often tied unequivocally to a correlating improvement in employment levels but it's different in Nigeria as the current poverty rate is 33.1% (World Bank, 2013). To address the issue of growth, both past and present Government have put in place various policies,

programmes and strategies in reducing the level of poverty and inequality in the country. Among these includes National Health Insurance Scheme (NHIS), National Economic Empowerment and Development Strategy (NEEDS), Community Based Health Insurance Scheme (CBHIS), Subsidy Reinvestment and Empowerment Programme (SURE-P), Education Trust Fund (ETF), Universal Basic Education (UBE), the National Social Protection Policy Framework and others. These programs and projects though have been operational but they are yet to impact positively in reducing poverty, inequality and promoting inclusive growth and development in the country.

## **2. Sources of data**

Secondary data was used for this study. The data was source from National Bureau of Statistics (NBS) and cover two time periods. This includes National Living Standards Survey data (NLSS, 2004) and Harmonised Living Standards Survey (HNLSS, 2009). Information source from the data set include socio-economic characteristics of the farming household, access to physical and human infrastructures like electricity, water, land and education among others.

### **Sampling technique**

The sample design for NLSS 2004 was a two-stage stratified sampling. The first stage involves the selection of 120 Enumeration areas (EAs) in each of the 36 states and 60 EAs at the Federal Capital Territory (FCT). The second stage was the random selection of five housing units from each of the selected EAs. A total of 21,900 households were randomly interviewed across the country with 19,158 households having consistent information (NBS, 2005). For the purpose of this study, the secondary data was first stratified into rural and urban sectors. The second stage was the stratification of the rural area of States in south west geo- political zones. The next stage involved the selection of all the sampled rural households in each of the state.

For the HNLSS 2009, the sampling frame for all the 774 LGAs in the country used the Enumeration Areas demarcated by the National Population Commission (NPC) for the 2006 Housing and Population Census. The frame was constructed into replicates such that each LGA had 3 replicates and in each replicate there are 10 EAs serially numbered 1-10. A complete listing of housing units and households was carried out in each of the EAs just before the start of the main survey. A two-stage sample design was adopted in the survey of which selection of Enumeration Areas (EAs) constituted the first stage/Primary Sampling Units (PSUs), while selection of Households (HHs) formed the second stage/Secondary or Ultimate Sampling Units (USUs). A sample size of 10 EAs was selected per LGA for study, while 5 households were systematically selected in each EA where the HNLSS Household Consumption, Expenditure and Income Questionnaires were administered. This produced 50 households per LGA and 38,700 households nationally. The same household selected in HNLSS part A (welfare component) was repeated in Part B (Consumption/Expenditure component) of the HNLSS. Therefore, the 38,700 households selected for part B, are the subset of the 77400 households selected for Part A, HNLSS. For this study, 1192 respondents were used for 2004 and 1587 for 2009.

### **3. Materials and methods**

The method of analysis used was descriptive statistics and the concentration curve.

#### ***Concentration curve***

Similarly the concentration curve shows the pattern of distribution of opportunity in a society and compares them across societies or over time.

It is given as:

$$\bar{y} = \int_0^{\infty} y(x)f(x)dx = \int_0^1 y_p d_p \dots\dots\dots(1)$$

Where:

$y(x)$  is an individual opportunity function.

$X$ = income, which can be a random variable

$f(x)$ =probability density function.

$dp=f(x)dx$  and  $y_p$  is the opportunity enjoyed by an individual at the  $p$ th percentile, with  $p$  varying from 0 to 1.

$C(p)$  is defined as the proportion (or share) of opportunity enjoyed by the bottom  $p$  proportion of individuals in the population arranged in ascending order of income and as given by:

$$C(p) = \frac{1}{y} \int_0^p y_r d_r \dots\dots\dots(18)$$

where  $y_r$  is the opportunity enjoyed by an individual at the  $r$ th percentile. The function  $C(p)$  is called the concentration curve.

#### 4. Results and Discussions

Table 1 presents the socio economic characteristics of respondents. From the table, majority of the household head fall between 40-49years of age in both years. With mean value of 45 in 2004 and 49 in 2009, which means a lot of them are in their active years. The average size of household for both periods was about four members with standard deviation of about 3. A large dispersion can also be seen in 2004 where households were larger than in 2009. The gender dimension shows that most of the household heads were males both in year 2004 and 2009.

The marital status suggests that the single has the highest percentage of 47percent in 2004 and 43percent in 2009. This shows that the single in year 2004 are more than that of year 2009. The proportion of heads engaged in employment has been low in both years with 41percent in 2004 and 21percent in year 2009. People who are self employed are more than the paid employee

**Table 1: Socio-economic characteristics of respondents for period 2004 and 2009**

variable	2004		2009	
	Frequency	percentage	frequency	percentage
<b>Age</b>				
10-19	983	30.3	203	8.20
20-29	540	15.08	145	5.69
30-39	163	0.11	392	14.94
40-49	1000	40.08	806	31.61
50-59	100	0.8	398	15.61
60 and above	500	13.63	600	23.95
Mean	45		49.92	
(SD)	(25)		(37)	
<b>Household size</b>				
1-5	2841	81	2129	83.57
6-10	554	18	419	16.43
>10	20	1	0	0
Mean	4		3.6	
(SD)	(3.2)		(3)	
<b>Gender</b>				
Male	2302	75	1956	76.74
Female	753	25	593	23.26
<b>Marital status</b>				
Single	1302	47	1096	43.41
Married	1250	41	784	30.35
Divorced	303	7	241	9.45
Widowed	200	5	428	16.79
<b>Education</b>				
Primary	920	25	845	33
No education	1474	65	1500	58
Others	20	10	200	9
<b>Employment</b>				
Self employed	1805	59	1550	75
Paid employed	1250	41	995	25
<b>Sector</b>				
Rural	1862	61	1545	65
Urban	1193	39	1000	35

Source: NLSS 2004 & 2009 HNLSS Survey

\*others refer to tertiary, technical education.

because opportunities is not readily available for them to engage themselves. This leads to people turning to self employment especially through establishing their own small, medium and micro enterprises.

Result further shows that about 80% of household heads have no formal education while only 15% are educated. In terms of rural-urban, the drift is not much. In 2004, the rural populace had a percentage of almost 61 compared to year 2009 with a percentage of 65 which are both higher than the urban populace. This shows that in both years people reside more in the rural areas.

### **Growth opportunity curves**

This describes the pattern of inclusive growth in terms of opportunities available to the population.

#### ***(i) Opportunity curve for access to electricity and kerosine***

Figure 1 and 2 shows the pattern of distribution of access to kerosine and electricity with respect to income. From the figure, both years (2004 and 2009) shows similar pattern in terms of increase and decrease. But there was stability at a point in year 2009 with an average distribution of 36 percent which latter increase. kerosine on the other hand shows an increase in the demand for it and it was found to be inequitable, this is because it is majorly consumed by households in urban areas because of easy accessibility and relative affordability which most rural poor cannot afford. It shows that growth in average income is reducing especially for poor that belong to the bottom end of the income distribution. This suggests that growth is not inclusive in both years since the entire opportunity curve shift upward, this is consistent with the work of Ali and Son 2007.

*(iii) Opportunity curve for currently and primary school access*

Figures 3 and 4 present the opportunity curves for currently in school and access to primary school. The distribution of the educational opportunities is in fact unequal from the slope of the graph, it indicate inequitable distribution. It is even more unequal among those in secondary school in both years. In this case, the opportunity curves for both educational levels have an upward slope. This suggests that growth has not been inclusive.

*(iv) Opportunity curve for access to land opportunity*

Figure 5 presents the pattern of income distribution in terms of access to land in year 2004 and 2009. From the graph, the gap between the two curves seems to be widening towards higher deciles. In 2009 people have more access to land opportunities than in 2004, though the poor at the lower end of the distribution enjoy more opportunities than the rich at the upper end. It has also been observed that economic growth tends to be higher and more broadly shared when people have equitable and secure access to land. This corroborate a World Bank report in year 2005 that countries with more equitable land distribution achieved growth rates two to three times higher than those where land distribution was less equitable.

The concentration curve suggests that there were more opportunities in assessing firewood from the slope of the graph. The downward slope suggests that opportunities were equitable in both years.

## OPPORTUNITY CURVES

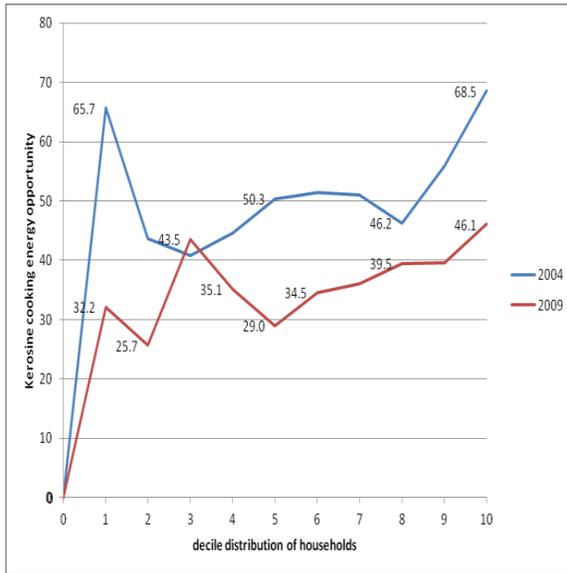


Figure 1: Opportunity curve for access to kerosine

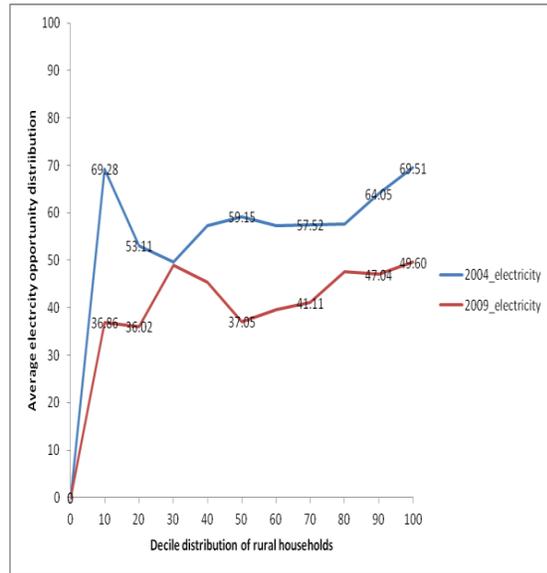


Figure 2: Opportunity curve for access to electricity

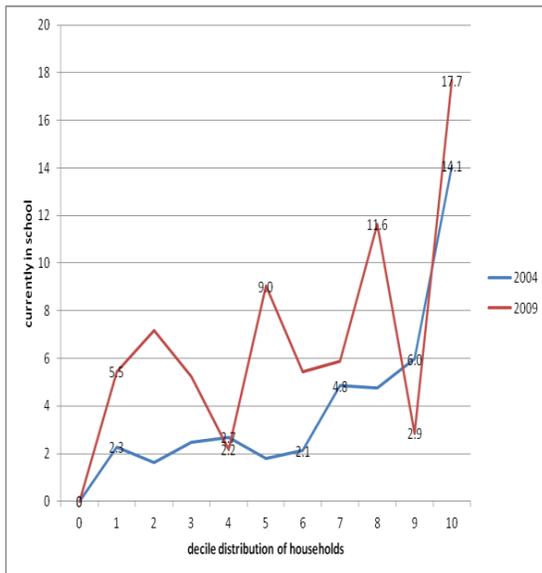


Figure 4: Opportunity curve for access to secondary school

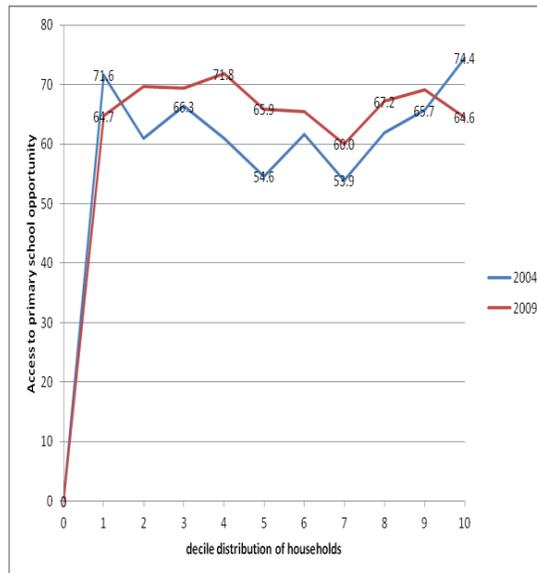
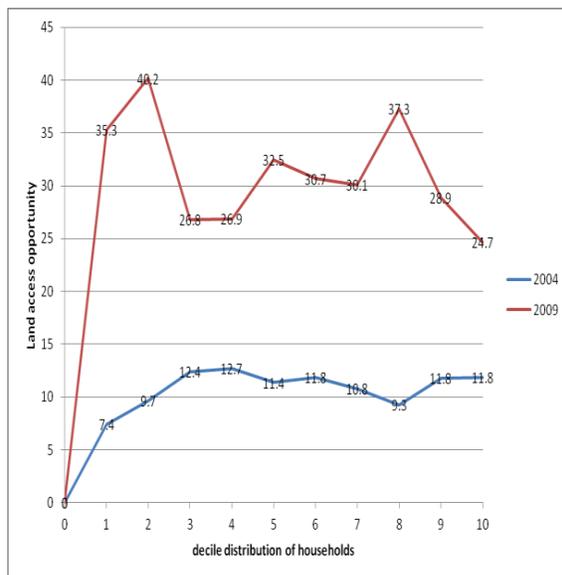


Figure 5: Opportunity curve for access to primary school



**Figure 5: Opportunity curve for access to land**

## CONCLUSION

Countries are still searching for ways to sustain the growth momentum and to ensure that growth translates to poverty reduction, employment opportunities and more inclusive society, therefore there is more that needs to be done to make economic growth more meaningful. The challenges lie on how to quickly address the important indicators of socio economic development over the short term as well as long term. This paper has shown that to achieve inclusive growth, the important issues to address independently includes access to education, electricity and land.

## References

- Canagarajah, S. & Thomas, S., (2001), 'Poverty in a wealthy economy: the case of Nigeria', *Journal of African Economies*, 10, pp. 143-173.
- Klasen, S. (2010). "Measuring and Monitoring Inclusive Growth: Multiple Definitions, Open Questions, and Some Constructive Proposals." Working paper, Asian Development Bank.

World Bank (1990) *World Development Report 1990*. Washington DC: World Bank.

World Bank (2003) *Zambia: The Challenge of Competitiveness and Diversification*. Report No. 25388-ZA, Washington, DC: World Bank, January 2003.

World Bank (2012). World Development Indicators Database (December 2012 ed.). Washington, DC: World Bank.

Oyekale, O.S., A.I. Adeoti and T.O. Ogunnupe (2006): Measurement and Sources of Income Inequality in Rural and Urban Nigeria. Revised Final Report Submitted to Poverty and Economic Policy Network (PEP), Universite Laval, Canada.