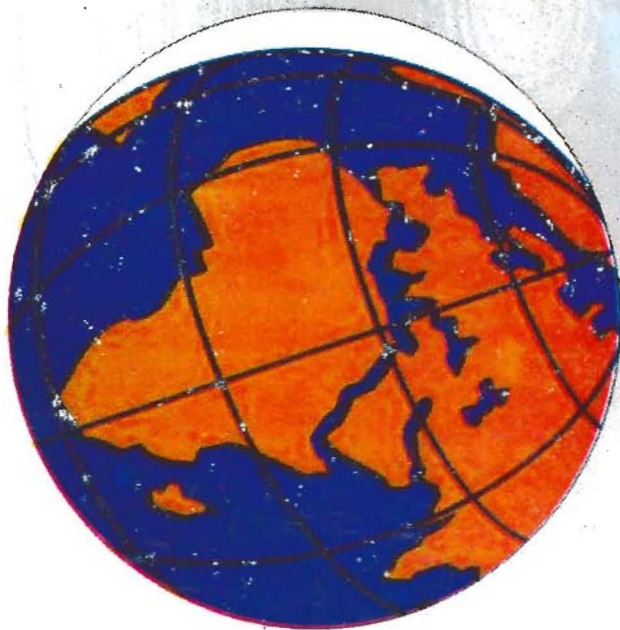


International
Journal of
Social Sciences
And
Humanities
Review



EVALUATING THE CRISIS OF RURAL DEVELOPMENT PLANNING IN NIGERIA

IRUONAGBE, TUNDE CHARLES (Ph.D)

Department of Sociology,

Covenant University, Ota,

Ogun State, Nigeria.

charlesiruonagbe@yahoo.com

+ (234)8033011400

ABSTRACT

The case has often been made for the transformation of Nigeria's agricultural sector from a predominantly subsistence system to a market-oriented agribusiness sector. This invariably requires structural and technological changes, as well as institutional and policy support. Agriculture cannot realistically compete with other sectors of the economy as farmers are thrown to market forces. Agriculture has to be supported because of its unique position and nature. In addition, unbalanced economic development and unequal access to economic opportunities are the results of policies that have allocated to the urban areas a lion's share of all government's developmental efforts to the detriment of the rural areas. The lack of adequate infrastructure in the rural areas has been compounded by the ineffectiveness of the different development plans in Nigeria towards addressing agricultural and rural development planning. There is therefore need for a critical appraisal of previous development policies and programmes that have heightened rural-urban differentials with far reaching consequences for agricultural development in Nigeria. This paper therefore explores the potentials in the agricultural sector as it holds great promise if properly harnessed. It examines what the challenges have been and how best to move forward on the path to a viable and sustainable rural transformation in Nigeria.

KEYWORDS: Agribusiness sector, development policies, rural development, rural farmers, rural infrastructure

INTRODUCTION

Rural development refers to improvement of the economic and social well-being of the rural population. The benefits of rural development must be widely shared among the rural populations, especially the rural poor (Cleaver, 1997). The need for rural development becomes very compelling when it is understood that about 70 percent of Africa's poor are rural. About 40 percent of rural household heads have primary education compared with about 70 percent of urban household heads. Forty-five percent of the urban population and 30 percent of the rural population have access to sanitation. Forty percent of school-age females in urban areas are enrolled in primary schools compared with 25 percent in rural areas. The relative bias against rural areas for pipe borne water is somewhat offset by the greater access to well water. Overall, these household data show that while a large percentage of the urban population does poorly, the rural population does worse (World Bank, 1997).

THE CRUX OF THE MATTER

A cursory look at rural development planning in Nigeria shows clearly the weak capacity of most African institutions to manage programmes and policy decisions of government effectively. This has been grossly compounded by the level of corruption and insensitivity on the part of government. Government policies are always fantastic in their formative stage, but

implementation has always been faulty. There is also the inadequate participation by the rural population in program design and implementation.

Right from the Federal level to the State level, no adequate understanding and concerted effort is made in terms of the realization of the intended projects for the rural areas. The worst part is that even at the Local level, where government is expected to be closest to the people, local government officials still exercise high degree of irresponsibility and lack of concern for the needs of the rural people who are never consulted or carried along in the scheme of things.

With the unhealthy economic situation in the country, and without an enabling environment, the resultant effect has been the existence of poor private sector response as the engine of growth and development. In addition, agencies of government in collaboration with the private sector and NGOs have not been able to actualize and support the need for a broader concept of rural development. The consequent effect is that, while rural-urban differentials have consistently increased, the agricultural sector has suffered severe neglect and efforts towards rural development. This also has been compounded by the land tenure system in most rural communities in Nigeria, which only guarantees women who are the major contributors to food crop production and family sustainability, access and not ownership of land.

RURAL AGRICULTURE AND ITS CONSTRAINTS

There is a clear understanding that with increased agricultural production, there will be an expansion in farm income which invariably will stimulate the demand for non-farm products. There are however special constraints facing women's agricultural life leading to a reduction in economic growth. According to the World Bank 1989; Cleaver and Schreiber 1994, most working women are employed in agriculture and many of the constraints facing them exist in the rural economy. These include legal and customary constraints on land ownership and access to credit; absence of male partners who work in towns and cities or off-farm, leaving the woman as the head of the farm; work burdens on women in addition to farming, including household management, water and fuel wood collection, and cultural constraints on women's use of equipment and oxen.

It is quite obvious therefore that agriculture is critical to Africa's economic, social and rural development. But in most African countries like Nigeria, agricultural performance has not achieved the ambitious objectives set out for it. The result has been continuing high rural poverty and environmental degradation such as what has become rampant in the Niger Delta Region of Nigeria. Some regions of Africa have witnessed rapid forest destruction rate which according to the World Resources Institute (WRI) (1994) have moved from 3.5 million to 5 million hectares per year. Additional outcomes of this process are a decline in biodiversity, destruction of animal and plant life, and destruction of fragile areas.

It is imperative to state here that Nigeria faces serious poverty challenges and it is estimated that two-thirds of Nigerians now live below the poverty line of 1US\$ per day, most of them in rural areas. In an attempt to address this, the Federal Government identified areas of investments in agriculture and rural development. According to USAID (2005), past rural development strategies were formulated to offer a promising strategic direction to achieve poverty reduction, food security and accelerated economic development. Despite the articulation of these strategies and the commitment of Government and Donors to the broader framework of rural development, there were major challenges regarding the design, implementation and monitoring of such projects. Nigeria's agricultural sector has consistently failed to attract the levels of investment required to accelerate growth. The problems that have persisted include: continued heavy public sector involvement in "private sector" areas; macro-economic instability and appreciation of the real exchange rate; policy inconsistency and political interference; an inadequate budget and poor infrastructure investments; low institutional capacity; the failure to carry along key stakeholders; input subsidies and lack of commercial banks lending to farmers; and protective trade policies to large agro-industries.

More significant is that there has been little harmonization of projects or programmes among the Federal, State and Local Governments at the stage of implementation. In addition, Nigeria's move towards more market-orientation in its rural sector appears to be hampered by continued ineffective market policies and distortions, weak institutions, and inadequate infrastructure as they affect smallholder farmers, such as those related to access to land, credit, extension and other resources. Braun (2008) also observed that, agricultural growth is of crucial importance for enhancing food security and nutrition and accelerating growth bearing in mind the fact that majority of poor people continue to live in rural areas and depend on subsistence farming for their livelihoods.

In addition, underinvestment in rural infrastructure, services, agricultural research, science and technology have seriously impaired agricultural growth and productivity gains. Low productivity growth is especially severe for small farmers who have constrained access to capital and inputs such as fertilizers and high-yielding seeds. The current global food crisis further emphasizes the need for agriculture to move to the top of the development agenda in low-income countries like Nigeria.

POLICIES AND PROGRAMMES ON RURAL AGRICULTURE AND THEIR DEMERITS

There has been an urban bias in government expenditure throughout Africa. With regards to rural development in Nigeria, little has often been spent by government on infrastructure, health and education in most of its rural settlements. This is the situation in most parts of Africa where even though there are some variations, in general, highway projects, urban infrastructure, urban health and education facilities, and public employment have taken precedence over rural development. These domestic policy problems were exacerbated by agricultural subsidies in industrial countries that caused the reduction of world prices for agricultural products. The decline in global prices for agricultural commodities further reduced African farmers' income and eventually made African countries like Nigeria a dumping ground for foreign products. This according to Donovan (1996) meant that agricultural marketing and processing drained rather than creating value added for African economies.

In the Ten Year Development Plan (1946 – 1956) the Colonial masters emphasized commodity crop production, mainly oil palm, cocoa, rubber, cotton and groundnuts. The document contained very little or no proposal for increased food production. The first National Development Plan (1962 – 1968) sought to increase the production of export crops through better seed distribution and more modern methods of cultivation as well as through the increase in area under cultivation. Farm settlements and cooperative plantations as well as Tractor Hiring Units were established. There were farm implements. The component regions were largely autonomous in terms of agricultural policy formulation and implementation. This Plan Period was a success. Agriculture was a major sector of the economy, the major source of income and employment to both the Government and the rural people. The cash crops accounted for about 80% of our total export and 45% of the gross domestic product (GDP). However, no mention was made of the food sector in this plan that had 11.6% capital allocation by both Federal and State Governments to Agriculture (Osakwe and Ojo, 1986).

The Second National Development Plan (1970 – 1974) specified the creation of rural employment opportunities with no definitive programme for their achievement. In 1973, the National Agricultural and Cooperative Bank (NACB) was established to facilitate agricultural financing to farmers. The National Accelerated Food Production Programme (NAFPP) was initiated which laid emphasis on agricultural research and extension support to farmers. With massive exploration of crude oil, the oil boom came and stood astride the Nigerian economy contributing more than 98% of total export value and 73% of GDP (Opara, 2006). With focus on crude oil, the agricultural policies and programmes were clumsily executed and virtually abandoned by succeeding military regimes (Osakwe and Ojo, 1986). The cocoa plantations

suffered serious setback, the cotton and groundnut pyramids disappeared, hides and skin became food for the embattled Nigerian populace, and the oil palm plantations which were battle fields during the Biafra/Nigeria Civil War died a natural death due to neglect. The disaster on agriculture was enormous, and Nigeria has not ameliorated the effects till date.

The Third National development Plan (1975 – 1980) was the first to spell out provisions for food production because there was obvious decline in national food supplies due to poorly executed or neglected past agricultural policies and the effects of the civil war. The oil boom precipitated massive rural-to-urban drift made up mainly of the younger generation. Several food crop farms suffered “death” because of inadequate or zero maintenance and there was serious deficit in food production (Alatise, 2001). In 1976, the Operation Feed the Nation (OFN) programme was inaugurated. This first major agricultural policy pronouncement and effort by Government generated awareness among Nigerians about the consequences of an empty national food basket. The programme focused on building the spirit of dignity of labor and re-engaging the idle hands back to land.

In the same year, and consequent upon the plan document, Marketing Boards were abolished. Production and Marketing Companies were established such as National Grain Production Company for food grains and National Root Crop Production Company for root crops. Other policy and strategic measures taken by Government during this period were the establishment of River Basin Development Authorities (RBDAs), National Seed Multiplication Scheme, Agro-Service Centers, Agricultural Development Projects (ADPs). Many research and tertiary institutions were established to formulate and implement research programmes aimed at improving agricultural food production. Even with all these policies, the total Capital allocation to Agriculture by both Federal and State Governments further declined to 7.1% (Osakwe and Ojo, 1986). This goes further to show that Government was not supporting the agricultural sector with adequate financial backing for proper execution of the programmes.

The Fourth National Development Plan (1981 – 1985) saw the emergence of the Green Revolution which tried to give more powers and impetus to the River Basin Development Authorities and the ADPs to produce more food for the nation with more Capital (12.7%) allocated to the agricultural sector (Osakwe and Ojo, 1986). Even though these efforts seemed to have been guided by genuine concerns, they failed to make the necessary impacts in the agricultural sector because of fundamental structural problems in the economy. There was obvious decline in the agricultural sector share of the GDP to about only 20% in the 1981 -1985 Plan period (CAADP, 2004): underdevelopment of the sector; frequent changes in government policies and implementation strategies; no serious agricultural mechanization policy; poor infrastructures and facilities; poor research and development work. There was increasing shortage of food evidenced by increased food imports and increased high prices. Agricultural exports dwindled at an alarming rate as well as decline in labor force for agriculture.

In 1986 the Federal Military Government introduced the Structural Adjustment Programme (SAP). Importation of major foods was prohibited to enhance local production and price competitiveness of locally produced foods compared to those imported (Bamgboye and Jekayinfa, 2006). The Directorate of Food, Roads and Rural Infrastructure (DFRRI) was established to provide the Nigerian rural populace with infrastructural facilities (roads, electricity, water boreholes and pumps, agricultural inputs) to enhance food production, processing and evacuation of their produce to urban markets and to stem rural-urban migration. Interest was aroused in farming but labour became very expensive and most often difficult to get at peak season, as it followed the law of supply and demand. The increased farm labour cost increased the cost of agricultural produce. Due to untimely operations of manual land preparations, hand planting, manual weeding and fertilization, as a result of labour shortage the expected yields declined. However, because of its rural target, this latest policy options produced an increase in overall agricultural production with an understandably high cost of food. Nigeria’s agricultural

production rose by an estimated 2.5% in 1987, 4.58% in 1989 and 4.8% in 1991, while grains alone increased by 4.8%, 6.9% and 7.5% respectively (CBN, 1991).

The Directorate of Employment (NDE) was established in 1988 to address unemployment of graduate school leavers. It provided training and some initial take-off grants to participating beneficiaries who wanted to go into food crop as well as animal production and processing. Experience from the above three Plan Periods convinced Government that there can be no alternative to well-designed and articulated agricultural policies as instruments for promoting agricultural growth and development in Nigeria (Igbeka, 2003). In 1988, the Federal Government published the first ever agricultural policy document for Nigeria aimed at redressing the underdevelopment of agriculture, streamlining policies in all tiers of government and ensuring policy stability (Opara, 2006). Again, the implementation of this policy ran against many problems including: poor funding and poor state of infrastructure; poor administration of government support to agriculture and abandonment of projects mid-stream due to political reasons; poor private sector participation and investment in agriculture due to inconsistency and instability of macro economic policies which tend to discourage medium and long term investments in agriculture; lack of appropriate technology to reduce drudgery in agricultural production and processing and inadequate availability of inputs such as improved seeds and breed stock. Despite these problems, agricultural production in Nigeria increased steadily at the rate as high as 6.4% annually between 1988 and 1992 (Okunmadewa, 2002).

From 1992 - 1998, succeeding governments saw that the problem of food shortages was grim and in a bid to control population decreed the one man four children policy. Since women involvement in agriculture was high, government policies then centered on women. Programmes such as Better Life for Rural Women; Family Support Programme (FSP); Family Economic Advancement Programme (FEAP) were initiated. These were meant to empower the women for more and better involvement in agriculture and other rural activities. The programmes were aimed at providing some form of mechanization to agriculture by way of cottage industries in rural areas. It was hoped that these would enhance the production of food and agricultural raw materials. The National Land Development Agency (NALDA) was established in 1992 to provide support for land development for agriculture. The National Agency for Science and Engineering Infrastructure (NASENI) was established in 1992 to establish and nurture an appropriate and dynamic Science and Engineering Infrastructure to help empower Small and Medium Enterprises (SMEs) in agriculture (Onwualu and Pawa, 2004).

Since 1999, the government in Nigeria has been implementing different reform programmes on privatization, commercialization, deregulation, corruption and financial crimes. These are meant to stabilize the economy and make it more productive. In 2001 a New Agricultural Policy and the Integrated Rural Development Policy were initiated to ensure national food security, attain self-sufficiency in basic food production, enhance employment opportunities and achieve high growth rate for the economy. These were to be achieved through the introduction of and adoption of improved technology, efficient utilization of resources by the farmers and a broad based organization and mobilization of the rural masses so as to enhance their capacity. These policies are being implemented by the National Economic Empowerment and Development Strategy (NEEDS) set up by the Federal Government of Nigeria in March 2004. This is a medium term economic reconstruction agenda aimed at value reorientation, wealth creation, poverty reduction, job creation and elimination of corruption. In order to fast track the gains of the 2001 New Agricultural Policy, there came the Presidential Initiatives in Agriculture (PIA) (2004) and the National Special Food Security Programme (NSFSP) and FADAMA II (2005). The PIA gave priority to four different crop-based expansions of production and utilization programmes (e.g. cassava, rice, tree crops and vegetable oil) and livestock and fisheries programme with a view to curtail the huge foreign exchange expended in their importation and their importance in the revival of industries based on their raw materials.

In 2006, the National Agricultural Development Fund was established with a take off capital of N50 billion with a view to address the problem of inadequate funding of agriculture on a sustainable basis. The above policies lend support to The New Economic Partnership for Africa's Development (NEPAD) as well as the Lagos Plan of Action (LPA) acknowledgement that agricultural mechanization and environmental stability are a *sine qua non* for increased food production and food security (Faborode, 2005).

Nigeria's agriculture and its sub-sectors have for long been starved of funds/investments. The prolonged neglect has resulted in a poorly productive, uncompetitive and declining sector. The Second National Development Plan (1970 – 74) had stated: "No realistic change can be expected from the present nature of Nigeria's Agriculture, due to the drudgery attached to it, until the farmer finds an alternative to the hoe and cutlass technique of production. The clearing of bush, preparation of land, the sowing of seeds, the various post-planting operations are all processes in which the farmer's present tools can do little for high productivity per man day or per acre". The over reliance on hand tool technology (over 70%) for agricultural production is one of the greatest technical problems facing the present generation of Nigerian farmers. This is because with the low work rate efficiency of less than 10% in the humid tropics, using hand power is arduous, inefficient and can barely produce enough to feed the family. Even today the bulk of Nigeria's rural farmers do not have labour saving devices that would ensure that all field operations are performed on time, and do not have at their beck and call harvesting and processing machines. (Anazodo et al., 1987). However, the key to economic development lies in raising agricultural productivity which directly involves the utilization of more energy resources (Jekayinfa, 2006).

THEORETICAL ORIENTATION

The Conflict Theory

The proponents of the conflict theory include Karl Marx, Georg Simmel, C. Wright Mills and Ralf Dahrendorf. Conflict theory is oriented towards the study of social structures and institutions. It emphasizes the fact that there are fundamental differences of interest between social groups. Due to these differences, conflict has become a common and persistent feature of society. The greatest influence on the conflict theory is based on the contributions of Karl Marx.

For Marx, mankind has created much of the physical world, and the social and political institutions that order it. The world is produced and reproduced through man's labours. To him therefore, the motivating force in history is the manner in which human beings relate to one another in their continuous struggle to extract their livelihood from nature (Labinjoh, 2002).

Marx theory of class stems from the premise that 'the history of all hitherto existing societies is the history of class struggles'. The potential for class conflict is inherent in every differential society. So, a conflict theory of society derives essentially from Marxist sociology. It is regarded as an economic theory of society. The theory begins with the simple observation that, in order to survive, humans must produce food and material objects. In doing so they enter into social relationships with other people. So the core of the Marxist argument is that relations and forces of production determine other relations such as those in the political, religious, judicial, cultural and other spheres of the society. Conflict is seen to exist when people and groups with different economic and other interests and roles interact in a society.

Every society contains elements of contradictions. These contradictions involve the exploitation of one social group by another. In feudal societies, lords exploit their serfs; in capitalist societies, employers exploit their employees. Conflict involves struggle between segments of society over valued resources. This can take many forms as individuals may quarrel, some family members/relations may quarrel just as some communities have long standing rivalries due to valuable resources such as land.

Marx asserted that the group which owns and controls the means of production also enjoys the support of laws which are framed to protect and further their interests. In addition, equality and

social justice are illusions due to unequal social relationship, oppression and exploitation of one group by another. Indeed, according to Donovan (2000) one of Marx's central insights is the idea of materialist determinism, usually called historical materialism, which holds that culture and society are rooted in material or economic conditions.

The social conflict paradigm therefore sees society as an arena of inequality that generates conflict and change. Thus, this model investigates how factors such as social class, race, ethnicity, gender, and age are linked to the unequal distribution of economic resources, power, education and social prestige. In other words, it emphasizes how social patterns benefit some people while depriving others.

In terms of the crisis of rural development planning in Nigeria, it is quite obvious that majority of rural people are poor, hungry, voiceless and powerless. They have been so alienated by those at the upper echelon in society, some of whom are in positions of authority at the Federal, State and Local Government level. These rural communities produce majority of the raw materials needed for industrial development in the cities. Yet, they have been so marginalized, exploited and discriminated against since the urban areas often enjoy the lion share of all government development efforts.

This also has heightened the rural-urban drift of the active labour force due to a dearth of infrastructural facilities and neglect in the rural areas, and over utilization of facilities and high criminal activities in the urban areas. This has been compounded by the fact that, policy decisions of government are often not properly implemented, especially when rural dwellers are often not considered before such decisions and policies were initially made. Hence, except concerted effort is made by those in authority to carry rural dwellers along, the path towards sustainable rural development will be very unrealistic.

CONCLUSIONS

Agriculture is indeed an important occupation in Nigeria with over 70% of her population depending on it directly or indirectly for livelihood. It provides the bulk of employment, income and food for the rapidly growing population as well as supplying raw materials for agro-based industries. World current agricultural production has an average growth rate of 1.8% as compared to the 3% in the 1960s and therefore at a lesser pace than the demographic growth.

The World Bank has shown that in sub-Saharan Africa (to which Nigeria belongs) the annual food increase needs to reach 4%, i.e. more than double the current figure in order to achieve food security (IBRD, 1989). This however can only be actualized through a concerted effort and sincerity of purpose on the part of government and all other stake holders in ensuring the development of the agricultural sector and making it attractive to rural dwellers. And as espoused by Raoult-Wack and Bricas (2001), due to a number of factors, which include rising population, increasing pressure on land resources, natural and man-made disasters such as drought, desertification, soil erosion and degradation, the problem of sustainable agricultural production in Nigeria has assumed greater importance than ever before.

RECOMMENDATIONS

The recommendations put forward in the process of enhancing rural development in Nigeria include:

- The current global food crisis is an indication that agriculture must move to the top of the development agenda in low income countries like Nigeria. Government at all levels must be made accountable to the people and also cultivate the spirit of due process in terms of project evaluation and implementation including how resources are expended.
- Government must ensure that it is interested in how best to capture the interest of youths who have the enterprising and creative abilities to undertake meaningful agricultural tasks for sustainable living. This must be accompanied with the right policies to

encourage rural farmers such as provision of subsidies for farm implements and other materials for crop production.

- For effective policy implementation in the rural areas, the country requires good governance and proper accountability. The civil society must in this regard be proactive and work with the right NGOs so as to cultivate the right attitude and values of rendering selfless service to the nation and its peoples.
- On the part of our rural communities, the people must embrace change and do away with cultural acts that inhibit development especially in areas of harmful widowhood practices, and discrimination against women in terms of inheritance such as land rights, since rural women are the engine of growth and mainstay of the rural economy.
- Educated, young, enlightened and dynamic persons from our rural communities resident in the cities must be committed to the state of affairs in their rural communities in terms of project development, provision of infrastructural facilities, and improvement in the living conditions of the people.
- Rural farmers must ensure that they organize themselves into cooperative groups that will help them pursue short term and soft loans to help them attend to their agricultural requirements for enhanced productivity. In addition, the vision and design of specific strategies for rural development must come from the rural communities that such programmes and projects are intended for.

REFERENCES

- Alatise, M. O. (2001). Sustainable national intensive food production by irrigation in Nigeria. Nigerian Society of Engineers' Conference. Port Harcourt, Nigeria. Nov. 59, pp196-205
- Anazodo, U.G.N., Abimbola, T.O. and Dairo, J.A. (1987). Agricultural machinery use in Nigeria. The experience of a decade (1975-1985). Proceedings of the Nigerian Society of Agricultural Engineers, pp 406 – 429.
- Bangboye, A. and Jekayinfa, S. O. (2006). Energy consumption pattern in palm kernel processing operations. *Agricultural Engineering International: the CIGR Ejournal*. Manuscript EE 05 013. Vol. VIII. March 2006.
- Braun, V. J. (2008). International Food Policy Research Institute. www.ifpri.org.
- CAADP. (2004). Comprehensive Africa Agricultural Development Programme. New Partnership for Africa's Development (NEPAD). National Mid-Term Investment Programme (Draft Report).
- CBN 1991. Central Bank of Nigeria Annual Report and Statement of Accounts. Dec. 1991.
- Cleaver, K. and Schreiber, G. (1994). "The Role of Women in Rural Production Systems". In *Reversing the Spiral: The Population, Agriculture and Environment Nexus in sub-Saharan Africa*. Directions in Development Series. The World Bank, Washington, D.C.
- Cleaver, K. (1997). *Rural Development Strategies for Poverty Reduction and Environmental Protection in sub-Saharan Africa*. Directions in Development. The International Bank for Reconstruction and Development/The World Bank, Washington, D.C.
- Donovan, G.A. (1996). "Agriculture and Economic Reform in sub-Saharan Africa". AFTES. Working Paper 18, World Bank, Africa Region, Washington, D.C.
- Faborode, M. O. (2005). *Forward in Hunger Without Frontiers*. Bobobee, E. & Bart- Plange, A. (Eds.) Published by West African Society of Agricultural Engineers (WASAE) 2005. ISSN 0855-708X. p. vii – ix.
- IBRD. (1989). *Sub-Saharan Africa: From Crises to Sustainable Development. A long Term Perspective*. The World Bank. Washington D.C.
- Igbeka, J. C. (2003). Review and appraisal of the agricultural policy in relation to post-harvest technology. *Nigerian Institution of Agricultural Engineers*. Vol. 25: 17 – 31.

- Jekayinfa, S. O. (2006). Energy consumption pattern of selected mechanized farms in Southwestern Nigeria. *Agricultural Engineering International: the CIGR Ejournal*. Manuscript EE 06 001. Vol. VIII. April 2006.
- Labinjoh, J. (2002). The Sociological Trio: An Introduction to Marx, Weber and Durhkeim. In Isiugo-Abanihe, U., Isamah, A., & Adesina, J. (Eds.) *Currents and Perspectives in Sociology*. Malthouse Press Limited, Lagos, Nigeria.
- Okunmadewa, F. (2002). Food insecurity and poverty in Nigeria: Breaking the jinx! Proceedings of 1st International Conference of the West African Society for Agricultural Engineering. Abuja, Nigeria. 24-28 Oct. 2002, pp 2-12.
- Onwuvalu, A. P. and Pawa, N.P. (2004). Engineering infrastructure for the manufacture of agricultural engineering machines in Nigeria: The role of NASENI. Proceedings of the 2nd International Conference of the West African Society of Agricultural Engineering. Kumasi, Ghana. 20-24 Sept. 2004.
- Opara, A. C. (2006). Government policies and their implications for productivity Improvement in agriculture. Paper presented at a Workshop on Effective Agricultural Inputs Management for Improved Productivity. Modotel. Owerri. 31st March 2006.
- Osakwe, J. O. and M. O. Ojo. (1986). An appraisal of public sector financing of agricultural development in Africa with particular reference to Nigeria. Central Bank of Nigeria. Economic and Financial Review. Vol. 24, No. 2.
- Raoult-Wack, A. L. and N. Bricas. (2001). Food Sector Development: Multi-Functionality and Ethics. *Agricultural Engineering International: the CIGR Journal of Scientific Research and Development*. Vol. III. January 2001. .
- USAID (United States Agency for International Development) (2005). Nigeria Agriculture Policy Support Facility (A- PSF).
- World Bank (1989). "Women and Agriculture in Africa: A Guide to Bank Policy and Programs for Operations Staff". Africa Region, Washington, D.C.
- World Bank (1997). "Taking Action to Reduce Poverty in sub-Saharan Africa". Development in Practice Series. Washington, D.C.
- WRI (World Resources Institute) (1994). *World Resources: A Guide to the Global Environment 1994-1995*. Washington, D.C.