

Constraints and prospects of adarice production Nigeria limited Adani Enugu state Nigeria

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Abstract

This study examines the challenges and prospects of Adarice Production Limited, Adani in Enugu State of Nigeria and offers suggestions on ways to resuscitate the ailing company for continued rice production. The study adopted treatment and controlled approach whereby three control populations were identified which have similar characteristics and performance to the required study. Fifty persons were interviewed from two sample groups chosen of samples which include: the farmers who are direct beneficiaries of the scheme as participating farmers, the second group are the indigenes from the host communities while 20 persons interviewed were from the third group which comprised former staff of the company. Communal crisis which erupted following the failure of both the States and Federal Government to carry out proper and defined boundary adjustment at the instance of creating Enugu State out of Old Anambra State was identified by the study as the major cause of the collapse of the project and involvement of politicians and non professionals in running agricultural projects. Suggestions for urgent and holistic look at the communal conflict between the communities with the view of settling the land ownership tussle to allow peace to return to the warring communities, repair of the collapsed irrigation and paddy processing facilities, establishment of tractor hiring scheme, regular supervision of the project by Government and her agencies, less involvement of politicians or non professionals in the running of the project. The governments of Anambra and Enugu States should take a decision on the status of the company to enable it return back to production.

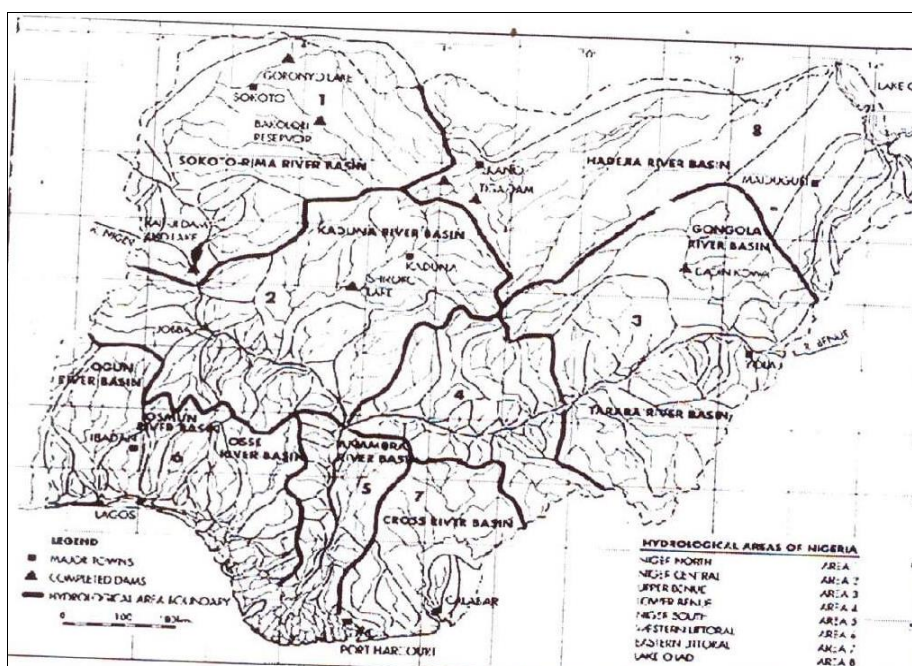
Keywords: Adarice, irrigation infrastructure, increased rice production, communal crisis, repair

Introduction

Nigeria is located in the tropical zone between latitudes 4°N 30'E and 14°N and longitudes 2°2'E and 14°30'E and occupies a total land area of about 923,768km². The country is well drained with a close network of rivers and streams (Ladokun, *et al.*, 2013) [4]. Figure 1, shows the Hydrological map of Nigeria with some major rivers.

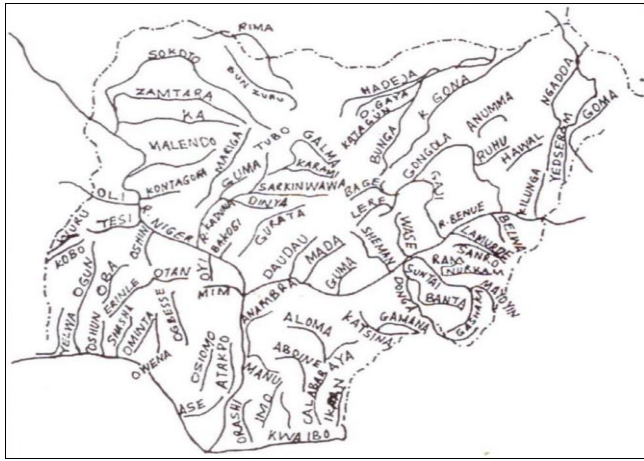
Nigeria is endowed with abundant water resources which

include about 267 billion cubic metres of underground water, many rivers and streams, lakes and rainfall. However, the amount and timing of rainfall are not adequate to meet the water requirement of crops (Ahameku, 2010; Umeghalu, 2013) [1, 9]. The country has over 79 million hectares of arable land of which only about 3.14 million hectares have potential to be irrigated (Okigbo, 1986; Eni, 2008) [6, 2].



Source: FAO

Fig 1: The hydrological Map of Nigeria showing Major Rivers



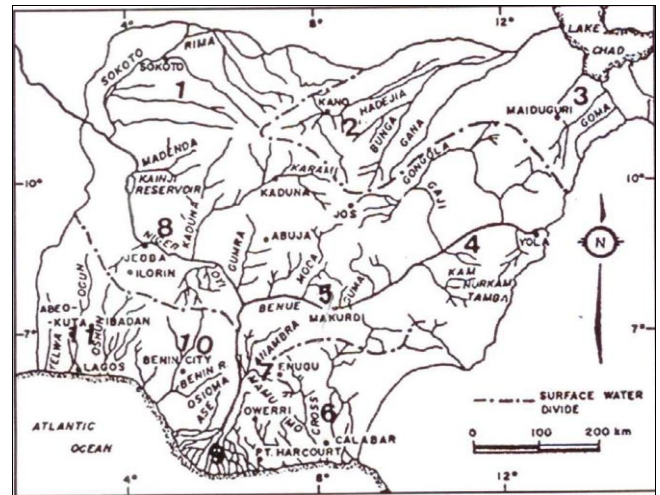
Source: FAO

Fig 2: Map of Nigeria showing some major rivers

Rainfall unreliability in terms of onset, duration, intensity and amount for agricultural production calls for irrigation practices to promote agricultural growth. The use of rudimentary traditional methods and techniques, shifting cultivation farming systems and excessive dependence reliance on rain-fed agriculture results to low agricultural yields.

Therefore, irrigation infrastructure constitutes an important tool to boost agricultural production, by minimizing the risks associated with rainfall unreliability (Onwualu, 2005) [7]. Also, the World Bank (2008) noted that the high incidence of poverty in most developing world is attributable to heavy reliance on rain-fed agriculture, subsistence farming and exclusion from trade. According to UNECA (2005), poverty is a condition of lacking money and the necessities, such as food, water, education, healthcare, shelter and clothing needed to successfully live, which is often measured in terms of daily income of US\$1.25 and US\$2.0. According to Romanus and Ayito (2013), poverty remains a persistent feature of many developing countries, despite over a century of debate and action and over forty years of international aid to transform the livelihoods of the poor.

Buoyed down by the pressure of population explosion and dwindling arable land frontiers, the resultant which is poverty and food insecurity, the States and Federal Government of Nigeria embarked on various policies and programmes that would boost agricultural productivity, create employment and raise the stand and of living of the populace (Umeghalu *et al.* 2013) [9]. One of the programmes aimed at achieving these goals is the establishment of various water management projects which include construction of various irrigation systems such as river basins, flood, sprinkler and surface water irrigation projects. There are four principal surface water basins in Nigeria; the River Niger, the Lake Chad, the West Coast and the West Central also known as South-eastern littoral basin (Oshodi, 2006) [8]. These surface water basins are further subdivided into twelve river basins; the Benue, Delta and Cross river, the Imo – Anambra, Hadejia- Jam'are, Chad, Sokoto-Rima, Lower Niger, Upper Niger, Benin-Owena and Ogun-Osun iver basins. Figure 3, shows river system in Nigeria and their organization into River Basins (FAO, 2016).



Source: FAO

Fig 3: Shows river system in Nigeria and their organization into River Basins

Studies by Mahmood (1994) [5] showed that over US\$3billion had been invested on the construction of these irrigation and drainage projects that constitute over 300 dams and reservoirs.

However, Umeghalu *et al.* (2013) [9] noted that despite all these efforts by both the State governments and the Federal Government of Nigeria to boost agricultural production in the country through development of these irrigation schemes, it is regrettable to note that most of these irrigation projects are either malfunctioning, mismanaged, or have gone into comatose. This study is undertaken to highlight the challenges facing Adarice Production Adani and to suggest strategies for its optimal exploitation of the irrigation scheme for sustainable rice production.

Adarice Production Nigeria Limited Adani Enugu State

Realizing that development through agriculture as a strategy and process encompassing the attainment of a number of objects simultaneously: a growth objective, an employment objective, a food security objective, a risk reducing objective and industrialization objective with the overreaching goal being poverty eradication, the Premier of the Eastern.

Materials and Methods

Adarice Production Nigeria Limited is located at Adani in Uzo Uwani Local government Area of Enugu State, Nigeria. Adani is located within Latitude 6°23'N and Longitude 7°02'E. The climate conditions are influenced by two air masses namely: The North East Trade Winds which brings harmattan to the area, and the South West Monsoon Winds which brings rainfall to the area. The harmattan wind is felt between the months of November and March. Temperature during this period ranges between 40°C in the day and 18°C in the night. The area experiences the influence of South East monsoon winds between April and September and sometimes to October which is responsible for precipitation averaging 1000mm per annum.

The irrigation system has an intake capacity of 1.6m³ with the main corral of about 15km in length and a network of laterals and sub-laterals of a further 73.3km and 53.7km

respectively. Though about 4133 hectares have been fully developed and irrigated, the project total land area is 4204.305 hectares.

Challenged on how to transform agricultural practices which was fraught with traditional agricultural practices, the need to promote an all-year round agricultural production for employment, ensure food security, raise the standard of living of the populace and produce surpluses for export, the newly independent state was faced with the task of inventing a new policy that would revolutionize industrial and agricultural sectors through the creation of a promising internal market for manufacturers. However, the problem was that the rural population who form the base are traditional peasant farmers with minimal purchasing power and abilities. Thus, realizing that an agrarian revolution proceed and accompany an industrial revolution therefore to achieve this, it behoves that the traditional agricultural practices which was the existing system of rural land use, based largely upon traditional land tenure system and indigenous settlement patterns must be changed. Therefore, the need to introduce irrigation system which is a basic determinant of agriculture, because its inadequacies are the most powerful constraints on the increase of agricultural production.

Crops require water to grow and thrive. It was on this premise that the regional government of Dr. M.I. Okpala, the Premier of the defunct Eastern Nigeria established Uzouwani Farm Settlement, Omasi (now Adarice Production Limited, Adani) in the 1960's.

At Adarice Production Limited, farmers under the project terms were enjoined to some assistance from the project in the form of input supplies such as fertilizers, seeds, pesticides, herbicides and paying back after harvest. Also, other services such as land preparation which requires agricultural machineries such as tractor services for land preparation, combine harvesters and other farm implements were leased to farmers for a fee. The paddy rice produced by farmers was purchased by the company who process the paddy rice into parboiled rice, packaged and sold.

Four villages were established and built up with housing units for the settlers and their families. Housing estate was also built to accommodate the staff of the company, as well as other facilities such as a primary school blocks, recreational centres and market. A police post was also established.

However, one of the problems facing the company was poor management of these facilities to maximize rice production. The facilities were cannibalized and taken away. The tractors and other agricultural machines were not adequately maintained or exploited, leading to their malfunctioning or gone into comatose.

Data Collection

Primary data was collected through a field survey. Scheduled-structured questionnaire was prepared to collect information from farmers and the staff who worked with the scheme. The questionnaire was designed to seek information on such areas as farming methods, technical assistance received irrigation water supply, product marketing, and challenges encountered by the farmers and the scheme. 50 persons were randomly selected both from the participating farmers, the host communities while 20 former staff of Adarice Project were also randomly selected for interview.

Secondary data on Adarice Irrigation Project were obtained from newspapers and collation of information from online publications.

Land Acquisition

Application is made by intending farmers to Adarice authority after which interview is conducted. Successful applicants are allocated with land and are expected to pay service fees for the use of the irrigation infrastructure.

Farming Method

About 78% of project farmers adopted capital intensive method which involves the use of tractors for land preparation while 22% engage the services of hired labour either for lack of fund or for other reasons which may include delay in delivering the services by the company.

Technical Assistance

87% of the farmers interviewed received technical assistance from Extension workers who visit the project on regular bases. At the initial stage of the life of the scheme, fertilizers, herbicides, pesticides and other farm inputs are supplied to farmers at subsidized rate, but these services were later withdrawn due to mismanagement and the removal of fertilizer and input subsidy by government.

Water Supply to The Farm

All the farmers interviewed responded affirmatively that water supply to their paddy plots is regular and adequate. But as the scheme aged, inadequate maintenance of the irrigation facilities resulted to inadequate supply of irrigation water to some paddy plots. This often led to scramble for water especially during the dry season cropping.

Marketing of Farm Produce

Adarice Production Project is provided with paddy processing facilities which are capable of processing the rice paddy produced by farmers. The company buys the paddy rice from farmers and also collects from farmers in lieu of the inputs supplied to them in credit. However, farmers who were not willing to sell to the company were free to sell their products elsewhere, or process their products by themselves. About 2% of the farmers interviewed own their rice milling facilities located in Adani town.

Challenges facing Adarice Production Scheme

1. The claim for ownership of land on which the project is sited has led to destruction and cannibalization of the property of the company. Prior to creation of Enugu State out of the former Anambra State, the three communities on which Adarice Project is sited namely: Omasi, Adani and Iggah were all located in Anambra State. However, the tussle for land ownership commenced soon as Enugu State was carver out from the former Anambra State. Omasi community is retained in Anambra State while Adani and Iggah communities joined Enugu State. The failure of the Federal Government of Nigeria, Anambra and Enugu States to conduct proper assessment and boundary adjustment and delineation led to this problem of land disputes between Omasi and Iggah communities which have resulted to loss of many lives, and destruction of properties estimated to millions of naira and the destruction of most

of the project's facilities. The crisis is still lingering, thus, resulting to insecurity of lives and property which is not favourable for investment.

2. Attempt to revamp the scheme relapsed when in 2018, Songhai Institute was contracted by Enugu State Government to re-establish and manage the scheme. The failure of Songhai Institute to revamp the scheme is attributable to some administrative logistics.
3. The infrastructures provided to enhance the social life of the settlers such as access roads, electricity, market, school; houses were destroyed during the Omasi/Iggah communal conflict. Thus, access roads to the farm settlement is difficult.
4. The irrigation facilities have dilapidated due to neglect and abandonment. The main canal and the distribution channels are broken and overgrown by weeds.
5. The rice processing facilities, farm machineries and implements were completely destroyed, and the rest carted away.

Recommendations

1. There is urgent need for the Federal Government of Nigeria, Anambra and Enugu States Governments to take a holistic look at the communal conflict between the communities with the view of settling the matter for peace to return. No meaningful venture can be undertaken in atmosphere of war and insecurity. This is achievable by proper boundary delineation and payment of compensations where necessary.
2. Repair and maintenance of irrigation facilities – The collapsed irrigation facilities should be repaired and regularly maintained for free flow of water which will enhance easy supply of water to the paddy field. The canals should be cleaned up regularly to eliminate weeds and other impediments to free flow of water.
3. Establishment of tractor hiring scheme – This will increase farmers farm holding which will lead to increased production of agricultural products.
4. Regular supervision of the project – Government should pay serious attention to the running of these projects which are dear to the survival of the country's economy, by paying regular supervision to the activities of government owned projects or schemes.
5. Organization of regular consultative forum by government – Government from time to time should organize regular consultative workshop where issues relating to importance of peaceful co-existence of communities should be stressed. Development can't be possible where peace is absent. The communal clashes could be avoided if government properly intervenes in good time.
6. Less involvement of politicians in the running of agricultural schemes – Government should minimize involvement of politicians in running agricultural projects. Experiences have shown that facilities and inputs provided by government which are meant for farmers at subsidized rates do not reach the targeted farmers. Politicians divert the facilities to their friends and cronies who may not be farmers. These cronies then resell the facilities to the farmers at exorbitant prices.
7. The state governments of Anambra and Enugu should take a good on the status of the company with the view of settling the differences that may have caused the communal crisis and bring it back to production.

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