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CHAPTER ONE INTRODUCTION

BACKGROUND INFORMATION OF THE STUDY

Cassava, (*Manihot esculentum* crantz), belongs to the family of euphorbiaceae. It is believed that the crop originated from Brazil and was introduced to West Africa by the Portuguese traders. It exists in many cultivars which can be distinguished by size, colour, shape of the leaf, branching habit, plant height, colour of the stem, root shape, size and colour, maturity time of the root and level of hydrocyanic content (Anyanwu, 2006). Cassava is Africa's food insurance crop with stable yield, even with low rainfall, low fertility and low inputs (FAO, 2008). Cassava is becoming an important industrial raw material and a foreign exchange earner. Cassava's role as food security crop as well as a cash crop is receiving high attention for poverty alleviation by the developing world and partners (FAO, 2008).

Cassava is ranked the 6th most important crop in the world in terms of area planted and production (FAO, 1986). Africa is the highest cassava producer in the world, and more than 100 million people in tropical Africa depend on it as their dietary staple (FAO, 2008). Globally, among the world's producing regions, West Africa is known to have the greatest share of the world's production of cassava (FAO, 2008). Interestingly, Nigeria is the largest world producer of cassava with yearly production of fresh tubers estimated at 10-13 million tons on a land area of 1.2-1.4 million hectares (NAQAS, 2002). Nigeria's lead on cassava production in the world has been achieved through expansion of land areas devoted to cassava cultivation (Ano, 2003). Of Africa's 72.7 million tons of cassava output in 1990, 26 million tons were produced in Nigeria (Ezedinma, 2003). Cassava is widely grown in Nigeria. For decades, cassava has been cultivated as a subsistence crop in Nigeria. Currently, cassava cultivation has become an income generating activity. This "enhanced" status is as a result of increased demand for cassava and cassava products outside the rural communities (Ikpi et al 1986), as well as the realization of the potentials it has for contributing to the attainment of self-sufficiency in food production (Kwatia, 1980).

Cassava plays a major role in Nigeria's food security and 80% of the inhabitants in the rural areas eat cassava meal at least once a day (Ezedinma, 2003). The crop is also a good source of raw materials involved in the production of confectioneries, animal feed, alcohol, adhesives, flour starch, etc. The growth of cassava as a major economic and food security crop over the last two decades has generated significant research interest at both the National and International levels. For instance, the International Institute for Tropical

Agriculture (IITA), Ibadan and the National Root Crops Research Institute, (NRCRI), Umudike have developed the Tropical Manihot Selection (TMS) 30555, 30572, 30211, 50395, 60506 and Umudike (U) 41044 varieties in the early 1970's and 1980's. Most recently, new varieties of cassava were developed and they include, TMS 90257, 84537M, 82/00661, 30001, 81/00110, 91934, 4(2)1425, nr 41044, nr 8212, 8082, 8083, 8208, nr 83107, TMS 419, TMS 98/0581 and TMS 98/0510 (Ezulikeet-al, 2006). These varieties are not only high yielding, but also are resistant to pests and diseases such as Cassava Mosaic Disease, Cassava Bacteria Blight, Cassava Mealy Bug and Cassava Green Spider Mite (Ezedinma, 2003).

Cassava's combined abilities to produce high yields under poor conditions and store its harvestable portion underground up to nine months make it a classic "food security crop. In recent years, this has proved of critical importance to many people in Africa caught up in civil conflicts and unable to cultivate the normal range of annual crops. Displaced groups of people in Mozambique during that country's 16 years' war often survived on abandoned cassava fields (Ezedinma, 2003). Because, it is a vegetative propagated crop, such plantings can also serve as a ready supply of planting materials during rehabilitations following conflict or drought.

Cassava is well-known for being able to grow and produce food even in very poor soils. For that reason, it is often grown at the margins of farms where the better land has been reserved for the production of grain crops. In addition, once established, cassava is relatively drought tolerant and when matured can survive up to six months without rains. Cassava's productive capacity in low-input conditions comes at a certain cost in terms of carbohydrate quality and protein concentrations. Cassava's ability to produce food under marginal conditions has made it a popular crop of Africa's poor farmers who are unable to invest in fertilizer or pesticides to protect the crop against environmental stresses and biotic constraints (Ezedinma, 2006).

Although still a subject of some debate, the center of origin of cassava is generally believed to be the Southern border of the Amazon basin. Cassava was introduced in Africa in the Congo River Delta by the Portuguese in the 15th century and spread rapidly to many agro-ecologies of the continent; however, cassava is most important in farming systems of the humid forest regions where the productivity of grain crops is reduced by sunlight, foliar pests and diseases and grain storage is more difficult. Cassava has very high yield potential, making it a viable alternative to grain crops where population pressures have led to trade-off between good quality and quantity (NAQAS 2002).

Commercial cassava yields as high as 20 metric tons per hectare have been registered under experimental conditions. Nigeria is presently the largest cassava producing country in the world (FAO, 2008).

Presently, cassava production is in the hands of small-holder farmers who rely predominantly on simple tools like the hoe and cutlass powered by human effort. In 2002, the Government of Nigeria launched a presidential initiative on cassava. The aim of the initiative was to develop cassava as the engine of growth and diversify Nigeria's economic base away from its principal export-crude oil. If investments in the downstream sector of the cassava industry are made more effective, cassava can be used to improve rural and urban income and employment in Nigeria (Ezedinma and Okechukwu, 2007). But the initiative will be threatened if no substantial effort is made to improve the current production systems. The requirements of consistent supply of large volumes of fresh roots by cassava-based industries cannot be supported by the current production systems. The critical constraints, however under such production systems is labour cost which lies between 70 and 90% of total variable cost of production (Ezedinma, 2000 and Okorji, 1985) in small holder farming.

ECONOMIC STUDY OF CASSAVA PRODUCTION IN ABIA STATE NIGERIA

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